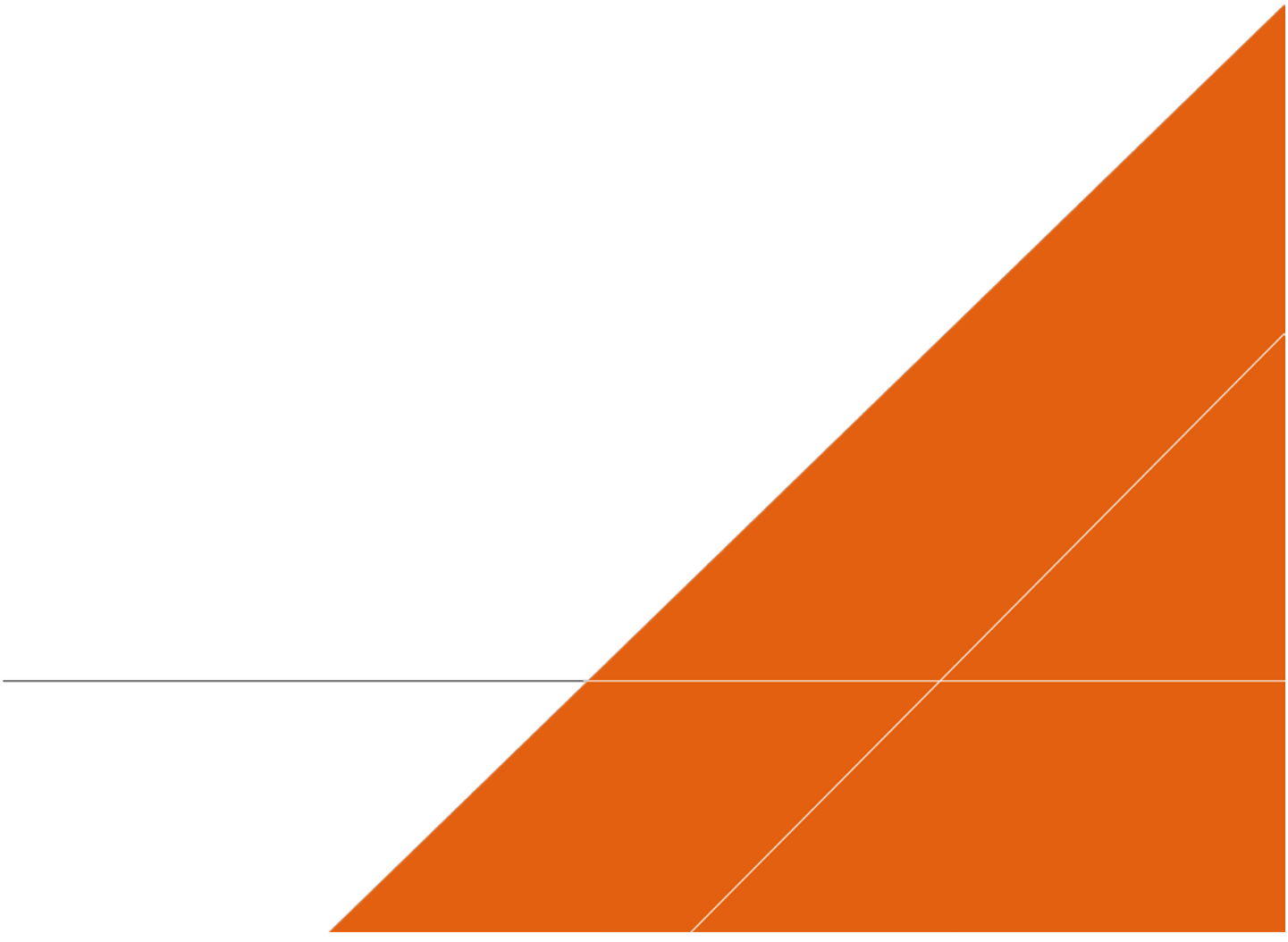
ARCADIS Design & Consultancy for natural and built assets

ENVIRONMENTAL SITE ASSESSMENT

Qantas Flight Training Centre and Carpark

297 King Street, Mascot NSW 2020

22 JULY 2019



CONTACT



LOEK MUNNICHS
Principal Environmental Scientist

T +61 2 8907 3979
M +61 423 633 440
E Loek.Munnichs@arcadis.com

Arcadis
Level 16, 580 George Street
Sydney, 2000, NSW

Copyright © 2015 Arcadis. All rights reserved. arcadis.com

QANTAS AIRWAYS LTD
ENVIRONMENTAL SITE ASSESSMENT

Qantas Flight Training Centre and Carpark – 297 King Street, Mascot NSW 2020

Primary Author	Caitlain Regena	
Author	James Van Der Helm	
Checker	Loek Munnichs	
Approver	Loek Munnichs	

Report No	10026439RP01
Date	22/07/2019
Revision Text	V03.1

This report has been prepared for Qantas Airways Ltd in accordance with the terms and conditions of appointment for the Environmental Site Assessment dated 27 November 2018 and 5 February 2019. Arcadis Australia Pacific Pty Limited (ABN 76 104 485 289) cannot accept any responsibility for any use of or reliance on the contents of this report by any third party.

REVISIONS

0	22/01/2019	Draft for comment	CR	DS
01	27/02/2019	Additional site area investigation added to report	CR	LM
02	12/04/2019	Addressing client comments	CR	LM
03	07/06/2019	Incorporate Auditor Feedback	JV	LM
03.1	22/07/2019	Appendix F omitted. report reissued	JV	LM

CONTENTS

EXECUTIVE SUMMARY **11**
Objectives **11**
Summary of Findings **11**
Conclusions **12**

1 INTRODUCTION **14**
1.1 Background **14**
1.2 Objectives **14**
1.3 Scope of Work **14**

2 LIMTATIONS **17**

3 SITE CHARACTERISTICS **18**
3.1 Site Location **18**
3.2 Site Description **18**
3.3 Surrounding Land Uses **19**
3.4 Sensitive Environments **20**
3.5 Proposed Land Use **20**

4 SITE HISTORY **22**
4.1 Review Council Records **22**
4.2 Zoning **22**
4.3 Historical Aerial Photographs **22**
4.4 Title Search **25**
4.5 NSW EPA Contaminated Land Search **25**
4.6 WorkCover NSW Dangerous Goods Search **26**
4.7 Past Industrial Processes **26**
4.8 Manufacturing Processes **26**
4.9 Hazardous Materials **27**
4.10 Storage Tanks **27**
4.11 Discharges to Land, Water and Air **27**

5 SITE CONDITION AND ENVIRONMENTAL SETTING **28**
5.1 Topography **28**
5.2 Visible Signs of Contamination **28**
5.3 Presence of Drums and Wastes **28**
5.4 Fill Material **28**
5.5 Odours **28**
5.6 Geology **28**
5.7 Hydrogeology **29**
5.8 Hydrology **29**
5.9 Acid Sulfate Soil Risk **29**

6 PREVIOUS INVESTIGATIONS **30**
6.1 Environmental Strategies (2013), Tank Pit Investigation Qantas Transport Facility, Mascot NSW **30**
6.2 Environmental Strategies (2016), Underground Petroleum Storage System, Groundwater Monitoring Event at the Qantas Transport Facility, Mascot NSW **31**

7 CONCEPTUAL SITE MODEL 32
7.1 Source 32
7.2 Potentially Affected Media 32
7.3 Pathways 33
7.4 Receptors 33
7.5 Exposure Assessment 33

8 SAMPLING, ANALYSIS PLAN 34
8.1 Data Quality Objectives 34
8.2 Schedule of Works 36
8.3 Sample Location and Analysis 37
8.4 Soil Assessment Criteria 38
8.5 Groundwater Assessment Criteria 39

9 SAMPLING METHODOLOGIES 42
9.1 Soil Sampling Method 42
9.2 Nomenclature for Sample Identification 42
9.3 Soil Logging and Sampling 42
9.4 Groundwater Sampling 43

10 RESULTS 45
10.1 Field Observations 45
10.2 Analytical Results 47

11 QUALITY ASSURANCE AND QUALITY CONTROL (QA/QC) 51
11.1 Field QA/QA 51
11.2 Laboratory QA/QC 52
11.3 QA/QC Data Evaluation 55

12 CONCLUSIONS AND RECOMMENDATIONS 56
12.1 Summary of findings 56
12.2 Extent of Uncertainty in the Results 59
12.3 Conclusions and Recommendations 59

13 REFERENCES 61

APPENDIX A FIGURES 65

APPENDIX B SITE PHOTOGRAPHS 71

APPENDIX C LOTSEARCH REPORT 79

APPENDIX D TITLE SEARCH 222

APPENDIX E LABORATORY REPORTS 232

APPENDIX F BORE LOGS 863

APPENDIX G RESULTS SUMMARY TABLES 975

APPENDICES

APPENDIX A FIGURES

APPENDIX B SITE PHOTOGRAPHS

APPENDIX C LOTSEARCH REPORT

APPENDIX D TITLE SEARCH

APPENDIX E LABORATORY REPORTS

APPENDIX F BORE LOGS

APPENDIX G RESULTS SUMMARY TABLES

GLOSSARY

Term	Definition
Accreditation	The formal recognition of a laboratory's competence to carry out specific tests. It covers a lab's quality system and its technical quality.
Acid Sulfate Soil	Acid sulfate soils are natural sediments that contain iron sulfides. When disturbed or exposed to air these soils can release acid, damaging built structures and harming or killing animals and plants. Because of their estuarine origin, they are usually found at elevations less than 1 metre above sea level.
Analyte	The specific component or element measured in chemical analysis.
Anthropogenic	Coming from or having been caused by man.
Aquatic	Growing, living in or frequenting water, occurring or situated in or on water.
Aquifer	Stratum or zone below the surface of the earth capable of producing water as from a well.
Aromatic Compounds	Contain ring structure formed from closed loops of carbon chains (most often containing C-atoms) where carbons in the ring have resonant double bonds. Aromatic compounds include compounds such as benzene, toluene, ethylbenzene and xylene (BTEX), as well as polyaromatic compounds such as naphthalene. Because of the double bonding between carbon atoms, the molecules are not saturated with hydrogen atoms (as with un-saturated hydrocarbons).
Background	An area not influenced by chemicals released from the site under evaluation or other impacts created by the activity on the site under evaluation.
Bentonite	A type of mineral deposit consisting principally of montmorillonite clay. (A major constituent of drilling muds.)
Calibration	Comparison of a measurement standard or instrument with another standard or instrument in order to report or eliminate by adjustment any variation (deviation) in the accuracy of the item being compared.
Casing	The lining put into a well. It extends the total length of the wellbore to ensure safe control of production, prevent water from entering the wellbore and keep rock formations from slumping into the well bore.

Term	Definition
Contaminant	A general term referring to any chemical compound added to a receiving environment in excess of natural conditions. The term includes chemicals or effects not generally regarded as “toxic”, such as nutrients, salts and colour.
Contamination	The condition or state of soil, water or air caused by a substance release or escape which results in an impairment of, or damage to, the environment, human health, safety, or property.
Environmental Health	The study of the protection of human populations from biological, chemical and physical hazards in their environment.
Exposure Assessment	The process of estimating the amount (concentration or dose) of a chemical that is taken up by a receptor from the environment.
Exposure Pathway	The route by which an organism comes into contact with a contaminant.
Fill	Depth of which material is to be placed (filled) to bring the surface to a predetermined grade. Also, the material itself.
Guideline	A basis for determining a course of action. An environmental guideline can be either procedural (directing a course of action) or numerical (providing a numerical value that is generally recommended to support and maintain a specified use.
Jetbase	Qantas leased land within the boundaries of Sydney Kingsford Smith Airport.
Light Non-Aqueous Phase Liquid (LNAPL)	Compounds that are soluble in hydrocarbons but less dense than water, thus these compounds will float on water.
Mascot Campus	Over 19ha of Qantas Airways Limited controlled land in Mascot to the north of Sydney Kingsford Smith Airport consisting of freehold and leased land. The following lots are owned by Qantas: Lot 133 DP 659434; Lots 4 & 5 DP 38594 Lot 23 DP 883548; Lots 1 & 2 DP 738342; Lot 3 DP 230355; Lot 4 DP 537339; Lots 2 & 4 DP 234489; Lot 4 234489; Lot 1 DP 81210; Lot 1 DP 202093; Lot 1 DP 721562; Lot 2 DP 510447; Lot 1 DP 445957; Lot B DP 164829 and Lot 1 DP 202747 and equates to 16.5ha of land. The following lots are leased by Qantas: Lot 14 DP 1199594 and Lot 2 DP 792885 and equates to 2.7ha of land.

Term	Definition
Mottling	Formation or presence of soil mottles (spots of blotches of different colour or shades of colour found in imperfectly drained soils).
Peat	Material constituting peatlands, exclusive of the live plant cover, consisting of largely organic residues accumulated as a result of incomplete decomposition of dead plant constituents under conditions of excessive moisture (submergence in water and/or waterlogging).
Petroleum	A naturally occurring mixture of hydrocarbons in gaseous, liquid or solid form.
Pit	An excavation in the surface made for the purposes of removing, opening up, or proving sand, gravel, clay or any other substances and includes any associated infrastructure, but does not include a mine, quarry or borrow excavation.
The Project	The construction of a new Flight Training Centre and ancillary uses to replace the existing facility on the Qantas Jetbase that will be impacted by RMS' Sydney Gateway Project.
Receptor	The person or organism subjected to exposure to chemicals or physical agents.
Remediation	The removal, reduction or neutralisation of substances, wastes or hazardous material from a site so as to prevent or minimise any adverse effects on the environment now or in the future.
Sediment	Soil material, both mineral or organic, that is in suspension, is being transported, or has been moved from its surface of origin by air, water, gravity or ice and has come to rest on the earth's surface either above or below sea level.
Sydney Gateway Project	A RMS Project including a road and rail component that is intended to increase capacity and improve connections to the ports to assist with growth in passenger, freight and commuter movements across the region, by expanding and improving the existing road and freight rail networks.
The Site	Qantas Airways Limited owned land in Mascot to the north of Sydney Kingsford Smith Airport consisting of Lots 2-5 DP 234489, Lot 1 DP 202747, Lot B DP 164829 and Lot 133 DP 659434. Current site improvements include including at-grade car parking for Qantas staff, an industrial shed to store spare aviation parts, a substation, a disused gatehouse, a Sydney Water Asset with two driveways over it, the Qantas catering facility and Qantas tri-generation plant.

ABBREVIATIONS

Acronym	Definition
ACM	Asbestos Containing Material
AF/FA	Asbestos Fines / Fibrous Asbestos
AHD	Australian Height Datum
ANZG	Australian and New Zealand Governments
ASS	Acid Sulfate Soil
ASSMP	Acid Sulfate Soil Management Plan
B(a)P	Benzo(a)pyrene
BBLEP	Botany Bay Local Environmental Plan 2013
BH	Borehole
BTEXN	Benzene, Toluene, Ethylbenzene, Xylene and Naphthalene
CEMP	Construction Environmental Management Plan
CLM Act	Contaminated Land Management Act (1997)
CoPCs	Contaminants of Potential Concern
CSM	Conceptual Site Model
DNAPL	Dense Non-Aqueous Phase Liquid
DQO	Data Quality Objectives
DSI	Detailed Site Investigation
EMP	Environmental Management Plan
EP&A Act	Environmental Planning and Assessment Act 1979
EP&A Regulation	Environmental Planning and Assessment Regulation 2000
ESA	Environmental Site Assessment
GME	Groundwater Monitoring Event
IP	Interface Probe
LDPE	Low-density Polyethylene
LEP	Local Environmental Plan
LGA	Local Government Area
LNAPL	Light Non-Aqueous Phase Liquid
MW	Monitoring Well
NATA	National Association of Testing Authorities
NEPM/NEPC	National Environment Protection Measure (2013) / National Environment Protection Council
NEMP	National Environmental Plan
NSW	New South Wales
NSW EPA	New South Wales Environment Protection Authority

Acronym	Definition
OCP & OPP	Organochlorine & Organophosphorus Pesticides
OEH	Office of Environment and Heritage
PACM	Potential Asbestos Containing Material
PAH	Polycyclic Aromatic Hydrocarbon
PFAS	Per- and Poly- fluorinated Alkyl Substances
PPM	Parts Per Million
POEO Act	Protection of the Environment (Operations) Act 1997
PSI	Preliminary Site Investigation
QA/QC	Quality Assurance/Quality Control
Qantas	Qantas Airways Limited
RAP	Remedial Action Plan
RPD	Relative Percent Difference
SEARs	Secretary's Environmental Assessment Requirements
SEPP	State Environmental Planning Policy
SSD	State Significant Development
SVOCs	Semi Volatile Organic Compounds
SWMs	Safe Work Method Statement
The Airport	Sydney Kingsford Smith Airport
TPH/TRH	Total Petroleum Hydrocarbons / Total Recoverable Hydrocarbons
UPSS	Underground Petroleum Storage Systems
USCS	Unified Soil Classification System
UST	Underground Service Tank
VOCs/SVOCs	Volatile Organic Compounds / Semi-Volatile Organic Compounds

EXECUTIVE SUMMARY

Arcadis Australia Pacific Pty Ltd (Arcadis) was commissioned by Qantas Airways Ltd (Qantas) to conduct a combined Preliminary Site Investigation (PSI) and Detailed Site Investigation (DSI), also referred to as an Environmental Site Assessment (ESA) in accordance with the technical requirements of the Secretary's Environmental Assessment Requirements (SEARs), and in support of the State Significant Development (SSD 10154) for the development of a new flight training centre at 297 King Street, Mascot.

Objectives

The objective of the ESA is to identify issues, concerns or environmental risks and liabilities associated with the present and historical uses of the site, with particular focus on assessing whether there is potential for soil and/or groundwater contamination issues associated with current/past land use. The above objectives will be met by reviewing historical data and aerial photography, conducting a site walkover, undertaking intrusive investigations on soils and conducting groundwater analysis at the site.

Summary of Findings

The following summary is derived from works conducted during the ESA:

The site has a history of farming and agriculture, rail, manufacturing and commercial / industrial land uses. Contaminants of potential concern (COPCs) associated with historical land uses include heavy metals, benzene, toluene, ethyl benzene, xylenes and naphthalene (BTEXN), total recoverable hydrocarbons (TRH), asbestos, pesticides, volatile organic compounds and semi volatile organic compounds (VOCs/SVOCs) and per- and poly-fluorinated alkyl substances (PFAS).

Fill material comprising asphalt and / or concrete hardstand, road base and reworked silty sand was generally observed across the site to a maximum depth of 3.50 m below grade.

Several soil contaminant exceedances were reported for the location BH47 situated just southwest of the USTs in the Qantas bus refuel area:

- Concentrations of C6-C10 less BTEX (F1) in BH47@2.4 exceeded the NEPM 2013 Commercial / Industrial Coarse Soil HSL (Sand) guideline (630 mg/kg mg/kg).
- Concentrations of Benzene in BH47@2.4 exceeded the NEPM 2013 Commercial / Industrial Coarse Soil HSL (Sand) guideline (3 mg/kg).

Several additional locations at the Site reported soil contaminant concentrations above the adopted soil guidelines:

- Concentrations of C16-C34 in soil samples BH07@0.20 (2880 mg/kg), BH17@1.50 and BH37@1.1 exceeded the adopted NEPM 2013 Commercial / Industrial Coarse Soil ESL guideline (1700 mg/kg).
- Concentrations of C10-C16 less Naphthalene (F2) in soil sample BH06@0.50 (170 mg/kg) exceeded the NEPM 2013 Commercial / Industrial (Coarse) ESL guideline (170 mg/kg).
- Lead concentrations in BH08@1.00 exceeded the NEPM 2013 Commercial / Industrial HIL guideline value (1,500 mg/kg). A 95% UCL of 180.1 mg/kg was calculated for lead across the site making this location below criteria.

- Concentrations of Benzo(a)pyrene (B(a)P) in BH16@0.50, BH17@1.50, BH19@0.40 and MW04@0.50, BH32@1 and BH44@0.3 exceeded the NEPM 2013 Commercial / Industrial Coarse Soil ESL guideline value (1.4 mg/kg).
- Soil sample MW05@1.00 (south western corner of the site) was found to contain asbestos fibres and asbestos fines (AF) / fibrous asbestos (FA). MW04@0.50 was found to contain asbestos fibres and one (1) fragment of ACM was identified in BH44.

Groundwater contaminant concentrations were also reported above the adopted groundwater guidelines for the following locations:

- Concentrations of Zinc up to 1,660 µg/L in MW01, MW02, MW04, MW05, MW06 and MW07 were all reported above the adopted ANZG 2018 MW (95%) and NEPM 2013 MW GIL guideline values (15 µg/L).
- Concentrations of Arsenic in MW02 were reported above the adopted NEPM 2013 MW guideline value (13 µg/L), and concentrations of Cadmium in MW05 and Copper in MW06 were reported above the adopted NEPM 2013 MW GIL guideline values (0.7 µg/L and 1.3 µg/L respectively). Copper concentrations in MW06 were also reported above the adopted ANZG (2018) MW 95% guidelines (1.3 µg/L). All these exceedances are below two order of magnitudes and not considered of a concern.
- Concentrations of Ammonia as N in MW1 and MW4 were reported above the extrapolated ANZG 2018 FW (95%) criteria.

Conclusions and Recommendations

- Arcadis recommends the preparation of an Environmental Management Plan (EMP) to manage the elevated concentrations of heavy metals in groundwater at the Site. Arcadis notes that a Draft EMP (Arcadis 2019) had been prepared at the time of writing this ESA.
- Arcadis recommends additional delineation works to further investigate the risk to human health in the UST area. The delineation works would require the installation of two (2) soil vapour sampling points to the west of the tank pit area and one (1) additional downgradient groundwater monitoring well further west of the existing groundwater well locations MW1-MW4.
- Arcadis recommends the ongoing monitoring of the groundwater wells in the UST area in accordance with the Guidelines for Implementing the PoEO UPSS Regulation 2014.
- Arcadis recommends the preparation of a Construction Environmental Management Plan (CEMP) to manage potential human exposure to impacted soil and groundwater during the construction phase. Some deeper excavations to allow for the construction of a pool (southwestern corner of the site) will need to be addressed in the CEMP.
- The presence of ACM, AF/FA suggests there is potential for additional detections of asbestos within the fill material. Arcadis recommends the inclusion of an Asbestos Management Plan (AMP) within the CEMP to manage potential human exposure to ACM during the construction phase and include an unexpected finds protocol. Soil material excavated from the general vicinity of MW04, MW05 and BH44 is to be disposed of at a waste disposal facility licensed to accept asbestos contaminated waste.
- Arcadis understands that the site will require some cut & fill to provide the proposed development levels. An estimated volume of 1,794 m3 (refer to drawing ‘BULK EARTHWORKS’ – Enstruct, 2019) will require removal from site. All waste streams generated during site works are to be disposed/re-used in accordance

with the NSW EPA (2014) Waste Classification Guidelines, the Amendment to Part 1 (2016) and/or the Exemptions and Orders such as the Excavated Natural Material exemption. Adherence to the Acid Sulfate Soil Management Plan (ASSMP - Arcadis 2019) is required.

- Resampling of MW01 (northeastern corner) is recommended.
- Arcadis considers that the high levels of zinc in the wells on the southern part of the property (up to 1,660 ppb) in monitoring wells MW05, MW06 and MW07 may trigger Duty to Notify, however the existence of zinc in groundwater from the adjacent property to the southeast is well documented and covered by a Court Order and long historical involvement of NSW EPA. Whilst Arcadis cannot pre-empt of NSW EPA's decision, it is unlikely that regulation of this site will occur.

The objectives of the ESA at the Site are considered to have been met regarding soil and groundwater conditions, within the limitations of the scope completed. Arcadis consider this ESA to be suitable for characterisation of the site against potential sources of contamination and associated contaminants arising from a site history that included farming, agriculture, rail, manufacturing and commercial / industrial land uses. Within the limitations of the report and the conclusions and recommendations provided, Arcadis considers the site to be suitable for the proposed land use.

1 INTRODUCTION

Arcadis Australia Pacific Pty Ltd (Arcadis) was commissioned by Qantas Airways Ltd (Qantas) to conduct a combined Preliminary Site Investigation (PSI) and Detailed Site Investigation (DSI), also referred to as an Environmental Site Assessment (ESA) in accordance with the technical requirements of the Secretary's Environmental Assessment Requirements (SEARs), and in support of the SSD for the development of a new flight training centre at 297 King Street, Mascot, NSW 2020 herein referred to as 'the site'. Refer to ***Figure 1 Appendix A*** for the site location.

1.1 Background

The site is located at 297 King Street, Mascot, NSW, 2020. The total site area is 5.417 ha and comprises Lots 2-5 DP 234489, Lot 1 DP 202747, Lot B DP 164829 and Lot 133 DP 659434.

Key features of the site are as follows:

- The site is approximately 5.417 ha and is an irregular shape. It is approximately 240m in length and maintains a variable width of between approximately 321m in the northern portion of the site and approximately 93m along the King Street frontage (refer to ***Figure 1 Appendix A***).
- The site possesses a relatively level slope across the site. An open Sydney Water drainage channel bisects the northern portion of the site in an east-west direction. There are some isolated changes in level immediately adjacent to this channel. A Site Survey Plan accompanies the application which details the topographic characteristics of the site.
- Multiple mature Plane Trees are scattered throughout the site. A variety of native and exotic tress and vegetation also exist around the perimeter of the site which help screen the site from surrounding uses.
- Site improvements include at-grade car parking for Qantas staff, an industrial shed to store spare aviation parts, a substation, a disused gatehouse, a Sydney Water Asset with two driveways over it, the Qantas catering facility and Qantas tri-generation plant.
- The site forms part of a larger land holding under the ownership of Qantas that generally extends between Qantas Drive to the west, Ewan Street to the south, Coward Street to the north, with the Qantas "Corporate Campus" fronting Bourke Road.
- Vehicular access to the site from the local road network is available from King Street. The site has intra-campus connections along the northern boundary in the form of two connecting driveways in the north-eastern and north-western corner of the site along the northern boundary which link it to the broader Mascot Campus.
- The site is located within the Bayside Council Local Government Area (LGA).

1.2 Objectives

The objective of the ESA is to identify issues, concerns or environmental risks and liabilities associated with the present and historical uses of the site, with particular focus on assessing whether there is potential for soil and/or groundwater contamination issues associated with current/past land use.

1.3 Scope of Work

Arcadis completed the following scope of works as part of the ESA:

- A review of available zoning plans, historical title deeds and council documents (Section 149 Certificate) to determine potentially contaminating activities that may have occurred on the site;
- An evaluation of aerial photographs to assist in assessing historical land uses and conditions on and adjacent to the site;
- A review of the environmental setting with regards to geology, topography, hydrology and hydrogeology;
- Site visit and walkover (targeted to potentially contaminating ground surface areas) to characterise the property setting, including inspection of the site surface for obvious signs of potential contamination and/or contaminant sources;
- A visual evaluation of surrounding land uses to identify any neighbouring activities which may have affected or present a potential risk to the environmental quality of the site;
- Preparation of an OHS plan and SWMs to cover the site intrusive works;
- Undertook a dial-before-you-dig search, obtainment of copies of Sydney Kingsford Smith Airport (the Airport) service diagrams and performing of underground service location;
- Formation of 56 soil bores using a track mounted geoprobe drill rig, to a depth of 0.5m into natural material. This sampling density meets the required minimum number of sampling points to characterise a site in accordance with the relevant industry Sampling Design Guidelines. i.e 55 sample locations for a site size of 5 ha (not including Qantas Catering building footprint);
- Seven (7) of the soil bores were extended to the underlying groundwater table and converted into groundwater monitoring wells;
- One soil sample of the fill or surface per borehole and one sample from the natural layer of every second per borehole were submitted to a NATA accredited laboratory for analysis of:

  – Total recoverable hydrocarbons (TRH);

  – Volatile Organic Compounds (VOCs) which include benzene, toluene, ethylbenzene, xylene;

  – Semi Volatile Organic Compounds (SVOCs) which includes organochlorine (OCP) and organophosphorus (OPP) pesticides;

  – 8 metals (As, Cd, Cr, Cu, Ni, Pb, Zn and Hg);

  – Asbestos– surface soils only; and

  – PFAS in fifteen (15) selected samples.
- Groundwater samples from the seven (7) newly installed monitoring wells were submitted to a NATA accredited laboratory for analysis of:

  – TRH;

  – VOCs;

  – SVOCs;

  – 8 metals;

  – Ammonia; and

  – PFAS.
- Groundwater samples from the four (4) existing monitoring wells located in the vicinity of the Qantas bus refuel area in the northwestern carpark area were submitted to a NATA accredited laboratory for analysis of:

  - – TRH;
  - – VOCs;
  - – SVOCs;
  - – 8 metals;
  - – Ammonia; and
  - – PFAS.
- QA/QC analysis for both soil and groundwater consisted of 1:20 duplicates, 1:20 triplicates, a trip blank and a trip spike for the above analytes;
- Results were compared against the NEPM (2013) Commercial / Industrial Guidelines and NEMP (2018) Guidelines: and
- Preparation of a report consistent with NEPM (2013), NEMP (2018) and NSW OEH (2011) reporting guidelines.

2 LIMTATIONS

The findings of this report are based on the scope of work outlined in Section 1.3. Arcadis performed its services in a manner consistent with the normal level of care and expertise exercised by members of the environmental assessment profession. No warranties, expressed or implied are made.

Subject to the scope of work, Arcadis' assessment was limited strictly to identifying the environmental conditions associated with the subject property and does not include evaluation of any other issues. The absence of any identified hazardous or toxic materials should not be interpreted as a guarantee that such materials do not exist on the subject property.

Additionally, unless otherwise stated Arcadis did not conduct soil, air, wastewater or other matrix analyses including asbestos or perform contaminated sampling of any kind. Nor did Arcadis investigate any waste material from the property that may have been disposed of at the site or undertake an assessment or review of related site waste management practices.

The results of this assessment are based upon (if undertaken as part of the scope work) a site inspection conducted by Arcadis personnel and/or information from interviews with people who have knowledge of site conditions and/or information provided by regulatory agencies. All conclusions and recommendations regarding the property are the professional opinions of the Arcadis personnel involved with the Project, subject to the qualifications made above.

While normal assessments of data reliability have been made, Arcadis assumes no responsibility or liability for errors in any data obtained from regulatory agencies, statements or sources outside of Arcadis, or developments resulting from situations outside the scope of this Project.

Arcadis is not engaged in environmental assessment and reporting for the purpose of advertising sales promoting, or endorsement of any client interests, including raising investment capital, recommending investment decisions, or other publicity purposes. The client acknowledges that this report is for the exclusive use of the client.

3 SITE CHARACTERISTICS

A search of available information was commissioned for the site through Lotsearch Pty Ltd and can be found in ***Appendix C***. A summary of the Lotsearch report is provided in the following sections.

3.1 Site Location

The location of the site and layout is shown in ***Figure 1*** and ***Figure 2, Appendix A***. The site is located at 297 King Street, Mascot, NSW 2020 and currently comprises Lots 2-5 DP 234489, Lot 1 DP 202747, Lot B DP 164829 and Lot 133 DP 659434. The site details are summarised in Table 3.1 and described in detail in the following sections.

Table 3.1 - Summary of Site Details

Site Characteristics	Details
Street Address	297 King St, Mascot, NSW 2020
Lot and Deposited Plan	Lots 2-5 DP 234489, Lot 1 DP 202747, Lot B DP 164829 and Lot 133 DP 659434
Local Government Area	Bayside Council
Land Use Information	'IN1 – General Industrial' under the *Botany Bay Local Environmental Plan 2013* (BBLEP 2013)
Site Coordinates to the approximate centre of the site (Geographic)	Latitude: -33.926712 Longitude: 151.184601
Site Area	5.417 ha

3.2 Site Description

The following site description is based on the conditions of the site observed during a site inspection conducted on 12 December 2018 by Environmental Scientist Caitlain Regena and 11 February 2019 by Environmental Scientist Tom Keatley from Arcadis. ***Appendix B*** presents the site photos taken during the site walkover.

The site comprised five sections of carpark that were situated at 297 King Street, Mascot, NSW. The site contains four (4) buildings consisting of a small building at the southern entry of the carpark off King Street, a large warehouse building in the south western corner of the site, the Qantas Catering building to the north and a Tri-Generation Plant to the north east. There is a Sydney Water Corporation concrete lined canal running through the centre of the site allotments. The site was generally flat, having been filled to level the site for the intended use as a carpark.

The carpark surface largely consisted of asphalt. Several square sections of concrete, assumed to be old building footprints, were located in the north eastern, south eastern and south western corners of the southernmost carpark.

The large warehouse building was observed to be of old construction and in a semi-dilapidated state (some cracked glass windows, cracks in outside walls, peeling paint), having undergone refurbishment since its original construction. The outside walls of the building were of cinderblock construction with wooden doors and window frames and metal pipes. The building located at the carpark entry contained brick walls, wooden doors and metal barred windows. Both buildings appeared to be used for storage purposes. Arcadis was unable to access the small building located at the carpark entry to confirm building materials used within the interior of the building.

Potential asbestos containing material (PACM) was not observed within the onsite buildings, however considering the age of the buildings (warehouse - 1960s; small building – 1980-1990s) there is considered to be medium potential for the buildings to contain ACM. There is considered to be medium potential for the paint used on the outside drainage and window barricades of the warehouse building to contain lead, depending on the age of the paint.

The Qantas Catering building and the Tri-Generation Plant buildings were in good condition and were of a recent construction. The outside walls of both buildings were largely of a concrete and cinderblock construction. PACM was not identified from the outside of either building, however considering the age of the Qantas Catering building (1970s) there is considered to be medium potential for the building to contain ACM. There is considered to be medium potential for the paint used on the outside walls of the Qantas Catering building to contain lead, depending on the age of the paint.

The north western carpark contained a Qantas bus carpark, maintenance area and refuel station. There were several buses parked in the carpark area. The maintenance area located just east of the carpark contained a car hoist. The concrete joins in the ground surface in the general vicinity of the maintenance area contained what appeared to be oil staining. A slight hydrocarbon odour was noted in the vicinity of the maintenance area.

The bus refuel area contained a petrol and diesel pump, bowsers, two underground storage tanks (USTs) containing unleaded petrol and diesel, fill points and related fuel infrastructure. Both USTs were in use and were reported to be used to fill Qantas service vehicles and passenger transport buses.

Cracks were observed in the asphalt and concrete on the ground surface in the general vicinity of the refuel area. Oil staining was observed in sections of the ground surface in the refuel area, with the concrete joins and cracks in this area containing larger amounts of oil staining. A hydrocarbon odour was noted in the vicinity of the refuel area. Two surface stormwater drains were located to the northwest and southwest of the refuel area. The site petroleum system did not appear to be protective of stormwater and it was noted that any spills would probably flow towards the nearest stormwater drain.

At the time of the site inspection, the water running through the Sydney Water Corporation canal did not contain a sheen. A slight sulfur odour was observed to be emanating from the canal.

The southernmost carpark was bound by a metal fence and trees along all boundaries. The middle section of carpark was bounded by trees on all sides, with the exception of the eastern side, and a small concrete lined creek was located immediately south of it. The southern boundary of the northern carpark contained several trees, however the remaining boundaries were enclosed by other buildings, consisting of a carpark to the west and office buildings to the north and east. The north western bus carpark was bordered by a looped road.

3.3 Surrounding Land Uses

The land uses currently surrounding the site are as follows:

- **North:** The site is bounded to the north low scale industrial development, beyond which is Coward Street. Further north of the site is the Mascot Town Centre which is characterised by transport-oriented development including high density mixed-use development focussed around the Mascot Train Station;
- **South:** The site is bounded to the south by King Street, beyond which is Qantas owned at-grade car parking and other industrial uses. Further south is the Botany

Freight Rail Line and Qantas Drive beyond which is the Domestic Terminal at Sydney Airport;

- **East:** The site is bordered to the east by commercial development including a newly completed Travelodge hotel which includes a commercial car park. Additional commercial development to the east includes the Ibis Hotel and Pullman Sydney Airport fronting O'Riordan Street; and
- **West:** The site is bordered to the west by the Botany Freight Rail Line and Qantas Drive, beyond which lies Sydney Kingsford Smith Airport and the Qantas Jetbase (location of the current Flight Training Centre).

3.4 Sensitive Environments

The nearest sensitive environments are as follows:

- The Sydney Water Corporation concrete lined canal running through the centre of the site allotments;
- The nearest residential area is located approximately 200 m southeast of the site and contains a series of medium to high density residential dwellings;
- Alexandra Canal located approximately 700 m northwest of the site, which drains into Botany Bay; and
- Botany Bay located approximately 2.50 km south of the site.

3.5 Proposed Land Use

Arcadis understand that the site is proposed to be used for the construction of the Qantas Flight Training Centre and Carpark.

The proposed facility enables pilots and flight crews to undertake periodic testing to meet regulatory requirements by simulating both aircraft and emergency procedural environments. The Project seeks consent for the construction and operation of a new flight training centre, and associated ancillary uses including a multi-deck car park. The Project is comprised of the following uses:

3.5.1.1 Flight Training Centre

The proposed flight training centre will occupy the southern portion of the site. It is a building that comprises 4 core elements as follows:

- An emergency procedures hall that contains:
  - cabin evacuation emergency trainers,
  - an evacuation training pool (Arcadis understands that the pool is proposed to be located in the southwestern corner of the site),
  - door trainers,
  - fire trainers,
  - slide descent towers,
  - security room,
  - aviation medicine training and equipment rooms.
- A flight training centre that contains:
  - a flight training hall with 14 bays that will house aircraft simulators,

  - integrated procedures training rooms, computer rooms, a maintenance workshop, storerooms, multiple de-briefing and briefing rooms, pilot's lounge and a shared lounge.

- Teaching Space that contains:
  - training rooms,
  - classrooms and two computer based exam rooms.
- Office Space:
  - Capacity for approximately 159 staff and associated shared amenities including multiple small, medium and large meeting rooms, think tank rooms, informal meeting spaces, a video room and lunch/tea room.
- Ancillary spaces including the reception area at the ground floor, toilets, roof plant and vertical circulation. The external ground floor layout will include a loading dock, at-grade car parking for 39 spaces and a bus drop-off zone at the northern site boundary.

3.5.1.2 Car Park

The proposed multi-deck car park will be located to the north-east of the flight training centre and adjacent the existing Qantas catering facility and tri-generation plant. The car park is multilevel and will provide car park spaces for Qantas staff. Carpark Stage 1 will provide 748 spaces. Carpark Stage 2 will provide 2059 spaces (including stage 1). Vehicle access to the car park will be provided via King Street, Kent Road and from Qantas Drive via the existing catering bridge.

4 SITE HISTORY

4.1 Review Council Records

The Environmental Planning instruments that apply to the carrying out of development on the land under the *Botany Bay Local Environmental Plan 2013* are provided in the Lotsearch Environmental Risk and Planning Report in ***Appendix C***.

The following zoning and planning policies and instruments apply to the site:

- No Mining Subsidence Districts apply to the site.
- No State Environmental Planning Policy Protected Areas apply to the site.
- No State Environmental Planning Policy Major Developments apply to the site.
- No State Environmental Planning Policy Strategic Land Use Area apply to the site.
- No minimum lot size applies to the site.
- A maximum height of buildings of 44.00 m applies to 100% of the site area.
- The entire site has a base Floor Space Ratio (FSR) of 1.2:1, with a maximum FSR of 1.5:1 for airport related uses.
- *Botany Bay Local Environmental Plan 2013* applies to 100% of the site area.
- No Land Reservation Acquisitions apply to the site.
- No State Heritage Items are located onsite. One (1) State Heritage Item (Alexandra Canal) is located 725 m north west of the site.
- Environmental Planning Instruments apply to the site.
- No Bushfire Prone Land Categories exist apply to the site.

4.2 Zoning

The site is subject to land zoning in the *Botany Bay Local Environmental Plan 2013* as shown in Table 4-2 below.

Table 4-2 - Zoning and Objectives of the site

Zone	Objectives
IN1 – General Industrial	• *To provide a wide range of industrial and warehouse land uses.* • *To encourage employment opportunities.* • *To minimise any adverse effect of industry on other land uses.* • *To support and protect industrial land for industrial uses.*

4.3 Historical Aerial Photographs

Aerial photographs were sourced from Lotsearch Pty Ltd. Photographs from 1943, 1955, 1961, 1965, 1970, 1976, 1982, 1991, 2000 and 2009 were reviewed to assess historical site use and surrounding land use, and to determine when changes to the use of site may have occurred.

Copies of the aerial photographs are included in pp. 65-74 in the Lotsearch Risk and Planning Report in **Appendix C**. The relevant information from the aerial photographs review is summarised in Table 4-3.

Table 4-3 Summary of Aerial Photography

Year	Description of the Subject Site	Description of Surrounding Land
1943	The site contains land uses relating to farming and agricultural activities. The majority of the site contains parcels of horticultural land, with the southern end of the site containing several small buildings and structures, two large warehouse style buildings and several trees.	Surrounding land uses largely consist of farming and agricultural activities. Low to medium residential properties are located to the south, southeast and north west of the site. King Street is present to the south of the site and O'Riordan Street to the east of the site.
1955	A large warehouse building previously located in the southern portion of the site has been demolished. Three large warehouse buildings have been constructed in the north western section of the site. Lot 1 DP 202747 and Lot B DP164829 (centre of the site) appear to be functioning as commercial / industrial storage areas, possibly in relation to the construction of the railway line.	Construction of the Airport / Qantas jet base has commenced to the southwest of the site. The portion of land located just east of the site is being used for commercial / industrial storage, possibly in relation to the construction of the railway line. Several large commercial / industrial areas containing large warehouse / factory buildings have been constructed in the eastern and north eastern sections of the site. The signage 'York Motors' is evident on the roof of a large industrial building located northwest of the site.
1961	A new warehouse building has been constructed in the central portion of the site. The north western section of the site appears to contain stockpiled and stored material associated with the warehouse buildings residing in this section of the site. The southernmost allotment of the site has been cleared completely of buildings and vegetation.	The construction of the Airport southwest of the site has been finalised and the railway line has been constructed to the west of the site. Several additional large commercial / industrial warehouse buildings have been constructed to the north, south and northwest of the site.
1965	A concrete slab has been laid in the south eastern portion of the site. The farming and agricultural land formerly present in the northern portion of the site has been cleared and is now vacant land.	Site surrounds remain largely unchanged.
1970	The southern portion of the site now contains a large glass factory, complete with several large warehouse style buildings, above ground storage tanks in the north eastern section and a storage yard in the southwest of the site. The portion of the site just north of the glass factory appears to contain stored industrial material related to	Qantas Drive is now present to the west of the site. A Toyota warehouse building is present just east / northeast of the site.

	the Toyota factory located northeast of the site. The northern eastern portion of the site now contains the corner of a commercial / industrial site to the northwest and industrial storage material in the northeast. The construction of the Qantas Catering building has commenced in the north western section of the site. The northern section of the site is now in its present day configuration, largely being used as a carpark.	
1976	The construction of the present day Qantas Catering building has been completed and the bridge connecting the Qantas Catering building to the Qantas jet base west of the site has also been constructed.	Site surrounds remain largely unchanged.
1982	The above ground tanks and stacks have been removed from the glass factory site, however the warehouse buildings remain onsite. The remainder of the site remains largely unchanged.	Site surrounds remain largely unchanged.
1991	The southern section of the site is in the present-day carpark configuration. All warehouse buildings have been demolished with the exception of one warehouse building located in the south western portion of the site. The former warehouse building slabs still remain.	Site surrounds remain largely unchanged.
2000	The former Toyota storage yard (formerly located in the north eastern section of the site) has been converted to a carpark. The site is now the same as the present-day configuration, with the exception of the present day Tri-Generation Plant which has not been constructed.	The large warehouse building located south of the site has been demolished and the site is now a Qantas carpark.
2009	The site remains largely unchanged.	The Mascot Galvanising facility located southeast of the site has been demolished.

Based on the review of historical aerial photographs, the site appears to have been used largely for farming and agricultural purposes between 1943 and 1961, with the southern portion of the site operating as a glass factory between approximately 1965 and 1982. The site has been in its present-day configuration since at least 2000, with sections of the site being converted to the present-day carparks at different times between 1976 and 2000. The Tri-Generation Plant located in the north eastern section of the site appears to have been constructed post 2009. The surrounding land has been either developed or used for farming and agricultural purposes since at least 1943.

It is noted that conclusions drawn from the aerial photographs must be treated with caution as the interpretation is subjective and is often limited by the quality of the photograph.

4.4 Title Search

A historical title search was carried out by Advance Legal Searchers Pty Ltd for Lot 4 DP 234489, Lot B DP 164829 and Lot 133 DP 659434 and is presented in ***Appendix D***.

4.4.1 Lot 4 DP 234489

The summary of proprietors for Lot 4 DP 234489 shows that the land was primarily used for farming and agricultural purposes between 1906-1964, before being used as the site of a glass bottle manufacturing plant between 1964-1980, before being owned by Qantas from 1980 to present.

Between 1906-1964, the proprietors of the lot included a market gardener and a series of retired poultry farmers. The lot was also leased to a market gardener between 1942-1944. Thomas Playfair Proprietary Limited, an Australian butcher, were proprietors of the lot between 1956-1964.

Between 1964-1980, the proprietor of the lot was A.C.I. Operations Pty. Limited., a glass bottle manufacturer, which included a leasing period between 1969-1980 to Sydney Electricity of substation no. 2485.

Qantas became the proprietor of the lot from 1980 to date. The lot has a current lease to Sydney Electricity of substation no. 2485 which began in 1992 and several additional electricity network assets since 2017.

4.4.2 Lot B DP 164829

The summary of proprietors for Lot B DP 164829 shows that the land was primarily used for farming and agricultural purposes between 1906-1947, before being used for industrial land uses between 1947-1991 and thereafter being owned by Qantas from 1991 to date.

Between 1906-1947, proprietors of the lot primarily included a series of market gardeners.

Between 1947-1991, the lot was owned by a smelter, Heavy Equipment (NSW) Pty. Limited, F.G.S. Storage Pty Limited and Thiess Properties Pty. Limited.

The lot has been owned by Qantas since 1991.

4.4.3 Lot 133 DP 659434

The summary of proprietors for Lot 133 DP 659434 shows that the land was primarily used for farming and agricultural purposes between 1906-1957, before being owned by the Government between 1957-1971 and thereafter being owned by Qantas from 1971 to date.

Between 1906-1957, two market gardeners were proprietors of the lot.

From 1957-1971, the lot was owned by The Commonwealth of Australia.

The lot has been owned by Qantas from 1971 to present.

4.5 NSW EPA Contaminated Land Search

A search of the NSW EPA Contaminated Land database for the property was conducted as part of this PSI. The NSW EPA does not hold records of notification of this site to NSW EPA as a contaminated site under Section 60 of the CLM Act (1997). There is one (1) site located within 100 m of the site that have been notified to the

NSW EPA under Section 60 of the CLM Act (1997), the Former Mascot Galvanising facility, which is located 40 m southeast of the site.

There is one (1) licensed activity under the POEO Act 1997 on Lot 133 immediately north of the site, Enwave Mascot Pty Ltd, whose activity is the generation of electrical power from gas. There are two (2) licensed activities under the POEO Act 1997 located within 100 m of the site (Sydney Trains and Australian Rail Track Corporation Limited).

There is one (1) delicensed activity at the site that is still regulated by the EPA, Qantas Flight Catering Limited, whose activity is Hazardous, Industrial or Group A Waste Generation or Storage. There are two (2) delicensed activities still regulated by the EPA located within 100 m of the site (Qantas Airways Limited and Sydney Airport Corporation Limited).

No activities at the site were formerly licensed under the Protection of the Environment (Operations) Act (POEO) 1997. There is one (1) site that was formerly licensed under the Protection of the Environment (Operations) Act (POEO) 1997, Industrial Galvanizers Corporation Pty Ltd, located 40 m southeast of the site.

There are no EPA PFAS investigation programs at the site. The Botany Bay and Georges River areas located 27 m south of the site are part EPA PFAS investigation program.

4.6 WorkCover NSW Dangerous Goods Search

No dangerous goods searches were undertaken for this investigation.

4.7 Past Industrial Processes

There is evidence that the middle area of the site was at least used as an industrial storage area. Between 1947-1991 the site was owned by a smelter, Heavy Equipment (NSW) Pty. Limited, F.G.S. Storage Pty Limited and Thiess Properties Pty.

4.8 Manufacturing Processes

Between 1964-1980, the glass bottle manufacturer A.C.I. Operations Pty. Limited. operated on the southernmost lot at the site.

The Historical Business Directories included in the Lotsearch report (***Appendix C***) indicate a history of manufacturing processes in the site surrounds. The 1961-1991 historical business directories indicate that several manufacturing processes including galvanising, manufacture of pressure vessels, pump equipment, food products, dye and bleach, adhesive, polish, wax, nuts and bolts and screws all occurred within 100m of the site.

Service diagrams and aerial photos also indicate that a rail line formerly entered the site for transport of goods during A.C.I. Operations activities at the site.

There is no evidence of historic manufacturing processes that can be clearly linked to the use of PFAS nor a history of bulk storage of chemicals and fuels that may clearly identify PFAS as an CoPC at the site. However, the site contains fill material of unknown origin, historic firefighting / drills and offsite sources must also be considered.

4.9 Hazardous Materials

No hazardous materials were observed during the site walkover, however given that several houses and commercial / industrial buildings onsite were constructed in the 1940s to 1970s, it is possible that asbestos was used in the building materials.

4.10 Storage Tanks

Two underground storage tanks (USTs) were observed in the vicinity of the north western bus carpark. The USTs contained diesel and petrol.

The site is located within an underground petroleum storage system (UPSS) sensitive zone. UPSS sensitive zones represent a conservative assessment of areas that are likely to be vulnerable to contamination from leaking UPSS, or in close proximity to vulnerable environmental receptors. Refer to Page 19 of the Lotsearch Report in ***Appendix C***.

4.11 Discharges to Land, Water and Air

No information for the site regarding discharges to land, water and air was available for review at the time of writing this report.

5 SITE CONDITION AND ENVIRONMENTAL SETTING

5.1 Topography

The topography of the site is largely a result of cutting and filling. The site elevation peaks in the centre of the site and along the eastern border, and slopes very slightly to the northwest. The site has an approximate elevation of 6 m Australian Height Datum (AHD). Refer to the Elevation Contour Map on page 84 of the Lotsearch Report in ***Appendix C***.

5.2 Visible Signs of Contamination

Oil, petrol and diesel staining were observed on the ground surface within the north western bus carpark and refuel area.

There were no visible signs of plant stress noted during the site investigations on the site, or the surrounding areas to the site.

5.3 Presence of Drums and Wastes

No drums or wastes were noted during the site walkover.

5.4 Fill Material

Current levels at the site are a result of cutting and filling into the natural surface elevation to make the site suitable for the present day use as a carpark. Fill material was observed to a maximum depth of 3.50 m bgl and generally consisted of a layer of asphalt and or concrete hardstand, underlain by a poorly sorted sandy gravel road base and a layer of reworked silty sand.

5.5 Odours

Hydrocarbon odours were observed during the site walkover in the general vicinity of the Qantas bus refuel area and bus maintenance area located in the north western corner of the site.

5.6 Geology

The Sydney 1:100,000 Geological Map indicates that the site is underlain by the following geological units and structures;

- Quaternary medium to fine-grained marine sand with podsols; and
- Quaternary peat, sandy peat and mud.

Refer to page 109 to 110 of the Lotsearch report in ***Appendix C*** for the site geology.

The Sydney 1:100,000 Soil Landscapes map indicates that the soil landscape of the site comprises Tuggerah aeolian and disturbed terrain soils.

Refer to page 112 to 113 of the Lotsearch report in ***Appendix C*** for the soil landscape of the site.

Geological field observations recorded during drilling works are detailed in Section 10.1.1.

5.7 Hydrogeology

A review of NSW Department of Primary Industries Office of Water records for groundwater bores within a 2 km radius of the site indicated the presence of 276 water bores. The majority of existing boreholes are used as monitoring bores, but are also used for industrial, testing, domestic, irrigation and recreational purposes. Recorded standing water levels (SWL) of the bores ranged from 0.90 m to 14.90 m below ground level (bgl).

For the full list of registered groundwater bores within the 2000 m dataset buffer, refer to page 87-97 of the Lotsearch report ***Appendix C*** for the hydrogeology data.

5.8 Hydrology

The nearest surface water deposit is Alexandra Canal, which is located approximately 700 m west of the site. The Alexandra Canal drains into Botany Bay, located approximately 2.50 km south of the site.

The Sydney Water Corporation have an open surface water drain/channel asset that is aligned East – West and bisects the site North from South (Lots 1, 3 & 5, DP 234489) that reports into Alexandra Canal. The channel is a brick and concrete lined construction, features a tree lined margin and has a single overpass / bridge. Sydney Water records show the downstream channel invert as 1.029 mAHD at the location of the bridge. SWL's of the five (5) new groundwater bores constructed at the site ranged between 0.975 and 3.553 mbtoc. MW03, the groundwater bore closest to the Sydney Water asset, recorded an SWL of 3.497 mbtoc (1.3073 mAHD). Groundwater levels fluctuate, however, they are unlikely to contributing substantial volumes of water into the lined channel running through the site.

5.9 Acid Sulfate Soil Risk

Review of the *Botany Bay Local Environmental Plan 2013* Environmental Planning Instrument (EPI) indicated that the site is located in a Soil Class 2 Acid Sulfate Soils area. The description of a Soil Class 2 area is 'works below natural ground surface present an environmental risk works by which the water table is likely to be lowered present an environmental risk'.

A review of the Atlas of Australian Acid Sulfate Soils (ASS) map shows the site is situated in a Class B category with a low probability of occurrence (6-70% chance of occurrence) with occurrence across the site.

An Acid Sulfate Soil Investigation and Management Plan for the Site are documented in a separate report.

Refer to pages 116-119 of the Lotsearch in ***Appendix C***.

6 PREVIOUS INVESTIGATIONS

Two (2) previous investigations related to the USTs in the north western portion of the site (west of the Qantas Catering building) were reviewed by Arcadis and are summarised below.

6.1 Environmental Strategies (2013), Tank Pit Investigation Qantas Transport Facility, Mascot NSW

The report 'Tank Pit Investigation Qantas Transport Facility, Mascot NSW' was prepared by Environmental Strategies (ES) in May 2013. The report covers an investigation of the tank pit area and refuel area located in the north western section of the site at the Qantas Transport Facility. The main findings of the report are summarised below:

- ES was commissioned by Qantas to identify potential soil and groundwater impacts around several underground storage tanks (USTs) in order to determine if any impact to the environment had historically occurred or was presently occurring.
- Two USTs were present on the site at the time of inspection (one diesel UST and one unleaded petrol UST). Each UST had an approximate capacity of 20,000L. Both USTs were in use and were reported to be used to fill Qantas service vehicles and passenger transport buses.
- ES completed a site walkover and drilling of four (4) boreholes (two down-gradient, one cross-gradient and one upgradient) and the conversion of the boreholes into groundwater monitoring wells MW1, MW2, MW3 and MW4 in the vicinity of the tank pit area. Boreholes were extended 4m below ground level (bgl) and converted into groundwater monitoring wells.
- One (1) soil sample of the fill/near surface material and one (1) sample from the groundwater strike depths (approximately 2.10 m bgl on average) were collected at each borehole. Soil samples were analysed for TPH, BTEX, PAHs and Heavy Metals (lead).
- Gauging, purging and sampling of the four (4) monitoring wells and collection of groundwater samples. Groundwater samples were submitted to the NATA accredited laboratory Envirolab for analysis of TPH, BTEX, PAHs and Heavy Metals (As, Cd, Cr, Cu, Pb, Hg, Ni, Zn).
- The soil profile encountered during the UST investigation was observed to be dark brown/black sandy fill with large crushed sandstone rocks underlain by dark brown med-fine grained sand. Hydrocarbon odours were noted at 2.2m in BH1, 2.4m in BH3 and 1.7m in BH4.
- Soil analytical results indicated the soils sampled around the UST met the assessment criteria for the contaminants of concern and the site is suitable for the continued commercial/industrial land use.
- Groundwater analytical results reported all contaminants of concern (TPH, BTEX, PAH and heavy metals) below the adopted assessment criteria.
- High concentrations of >C10-C16 (6,500 µg/L) and >C16-C34 (12,000 µg/L) were reported at MW1 however there were no guidelines for this contaminant at the time of reporting.
- ES considered that the USTs had not impacted surrounding soil and groundwater to a level where it would pose a risk to workers for commercial / industrial land use and the groundwater environment. Risks associated with contractor exposure to soils as a result of UST operations were considered to be negligible.

6.2 Environmental Strategies (2016), Underground Petroleum Storage System, Groundwater Monitoring Event at the Qantas Transport Facility, Mascot NSW

The report 'Underground Petroleum Storage System, Groundwater Monitoring Event at the Qantas Transport Facility, Mascot NSW' was prepared by Environmental Strategies (ES) in August 2016. The report covers an investigation of the tank pit area and refuel area located in the north western section of the site at the Qantas Transport Facility. The main findings of the report are summarised below:

- ES was commissioned by Qantas to conduct a groundwater monitoring event (GME) at the four (4) existing wells MW1, MW2, MW3 and MW4 drilled by ES (2013) in the vicinity of the underground petroleum storage system (UPSS) at the Qantas Transport Facility.
- Groundwater samples were analysed for BTEX, TRH, PAHs and lead.
- Concentrations of lead, BTEX, TRH, and PAH analytes in all groundwater samples submitted for analysis were reported below the NEPM (2013) GILs.
- Concentrations of TRH fractions >C10-C14 (6,500 µg/L) and >C10-C36 (18,550 µg/L) remained relatively stable at MW1 following the historical (2013) groundwater sampling event.
- ES considered that the UPSS infrastructure had not impacted surrounding groundwater to a level where they would pose a risk to workers for commercial / industrial land use and the groundwater environment.

From the summarised historical reports, Arcadis considers that chemical impact in the soil and groundwater within the vicinity of the USTs located at the Qantas Transport Facility has historically been reported below the adopted guidelines.

7 CONCEPTUAL SITE MODEL

Based on the information available for the site as summarised in Section 3 to Section 5, the following preliminary conceptual site model (CSM) has been prepared. The CSM identifies complete and potential pathways between the known or potential source(s) and the receptor(s).

7.1 Source

Potential sources of contamination at the site and the associated contaminants of potential concern (CoPC) include:

Table 7-1 – Potential Contaminant Sources.

Source	Associated Chemicals	CoPC
Potential Onsite Sources		
Soils within the former farming / agricultural areas	Pesticides and herbicides	OCPs, OPPs, DDT, arsenic
Old buildings previously located onsite	Asbestos, building materials	Asbestos, heavy metals
Fill materials of unknown origin and composition – entire site	Asbestos, ash, slag, foundry waste	Asbestos, PAH, heavy metals, TRH, BTEXN
USTs in the Qantas bus refuel area located to the north west of the site.	Diesel and petrol.	TRH, BTEXN, PAH, Lead
Previous commercial / industrial land use associated with historical rail operations accessing the property from the west.	Asbestos building materials and break-pads, Herbicides, Ash.	Asbestos, PAH, heavy metals, TRH, BTEXN, OCPs, OPPs, PCB, PFAS.
Previous commercial / industrial and manufacturing land uses onsite including glass bottle manufacturing, smelting, storage of industrial and heavy equipment and leasing of land for electrical substation usage.	Asbestos and building materials, glass, metals, slag, foundry waste.	Asbestos, PAH, heavy metals, TRH, BTEXN, VOCs/SVOCs, PFAS.
Sydney Water Corporation concrete lined canal running through the centre of the site.	Pesticides, Herbicides, Hydrocarbons.	PAH, heavy metals, TRH, BTEXN, OCPs, OPPs, PCB, PFAS.

7.2 Potentially Affected Media

Potentially affected media at the site include:

- Soil, and
- Groundwater.

7.3 Pathways

Pathways or transport mechanisms by which receptors may be exposed to contamination on and offsite include:

- Direct contact with contaminated soil / groundwater;
- Ingestion of dust;
- Inhalation of asbestos fibres.

All these pathways are considered to be potentially complete at the site.

7.4 Receptors

Potential receptors to contamination at the site were identified to include:

- Site workers;
- Intrusive maintenance workers;
- Demolition/construction workers;
- Future site users;
- Surrounding residents; and
- Groundwater users (offsite).

7.5 Exposure Assessment

Based on the preliminary CSM discussed in Section 7.1 to Section 7.4 and a review of historical site investigations, the potential for contamination to be present at the site is considered to be moderate to high.

8 SAMPLING, ANALYSIS PLAN

This section outlines the methodology adopted by Arcadis during the intrusive works conducted as part of the ESA. Field methods undertaken by Arcadis were conducted in general accordance with relevant NEPM guidelines endorsed by NEPC. This section also provides details on the sampling and analysis, rationale for soil sample locations, description of field equipment used, decontamination procedures, field and laboratory quality assurance and control, laboratory analytical methods and sample preservation.

8.1 Data Quality Objectives

The Data Quality Objectives (DQO) process is a systematic planning tool based on the scientific method for establishing criteria for data quality and for developing data collection designs. The DQO defines the experimental process required to test a hypothesis. The DQO process has been developed to ensure that efforts relating to data collection are cost effective, by eliminating unnecessary, duplicative or overly precise data whilst at the same time, ensuring the data collected is of sufficient quality and quantity to support defensible decision making.

It is recognised that the most efficient way to accomplish these goals is to establish criteria for defensible decision making before data collection begins and develop a data collection design based on these criteria.

The DQO process consists of seven steps, which are designed to clarify the study objectives, define the appropriate type of data and specify tolerable levels of potential decision errors. The seven-step DQO process adopted for this ESA can be summarised as:

- **Step 1:** State the Problem – concisely describe the problem to be studied. Review prior studies and existing information to gain a sufficient understanding to define the problem;
- **Step 2:** Identify the Decision – identify what questions the study will attempt to resolve, and what actions may result;
- **Step 3:** Identify the Inputs to the Decision – identify the information that needs to be obtained and the measurements that need to be taken to resolve the decision statement;
- **Step 4:** Define the Study Boundaries – specify the time periods and spatial area to which decisions will apply. Determine when and where data should be collected;
- **Step 5:** Develop a Decision Rule – define the statistical parameter of interest, specify the action level, and integrate the previous DQO outputs into a single statement that describes the logical basis for choosing among alternative actions;
- **Step 6:** Specify Tolerable Limits on Decision Errors – define the decision maker's tolerable decision error rates1 based on a consideration of the consequences of making an incorrect decision; and
- **Step 7:** Optimise the Design –evaluate information from the previous steps and generate alternative data collection designs. Choose the most resource-effective design that meets all DQOs.

The DQOs are provided in Table 8.1 and were derived in accordance with *AS 4482.1-2005.*

Table 8.1 Project DQOs.

Step	Detail

State the Problem	To assess whether elevated concentrations of COPC are present in fill material, near surface soils, natural soils and the groundwater table. Additionally, to make recommendations for further investigation, remediation and or management if required.
Identify the Decision	If elevated concentrations of COPCs were identified at the site: • What is the extent of the impact? • Does any COPC at the subject site occur at concentrations that pose or may pose an unacceptable liability or risk to the environment and/or human health to persons who will utilise the future development? • If so what is the order of priority to minimise the risk and what additional measures are required to mitigate or manage the risk? Key data required to resolve the problem included concentrations of COPC in the soil and groundwater collected in the study area. The COPC selected were determined through onsite observations and the conclusions of the Phase 1 Assessment provided within this report.
Identify the Inputs to the Decision	The guidelines adopted by Arcadis to assess the soil results are as follows: • Health Investigation Levels (HIL-D) Commercial / Industrial; • Health Screening Levels (HSL-D) Commercial / Industrial – Sand; • Ecological Screening Levels (ESL) Commercial / Industrial - Coarse Soil; • Management Limits Commercial / Industrial – Coarse Soil; • HEPA PFAS NEMP 2018 Health Commercial / Industrial; and • HEPA PFAS NEMP 2018 Interim EIE Commercial / Industrial. The guidelines adopted by Arcadis to assess the groundwater results are as follows: • ANZG 2018 Marine Water 95% trigger value; • NEPM 2013 Groundwater Investigation Levels (GIL) – Marine Water; and • HEPA PFAS NEMP 2018 – Marine Water 95%. Further explanation for the selection of these criteria is provided below in Section 8.4.
Define the Study Boundaries	This ESA was restricted to the defined areas, as shown in ***Figures 1*** and ***2 Appendix A***. The vertical extent of the study boundaries was limited to a maximum depth of 6.0 m bgl. The temporal boundaries of the study were limited to the date that the investigation was completed listed in Section 7.3 and 7.4.
Develop a Decision Rule	If the concentrations of COPCs in the soil and groundwater are reported to be below the relevant adopted guidelines, then the soil and/or groundwater will be deemed suitable and no further investigations will be proposed prior to the site being developed. If, however,

Specify Tolerable Limits on Decision Errors	the concentration of one or more COPCs are greater than the guidelines, then further assessment will be required to laterally and vertically delineate the extent of the impact and/or recommendations made for the remediation/management of contamination to render the site suitable for the proposed use. The acceptable limits for samples are as follows: • % RPD for laboratory duplicates for TPH and BTEX analysis is less than 60%; and • Recovery of matrix spikes and surrogate spikes is as per the laboratory's Quality Assurance targets accepted under their National Association of Testing Authorities (NATA) accreditation. Precision is measured using the standard deviation 'SD' or Relative Percent Difference '%RPD'. Replicate data for field duplicates of organics is expected to be as follows: • RPD criteria of 50% or less, for concentrations > or = 10 times PQL; • RPD criteria of 75% or less, for concentrations between 5 and 10 times the PQL; and • RPD criteria of 100% or less, for concentrations < 5 times PQL. Replicate data for field duplicates for inorganics, including metals is expected to be as follows: • RPD criteria of 30% or less, for concentrations > or = 10 times PQL; • RPD criteria of 75% or less, for concentrations between 5 and 10 times the PQL; and • RPD criteria of 100% or less, for concentrations < 5 times PQL. • Where acceptable limits for field duplicates were not met, a discussion on low biased error will be provided.
Optimise the Design	Soil and groundwater sampling locations were selected for efficient and representative sampling, based on accessibility and where potential soil impacts were likely to be present. Soil samples were collected at relevant intervals, changes in geology or in zones of gross contamination. Groundwater samples were collected from each well onsite following the stabilisation of groundwater parameters.

8.2 Schedule of Works

The schedule of work conducted by Arcadis was as follows:

12th – 14th December 2018

- Site walkover;
- Commencement of soil bore drilling and groundwater well installation;
- Collection of soil samples;
- Soil logging;
- Groundwater well development.

18th – 19th December 2018

- Additional soil bore drilling and groundwater well installation;
- Collection of soil samples;
- Soil logging;
- Groundwater well development.

8th January 2019

- Groundwater monitoring event for newly installed wells MW01-MW07.

11th and 12th February 2019

- Site walkover of north western site area;
- Service location of test holes located in north western site area;
- Additional soil bore drilling; and
- Soil logging and sample collection at additional borehole locations.

19th February 2019

- Groundwater monitoring event for existing wells MW1-MW4.

8.3 Sample Location and Analysis

Based on the site area of approximately 5 ha (excluding the area of the building footprint of the Qantas Catering Building), a total of fifty-six (56) sample locations were completed to meet the required minimum number of sampling points to characterise a site in accordance with the relevant industry NSW EPA (1995) Sampling Design Guidelines. Seven (7) of the soil bores were converted into groundwater monitoring wells for groundwater analysis. The four (4) existing wells located within the vicinity of the USTs west of the Qantas Catering Building were also sampled for groundwater analysis.

The sample locations were chosen to be at accessible locations around the site, as shown in ***Figure 2, Appendix A***. A rationale for the sample locations and the associated soil and groundwater analytical suite is provided in Table 8.2 and Table 8.3 respectively.

Although multiple samples were collected from each borehole, one sample from the fill at every borehole and one sample from the natural form every second borehole were analysed.

Table 8.2 Soil Sampling Descriptions

Sample Point Depth (m)	Reason for Sampling Point	Analyte Suite
BH01 – BH48 and MW01 – MW07	Grid sample – site coverage	TRH, BTEXN, VOCs, SVOCs including OCPs/OPPs/PCBs, 8 metals (As, Cd, Cr, Cu, Ni, Pb, Zn, Hg), Asbestos (surface samples only[1]), PFAS

[1] Sampling for screening of asbestos applies to the upper profile, approximately 0.1 mbgl and 0.2 mbgl deemed to be representative of the 'fill' material beneath surface finishes (asphalt, concrete etc.).

Table 8.3 Groundwater Sampling Descriptions

Sample Point Depth (m)	Reason for Sampling Point	Analyte Suite
MW01 – MW07	Targeted sampling for historical land uses and general site coverage	TRH, VOCs, SVOCs, 8 metals (As, Cd, Cr, Cu, Ni, Pb, Zn, Hg), ammonia, PFAS
MW05 and MW07	Targeting historical glass bottle factory land uses	TRH, VOCs, SVOCs, 8 metals (As, Cd, Cr, Cu, Ni, Pb, Zn, Hg), ammonia, PFAS
MW1 – MW4	Targeting USTs and related fuel infrastructure	TRH, VOCs, SVOCs, 8 metals (As, Cd, Cr, Cu, Ni, Pb, Zn, Hg), ammonia, PFAS

8.4 Soil Assessment Criteria

8.4.1 National Environment Protection Measure (NEPM) 2013

The National Environment Protection Measure (NEPM) 1999 as amended 2013 provides guidelines for the investigation of soil contamination in commercial/industrial areas. These guidelines are endorsed by the New South Wales Environment Protection Agency (NSW EPA). The Site is located within the state of NSW and meets the definition of commercial/industrial land use.

Soil contaminant concentrations have been assessed against the NEPM Soil Health Investigation Levels (HIL) D Commercial / Industrial as the proposed future use of the site is the construction of commercial facility.

Health Screening Levels (HSL) D Commercial / Industrial (Sand) have been adopted to evaluate the risk posed from potential vapour intrusion. The soil HSLs are based on depth of impacts, overlying soil type and land use. The selection of HSL D (Commercial / Industrial) was chosen based on the intended future use of the site, the potential receptor/s onsite and the exposure that may be experienced. After a review of subsurface conditions, the predominant soil type is typically sand, with topsoil comprising fill material across the site. HSLs for sand have been adopted as a conservative approach.

Ecological Screening Levels (ESLs) for coarse grained soil were selected to evaluate the risk of historical practices at the site to terrestrial ecosystems within the initial 2m bgl. The ESL provide guidance for petroleum hydrocarbons in soil and have been included for completeness, noting that the depth of excavation for the development may exceed 2m.

Management Limits (MLs) for Commercial / Industrial land use have been adopted considering the potential for underground storage tanks both onsite and offsite. ML are used to consider the potential formation of light non-aqueous phase liquids (LNAPL), fire and explosion risks and damage to buried infrastructure. Coarse grained sand guidelines were selected due to the grain size observed during intrusive works.

8.4.2 Heads of EPAs Australia and New Zealand (HEPA) PFAS National Environmental Management Plan 2018

The Heads of EPAs Australia and New Zealand (HEPA) PFAS National Environmental Management Plan (NEMP) 2018 Industrial / Commercial soil human health screening values and interim soil ecological indirect exposure (EIE) have been

adopted considering the potential for PFAS for be present onsite due to historical commercial / industrial land uses.

There is no evidence of historic manufacturing processes or bulk storage of chemicals and fuels that may identify PFAS as an CoPC at the site. However, the site contains fill material of unknown origin, as such, must be considered as a potential source. The site is not currently subject to an EPA PFAS Investigation Program, however, offsite sources must also be considered.

Construction at the site will involve limited cut and fill earthworks and minor excavations for a services and utilities trenches, lift wells and a pool. The proposed developed as includes the majority 'slab on grade' training building, multideck carpark surrounded by sealed surfaces (internal road network, ground level parking, etc.) with minimal access to soils and groundwater.

The site is zoned 'IN1' – General Industrial and is located within the Sydney Airport support services precinct. The nearest residential area is located approximately 200 m southeast and hydraulically upgradient of the site and is comprised medium to high density residential dwellings. A Sydney Water concrete lined canal runs through the site which drains into Alexandra Canal ~700 m northwest. Alexandra Canal ultimately reports into the marine waters of Botany Bay 2.50 km south of the site.

Arcadis consider the HEPA, NEMP and EIE assessment criteria to be conservative but appropriate.

Soil analytical results are tabulated with the adopted soil assessment criteria in **Appendix E**.

8.5 Groundwater Assessment Criteria

8.5.1 Groundwater Investigation Levels, National Environment Protection Measure (NEPM) 2013

Groundwater Investigation Levels (GILs) NEPM 2013, Table 1C and the Australian and New Zealand Guidelines for Fresh and Marine Water Quality (Australian and New Zealand Governments (ANZG) 2018) have been selected as an initial screening level as they provide concentrations, which once exceeded, require further investigation into points of extraction and use.

With respect to use of groundwater for human purposes, the site is located within a commercial / industrial area that has ready access to a potable reticulated water source. The site is also part of the Botany Sands Zone 2 embargo area where the use and the extraction of groundwater for beneficial uses is not permitted. Drinking Water Guidelines are therefore not considered to be applicable to the site. Any future changes to the use of the groundwater in the area may require the results of this ESA to be re-assessed.

The GIL for Marine Aquatic Ecosystems (95% Protection Level) have been applied to this investigation as the primary surface water receptor is Botany Bay. Groundwater is expected to flow towards Alexandria Canal located approximately 700 m west of the Site. Alexandra Canal discharges into the Cooks River and then into Botany Bay located approximately 2.50 km south of the Site. Botany Bay is a tidal marine environment and recognised as being a highly disturbed ecosystem. The 95% Protection Level is applicable as it applies to slightly to moderately disturbed systems.

8.5.2 Australian and New Zealand Governments 2018

The ANZG 2018 95% protection level trigger value for marine water was applied to this investigation as the site is considered to be slightly to moderately disturbed. The

Australian and New Zealand Guidelines for Fresh and Marine Water Quality (Australian and New Zealand Governments (ANZG) 2018) 95% Protection Level trigger value was applied to this investigation as the site is considered to be slightly to moderately disturbed.

The ammonia Groundwater Assessment Criteria (GAC) of 0.91 mg/L was initially used as a screening tool to evaluate areas on the Site that were potentially impacted by ammonia. Section 8.3.7.2 of the ANZECC (2000) Guidelines discusses the impact of pH on ammonia toxicity. The guideline discusses that the derivation of the ammonia trigger values, used for the GAC, was calculated using a pH of 8 for 95% protection of species:

"A freshwater high reliability trigger value of 900 µg/L TOTAL ammonia-N was calculated at pH 8.0 using the statistical distribution method with 95% protection. This translates to about 35 µg/L un-ionised ammonia-N at 20°C. Table 8.3.7 indicates how the guideline figure changes at different pH values."

Table 8.3.7 of the ANZECC (2000) guidelines provide pH dependent trigger values for ammonia that were subsequently adopted by Arcadis to determine if the reported groundwater exceedances pose an ecological risk at the Site. Furthermore, Table 8.3.7 was also used to determine if any other reported ammonia concentration in groundwater, given the individual pH value, would be considered to be above the pH dependent trigger value. Refer to ***Appendix G*** for a comparison of the reported ammonia concentrations in groundwater against individual pH dependent criteria. Arcadis notes that Table 8.3.7 of the ANZECC (2000) guidelines provides trigger values for pH ranges between 6 and 9. The ANZECCC (2000) guidelines states that:

"Extrapolation at pH outside of 6-9 is not advisable, due to the lack of knowledge on the effects of ammonia at these extreme pH levels."

Arcadis has therefore conservatively applied the upper pH dependent trigger value of 5.96 mg/L (pH dependent value trigger value for a pH of 6) to any ammonia sample with a pH less than 6; and the lower pH dependent trigger value of 0.14 mg/L (pH dependent value trigger value for a pH of 9) to any ammonia sample with a pH greater than 9.

8.5.3 Heads of EPAs Australia and New Zealand (HEPA) PFAS National Environmental Management Plan 2018

The Heads of EPAs Australia and New Zealand (HEPA) PFAS National Environmental Management Plan (NEMP) 2018 Marine Water 95% species protection for slightly to moderately disturbed systems guidelines have been adopted considering the potential for PFAS to be present onsite due to historical commercial / industrial land uses.

There is no evidence of historic manufacturing processes or bulk storage of chemicals and fuels that may identify PFAS as an CoPC at the site. However, the site contains fill material of unknown origin, as such, must be considered as a potential source. The site is not currently subject to an EPA PFAS Investigation Program, however, offsite sources must also be considered.

Construction at the site will involve limited cut and fill earthworks and minor excavations for a services and utilities trenches, lift wells and a pool. The proposed developed as includes the majority 'slab on grade' training building, multideck carpark surrounded by sealed surfaces (internal road network, ground level parking, etc.) with minimal access to soils and groundwater.

The site is zoned 'IN1' – General Industrial and is located within the Sydney Airport support services precinct. The nearest residential area is located approximately 200 m southeast and hydraulically upgradient of the site and is comprised medium to high density residential dwellings. A Sydney Water concrete lined canal runs through the

site which drains into Alexandra Canal ~700 m northwest. Alexandra Canal ultimately reports into the marine waters of Botany Bay 2.50 km south of the site. Botany Bay is currently subject to an NSW EPA PFAS investigation.

The WQG advise that the 99% level of protection be used for 'slightly to moderately disturbed' systems. This approach is generally adopted for chemicals that bioaccumulate and biomagnify in wildlife such as PFAS. However, site factors as listed above and an absence of a known onsite source of PFAS, suggest the site is unlikely to pose a significant risk to offsite / downstream receptors.

Arcadis consider the 95% trigger value for slightly to moderately disturbed systems to be conservative, but appropriate.

8.5.4 Health Screening Levels, National Environment Protection Measure (NEPM) 2013

HSL-D will also be applied for screening of groundwater analytical concentrations for the potential of vapour intrusion. A review of the well installation logs for MW01, MW02, MW03, MW04, MW05, MW06, MW07, MW1, MW2, MW3 and MW4 indicates that the wells are installed within sand and the relevant HSLs for sand have been adopted to allow for preliminary screening.

Groundwater analytical results are tabulated with the adopted groundwater assessment criteria in ***Appendix E***. Borelogs and groundwater monitoring well installation logs are provided in ***Appendix F***.

8.5.5 Airport Regulations

Arcadis considers the Airports (Environment Protection) Regulations 1997 under the Airports Act 1996 are not applicable for the site as the site is not located with the Airport boundary.

9 SAMPLING METHODOLOGIES

9.1 Soil Sampling Method

Soil boreholes were advanced using solid flight auger and push tube drilling methods. In locations where concrete was evident at the surface, a concrete corer was used.

Soil bores were advanced to at least 0.50 m into natural material. Soil bores were extended to a maximum depth of approximately 4.50 m below surface level, while soil bores to be converted into monitoring wells were advanced to a maximum depth of 6.00 m.

Fill and natural soil samples were collected directly from the bottom of the auger or otherwise directly from the push tube plastic sleeve using disposable nitrile gloves which were changed between each sampling event.

The soil samples were divided between (a) a snap lock plastic bag for screening with the PID and (b) a laboratory prepared 250ml glass jar with the details of the sample, including the sample name, the job number, the date of sample and the sample depth.

Sample preservation was undertaken in accordance with NEPM (2013). Samples were immediately transferred to an ice filled Esky to chill below 4°C and were subsequently couriered to the laboratory. A signed chain of custody form was completed with the required analysis.

9.2 Nomenclature for Sample Identification

Soil sample identification was as follows:

- BH – Bore Hole locations;
- MW – Monitoring Well locations

9.3 Soil Logging and Sampling

Sampling was conducted in general accordance with *Australian Standard 4482.1-2005 Guide to the Investigation and Sampling of Sites with Potentially Contaminated Soil – Part 1: Non-Volatile and Semi-Volatile Compounds* and Arcadis 'Standard Operating Procedures' for soil sampling.

Soil sampling was conducted during test pit advancement with the soil type/s described in general accordance with the Unified Soil Classification System (USCS). A detailed log was completed at each location. Test pit logs can be found in ***Appendix F*****.** The following details were recorded during drilling:

- Fill thickness and materials, including the presence or absence of indicators of contamination, such as presence of chemical odours, unusual staining, anthropogenic materials, including asbestos-containing materials;
- Natural soils according to the USCS classification;
- Presence or absence of moisture;
- Salt deposits;
- Dead or stressed vegetation;
- Staining; and/or
- Anthropogenic materials.

9.4 Groundwater Sampling

9.4.1 Well Construction and Materials

Soil bores to be converted into groundwater wells were formed using a combination of bore wash and hollow flight auger drilling techniques. Groundwater wells were extended to a maximum depth of 6 m bgl, or to a nominal depth of 2 m beyond the depth at which an aquifer was encountered, whichever occurred first.

The groundwater monitoring well screens comprised 50 mm ID, Class 18, threaded, flush jointed uPVC with machined slots of 0.5 mm width. Casing for the wells comprise 50 mm ID, Class 18, threaded, flush jointed uPVC.

Screened sections of monitoring wells were constructed so as to be positioned both above and below the encountered groundwater level, to enable light non-aqueous phase liquids (LNAPL), if present, to enter the monitoring well.

The well annulus was packed with washed, 1-2mm graded gravel to approximately 0.5m above the top of the screen interval. This was followed by a cement/bentonite seal installed above the gravel pack to just below the ground surface.

All monitoring wells fitted with a flush-mounted cast iron road box using concrete and constructed to prevent surface water from entering wells.

A summary of monitoring well construction detail are provided in Table 9-4.

Refer ***Appendix F*** for copies of the bore logs for detailed well installation details.

Table 9-4 - Monitoring Well Construction Details

Monitoring Well	Depth of Well (m btoc)	Screened Interval (m bgl)	Screened Lithology	SWL 6/4/18 (m btoc)
MW01	4.00	1.00-4.00	Sand	0.975
MW02	4.00	1.00-4.00	Sand	1.418
MW03	5.00	2.00-5.00	Sand	3.497
MW04	5.00	2.00-5.00	Sandy gravel, sand	2.244
MW05	5.50	2.50-5.50	Sand	3.553
MW06	5.00	2.00-5.00	Sand, silty clay	1.896
MW07	5.50	2.50-5.50	Sand	3.340

Note:

- Metres below top of casing (m btoc) and metres below ground level (m bgl).

9.4.2 Well Development and Groundwater Sampling

Development of the newly-installed monitoring wells was conducted using a stainless steel bailer. The stainless steel bailer was cleaned with a Liquinox® wash mixture and rinsed with deionised water between each monitoring well. To the extent practicable each well was developed until the majority of sediment was removed to ensure a good connection between the screened borehole interval and the surrounding aquifer. Well development occurred within 24 hours of monitoring well installation.

Groundwater sampling from wells took place at least one week following well development.

Prior to sampling, and following removal of the well cap, wells were gauged with an interface water level meter to determine depth to water below top of casing and the presence, or otherwise, of LNAPL or dense non aqueous phase liquids (DNAPL). If the interface meter detected either LNAPL or DNAPL, the thickness was recorded and the presence confirmed with a dedicated clear bailer.

Prior to collection of samples, monitoring wells were purged using a peristaltic pump. Monitoring wells were purged at a flow rate of the order of 0.1 - 0.5 L/min to minimise the suspended solids within the purge water. Purging continued until the respective groundwater parameters had stabilised to the levels provided in Table 9-5 below.

Table 9-5 - Stabilisation Criteria

Groundwater Parameter	Adopted Purging Stabilisation Levels
Dissolved oxygen	+/-10%
pH	+/-0.1
Temperature	+/-10%
Electrical conductivity	+/-3%
Redox	+/-10%

Physical indicators such as the presence (and percentage) of suspended solids, colour, the presence/absence and nature of odours and the presence/absence of slicks or sheens on purge water were recorded on the field records, and are provided in **Appendix F**.

Dedicated plastic LDPE tubing was used at each monitoring well. The interface probe was thoroughly decontaminated between gauging events with a phosphate free detergent (Liquinox®) and rinsed with potable water.

Following purging the low-flow sampling equipment was used to directly fill the appropriately preserved laboratory prepared sample containers with groundwater extracted from each well. Care was taken to minimise agitation of water samples and to completely fill sample containers.

For additional sample integrity, single-use, disposable nitrile gloves were used during purging and sampling and were replaced between each sampling location.

The samples for metals submitted for analysis were filtered (through a 0.45 μm cellulose filter).

10 RESULTS

10.1 Field Observations

10.1.1 Soil

Initial soil sampling at the site was undertaken by Arcadis Environmental Scientist Caitlain Regena during drilling works on the 12 – 14 December 2018 and 18 – 19 December 2018. The additional soil sampling works (north western site area) were undertaken by Arcadis Environmental Scientist Tom Keatley on the 11 – 12 February 2019.

Fill material across the site varied in thickness. The depth of fill across the site ranged from 1.20 m to 3.50m and generally consisted of the following layers:

- Asphalt or concrete hardstand surface;
- Road base consisting of sandy gravels, high compaction, poorly sorted, dry;
- Reworked, silty sand, light brown to grey, coarse grained, poorly sorted, some angular gravels. Foreign inclusions including glass fragments, scrap metal, brick fragments, terracotta fragments, woodchips, charcoal, ash and slag were evident at some locations.

The natural material consisted of silty sand, silty clay, clayey sand, sandy silt and peat and was generally described as light grey to brown.

PID measurements varied from 0.0 to 7,408 ppm. The highest PID recording was observed west of the tank farm at BH45 (2.20 m).

Back ground PID readings in the breathing space did not exceed 0.1ppm during soil sampling, suggesting little to no detectable volatiles in ambient air.

Olfactory odours were observed in several testing locations. In the eastern and southern section of the carpark, slight hydrocarbon odours or hydrocarbon odours were observed at MW01, BH03, BH06, BH07, BH12 and BH18. Hydrocarbon odours and strong hydrocarbon odours were observed west of the tank farm located in the north western site carpark in the test locations BH30, BH45 and BH47. A naphthalene odour was observed at BH16, while a sulfur odour was observed at MW02, MW03, MW04, BH01, BH03, BH04, BH07, BH10, BH11, BH16, BH17, BH18 and BH21.

No Light Non-Aqueous Phase Liquids (LNAPL) was observed during soil drilling works.

Two (2) fragments of ACM in the form of bonded fibre cement sheeting measuring approximately 130x40x10mm and 35x20x5mm were identified on the ground surface near the testing location BH48 and at a depth of 1.10 m in BH44, respectively. Both ACM fragments were found to contain chrysotile, amosite and crocidolite asbestos.

10.1.2 Groundwater

The newly installed groundwater wells MW01, MW02, MW03, MW04, MW05, MW06 and MW07 were sampled on the 8 January 2019 by Arcadis Environmental Scientist Tom Keatley.

The existing wells MW1, MW2, MW3 and MW4 located in the UST area west of the Qantas Catering Building were sampled on 19 February 2019 by Arcadis Environmental Scientist Caitlain Regena.

Purged groundwater was generally described as dark brown, light brown or clear. A hydrocarbon odour was observed in MW4 and a slight hydrocarbon odour was

observed in MW3. A sulfur odour or slight sulfur odour was observed at MW02, MW03, MW1 and MW2. No groundwater sheens were observed during groundwater sampling. No LNAPL was observed during groundwater sampling works. Refer to the groundwater field sheets in ***Appendix F***.

Groundwater parameters were recorded using a calibrated YSI water quality meter and are found in Table 10.1.

Table 10.1 - Physico-Chemical Parameters

Well ID	Litres	pH	Temp (°C)	Cond (µS/cm)	DO (ppm)	Redox (mV)*	Comments
MW01	4.0	6.70	27.5	459.5	0.06	195.7	Clear, no odour, no sheen.
MW02	5.0	6.07	24.9	337.8	0	27.8	Clear, slight sulfur odour, no sheen.
MW03	5.0	5.67	22.7	662	0.24	108.4	Clear, sulfur odour, no sheen.
MW04	4.0	5.76	25.7	475	0	75.9	Light brown, no odour, no sheen.
MW05	4.0	5.17	21.6	753	0.03	299.9	Clear, no odour, no sheen.
MW06	5.0	4.96	23.5	854	0	392.7	Clear, no odour, no sheen.
MW07	5.0	5.57	24.3	656	0.79	332.1	Clear, no odour, no sheen.
MW1	4.0	6.14	22.8	570	1.15	-23.0	Dark brown, slightly cloudy, sulfur odour, no sheen.
MW2	5.0	5.94	22.8	412	0.99	-36.0	Light brown, lightly cloudy, slight sulfur odour, no sheen.
MW3	4.0	5.90	23.4	336	0.80	-33.3	Dark brown, turbid, slight hydrocarbon odour, no sheen.
MW4	6.0	5.94	23.5	580	0.73	-23.2	Dark brown, turbid, hydrocarbon odour, no sheen.

*199mV was added to redox field measurement to convert to standard hydrogen electrode (SHE).

The following conclusions have been made based on physico-chemical parameters:

- pH values ranged between 4.96 and 6.70 indicate that the groundwater is slightly acid to near neutral;
- Conductivity was higher in wells MW01-MW07 and ranged between 337.8 and 854 µS/cm indicating fresh groundwater conditions. In MW1-MW4, conductivity ranged between 336 and 580 µS/cm indicating fresh groundwater conditions;

- Dissolved Oxygen ranged between 0.00 to 1.15 ppm suggesting that groundwater is oxygenated in some areas of the site; and
- Redox potential in MW01 - MW07 ranged from 27.8 and 392.7 (mV) indicating a reducing to oxidising groundwater conditions. Redox potential was lower in MW1 - MW4 and ranged from -23.0 to -36.0 mV indicating slightly reducing conditions.

Table 10.2 - Summary of Gauging and Survey Data

Well ID	Easting	Northing	Top of Well Casing Elevation (m AHD)	Standing Water Level (m)	Corrected Water Elevation (m AHD)
MW01	332304.107	6244529.428	-	0.975	-
MW02	332253.9988	6244498.146	3.6523	1.418	2.2343
MW03	332132.8484	6244443.814	4.8043	3.497	1.3073
MW04	332256.6946	6244407.324	4.8519	2.244	2.6079
MW05	332172.1498	6244371.693	5.6153	3.553	2.0623
MW06	332263.111	6244367.401	5.0782	1.896	3.1822
MW07	332199.8783	6244350.118	5.6439	3.340	2.3039
			Total Depth (m)	SWL	
MW1	-	-	*3.594*	2.555	-
MW2	-	-	*3.896*	2.390	-
MW3	-	-	*3.496*	2.341	-
MW4	-	-	*3.895*	2.375	-

Note: MW01 was unable to be surveyed as a car was covering the gatic well cover.

Historic wells MW1 to MW4 installed by ES 2013, were gauged for depth as measured from the top-of-casing beneath the gatic cover, field physiochemical parameters monitored and sample collected on 19th February 2019 as part of the 2018/2019 ESA. These historic wells were not surveyed by Arcadis in 2018/2019.

Based on the data above, groundwater is inferred to be generally flowing in a westerly direction towards Alexandra Canal, refer to ***Figure 3, Appendix A*** for the inferred groundwater flow direction.

The existing wells MW1-MW4 were surveyed in 2013 by ES (2013). Gauging data collected by ES (2013) inferred groundwater in MW1-MW4 to be flowing in a southerly direction. MW1 - MW4 were not surveyed as part of the Arcadis 2018 / 2019 ESA and the survey elevation of the top of casing was unknown at the time of writing.

10.2 Analytical Results

The following section outlines the soil analytical results in comparison to the adopted guidelines.

Soil exceedances are presented in ***Figure 4a, Appendix A*** and groundwater exceedances are presented in ***Figure 4b, Appendix A***.

The soil and groundwater analytical results summary tables can be found in ***Appendix E***.

The laboratory reports issued by Envirolab and ALS are provided in ***Appendix G***.

10.2.1 Soil Analytical Results

10.2.1.1 TRH

Concentrations of C6-C10 in BH47@2.4 (2,560 mg/kg) exceeded the NEPM 2013 Commercial / Industrial Coarse Soil Management Limits guideline (700 mg/kg).

Concentrations of C6-C10 less BTEX (F1) in BH47@2.4 (2,440 mg/kg) exceeded the NEPM 2013 Commercial / Industrial Coarse Soil HSL (Sand) guideline (630 mg/kg mg/kg).

Concentrations of C10-C16 in BH47@2.40 (11,800 mg/kg) exceeded the NEPM 2013 Commercial / Industrial Coarse Soil HSL (Sand) guideline (630 mg/kg mg/kg)

Concentrations of C10-C16 less Naphthalene (F2) in soil samples BH06@0.50 (170 mg/kg) exceeded the NEPM 2013 Commercial / Industrial (Coarse) ESL guideline (170 mg/kg). Concentrations of C10-C16 less Naphthalene (F2) in BH47@2.4 (11,800 mg/kg) also exceeded the NEPM 2013 Management Limits (Coarse Soil) guideline (1,000 mg/kg).

Concentrations of C16-C34 in soil samples BH07@0.20 (2,880 mg/kg), BH17@1.50 (2,270 mg/kg) and BH37@1.1 (1,930 mg/kg) exceeded the adopted NEPM 2013 Commercial / Industrial Coarse Soil ESL guideline (1700 mg/kg). Concentrations of C16-C34 in BH47@2.4 (9,900 mg/kg) also exceeded the NEPM 2013 Commercial / Industrial (Coarse Soil) Management Limits guideline (3,500 mg/kg).

Concentrations of TRH in all remaining soil samples submitted for analysis were reported below the adopted guidelines values. It is noted that the NEPM 2013 ESLs and EILs only apply to the first 2 m of soil at the finished surface/ground level.

10.2.1.2 BTEXN

Concentrations of Benzene in BH47@2.40 (3.40 mg/kg) were reported above the NEPM 2013 Commercial / Industrial (Sand) HSL (3 mg/kg).

Concentrations of BTEXN in all remaining soil samples submitted for analysis were reported below the adopted soil guidelines.

10.2.1.3 Heavy Metals

Concentrations of heavy metals (arsenic, cadmium, chromium, copper, lead, mercury, nickel and zinc) in soil samples submitted for analysis were reported below the adopted soil guidelines, with the exception of lead at BH08@1.00 (1,900 mg/kg) which exceeded the NEPM 2013 Commercial / Industrial HIL guideline value (1,500 mg/kg).

Concentrations of heavy metals in all remaining soil samples submitted for analysis were reported below the adopted soil guidelines.

10.2.1.4 VOCs and SVOCs

Concentrations of benzo(a)pyrene in BH16@0.50, BH17@1.50, BH19@0.40, MW04@0.50, BH32@1 and BH44@0.3 exceeded the NEPM 2013 Commercial / Industrial Coarse Soil ESL guideline value (1.4 mg/kg). Concentrations of benzo(a)pyrene in the above sampling locations ranged between 2.3 mg/kg and 11.9 mg/kg.

Concentrations of VOCs and SVOCs in all remaining soil samples submitted for analysis were reported below the adopted guidelines values.

10.2.1.5 OCPs, OPPs and PCBs

Concentrations of OCPs, OPPs and PCBs in all soil samples submitted for analysis were reported below the adopted guidelines.

10.2.1.6 Asbestos

Soil sample MW05@1.00 was found to contain chrysotile asbestos fibres <7 mm (0.147 g) and asbestos fines (AF) / fibrous asbestos (FA) (0.036 % w/w) that exceeded the adopted NEPM 2013 guidelines (0.001% w/w). Chrysotile and amosite asbestos fibres were detected in MW04@0.50, however the quantity of fibres were not determined by the lab.

One (1) fragment (35 x 20 x 5mm) of bonded cement asbestos was observed in BH44 at a depth of 1.10 m and was confirmed to contain chrysotile, amosite and crocidolite asbestos.

Asbestos fibres, AF/FA or ACM were not detected within any other surface samples submitted for analysis.

10.2.1.7 PFAS

Concentrations of PFAS in all soil samples submitted for analysis were reported below the adopted guideline values.

10.2.2 Groundwater Analytical Results

10.2.2.1 TRH

Concentrations of TRH in all groundwater samples submitted for analysis were reported below the adopted guidelines.

Arcadis considers that the dissolved concentrations of TRH are below concentrations indicative of LNAPL formation.

10.2.2.2 VOCs and SVOCs

Concentrations of VOCs and SVOCs in all groundwater samples submitted for analysis were reported below the adopted guidelines.

10.2.2.3 Heavy Metals

Concentrations of Arsenic in MW02 (27 ug/L) were reported marginally above the adopted NEPM 2013 MW GIL (95%) guideline value (13 ug/L).

Concentrations of Cadmium in MW05 (0.70 ug/L) were reported marginally above the adopted NEPM 2013 MW GIL (95%) guideline value (0.70 ug/L).

Concentrations of Copper in MW06 (4 ug/L) were reported marginally above the adopted ANZG 2018 FW (95%) and NEPM 2013 MW GIL guideline value (1.30 ug/L).

Concentrations of Zinc in MW01, MW02, MW04, MW05, MW06 and MW07 were all reported above the adopted ANZG 2018 MW (95%) and NEPM 2013 MW GIL guideline value (15 ug/L). Zinc concentrations at the former locations ranged between 20 ug/L and 1,660 ug/L.

10.2.2.4 Ammonia

Concentrations of Ammonia in MW03, MW04, MW1, MW2, MW3 and MW4, were reported above the ANZG 2018 MW (95%) guideline value (0.91 µg/L).

Using the groundwater pH readings recorded in the field, the ammonia as N criteria presented in Table 10.3 was extrapolated for locations exceeding the ANZG (2018) MW guideline value (0.91 mg/L). Considering the former, only MW1 (6.60 mg/L) and MW4 (9.00 mg/L) were reported above the adopted extrapolated criteria.

Table 10.3 Ammonia as N ANZG 2018 MW (95%) exceedances and the extrapolated Ammonia as N criteria.

Field ID	Ammonia As N (mg/L)	pH (pH Units)	Extrapolated Criteria (mg/L)
MW03	3.27	5.67	5.96
MW04	0.95	5.76	5.96
MW1	6.60*	6.14	5.87
MW2	3.90	5.94	5.96
MW3	3.20	5.90	5.96
MW4	9.00	5.94	5.96

*Shaded cells exceed the extrapolated assessment criteria.

10.2.2.5 PFAS

Concentrations of PFAS in all groundwater samples submitted for analysis was reported below the adopted guidelines.

PFAS was reported at concentrations greater than the laboratory limit of reporting LOR, but below the site acceptance criteria SAC. The following summarises the range PFOS and PFAS reported concentrations;

Concentrations of PFOS were reported marginally above the LOR (0.01 ug/L) but below the adopted NEMP 2018 (95%) guideline value (0.13 ug/L). Five (5) detections were report above the LOR (range 0.02 ug/L to 0.03 ug/L).

Concentrations of PFOA were reported marginally above the LOR (0.01 ug/L) but below the adopted NEMP 2018 (95%) guideline value (220 ug/L). Two (2) detections were report equal to the LOR (both reported 0.01 ug/L).

Further testing of groundwaters may be required to determine whether PFAS compounds meet the applicable discharge criteria should groundwater extraction be required during construction. Management of groundwaters during construction will be managed through development of a CEMP.

11 QUALITY ASSURANCE AND QUALITY CONTROL (QA/QC)

11.1 Field QA/QA

11.1.1 Decontamination

New nitrile gloves were used between each sample location. Soil samples were collected by hand directly from the push tube sleeve or from the bottom of the auger at each location.

Reusable equipment including the interface probe (IP) and stainless-steel bailer were decontaminated in between locations by rinsing with a phosphate free detergent (Liquinox) and lab supplied deionised water.

11.1.2 Chain of Custody Details

Samples were transferred to the laboratory under chain-of-custody (CoC) procedures. The details included on the chain-of-custody forms included the following:

- Job name and number;
- List of samples;
- Analysis required;
- Date sampled; and
- Date results are required;
- Preservation method;
- Release signature and date;
- Acceptance signature and date

CoCs are provided in ***Appendix G*** along with the laboratory reports.

11.1.3 Sampling Splitting Techniques

Soil duplicate and triplicates were collected by taking a representative sample of the soil at the same depth interval. Due to the potential loss of volatiles, samples were not mixed or homogenised during collection or splitting.

11.1.4 Statement of Replicate Frequency

Arcadis collected field duplicates for intra-laboratory and inter-laboratory QA/QC at a rate of at least 1:20 samples. For this Project, the following QA/QC samples were collected:

- DUP1/TRIP1 were the soil intra-laboratory and inter-laboratory duplicates for BH01@2.00;
- DUP3/TRIP3 were the soil intra-laboratory and inter-laboratory duplicates for MW03@1.00;
- DUP4/TRIP4 were the soil intra-laboratory and inter-laboratory duplicates for MW04@3.00;
- DUP@2.7/TRIP@2.7 were the soil intra-laboratory and inter-laboratory duplicates for BH30@2.7; and
- DUP2@2.2/TRIP2@2.2 were the soil intra-laboratory and inter-laboratory duplicates for BH45@2.2.

Based on the above collected field replicates were at a rate of 1:19 meeting the adopted replicate frequency criteria.

11.1.5 Rinsate Sample Results

Rinsate samples were not collected during the soil sampling works as samples were collected using new nitrile gloves with samples collected from the base of the auger or directly from the push tube. Reusable equipment (interface probe and stainless steel bailer) were thoroughly decontaminated between locations using a phosphate and PFAS free detergent (Liquinox) and double rinsed with laboratory provided deionised water. Arcadis considers that there is a low likelihood of cross contamination using the above sampling procedure.

11.1.6 Trip Blank

Soil and groundwater samples were transported with a laboratory supplied blank soil and groundwater sample. Both blank samples reported analytes below laboratory detection limits indicting that no cross contamination occurred during storage and transportation of samples. In addition, all samples were collected within laboratory supplied sample jars and stored and transported within an ice chilled Esky to prevent the loss of volatile compounds.

Trip blank results are provided in the laboratory reports in ***Appendix G***.

11.1.7 Trip Spike Results

Soil samples obtained on 12-14 December 2018 were unintentionally transported with a laboratory supplied trip spike prepared outside of holding times. The trip spike had been prepared by the lab on 29 October, 2018, with soil samples being received by the lab on 17 December 2018. The holding time for a trip spike is 14 days. As expected, the soil trip spike reported all analytes outside acceptable ranges.

Groundwater samples obtained on 8 January 2019 were transported with a laboratory supplied trip spike. The sample reported analytes between acceptable ranges indicating loss of volatiles did not occur during storage and transportation of samples. In addition, all samples were collected within laboratory supplied sample jars/bottles and stored and transported within an ice chilled Esky to prevent the loss of volatile compounds.

Soil samples obtained on 11-12 February 2019 were transported with a laboratory supplied trip spike and compared against a laboratory supplied trip spike control. Analytes reported a recovery ranging between 66%-75%. Arcadis considers that the recovery rates were reported marginally below acceptable ranges, indicating there is some potential for loss of volatiles to have occurred during storage and transportation of samples. Arcadis maintains that all samples were collected within laboratory supplied sample jars/bottles and stored and transported within an ice chilled Esky to prevent the loss of volatile compounds to the extent practicable.

Trip spike results are provided in the laboratory reports in ***Appendix G***.

11.2 Laboratory QA/QC

11.2.1 Holding Times

Holding times were reported as being outside the specified ranges for the following analytes and samples:

- Monocyclic Aromatic Hydrocarbons, Oxygenated Compounds, Sulfonated Compounds, Fumigants, Halogenated Aliphatic Compounds, Halogenated Aromatic Compounds, Trihalomethanes - BH03@2.00, BH01@0.50, BH01@2.00, DUP1, BH02@1.00, BH02@2.50, MW02@1.00, MW02@6.00, MW06@1.50,

MW06@4.50, BH15@1.50, BH12@1.00, BH24@1.50, BH24@4.50, BH19@0.40, BH06@0.50, BH06@2.40, BH08@1.00, BH08@3.00, BH16@0.50, BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00, BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00, BH23@1.00, BH23@3.00, BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00, BH21@3.00, BH07@0.20.

All samples were submitted by Arcadis to the laboratory within the required holding time.

After a discussion with ALS Environmental, it was concluded that the above samples were analysed outside of holding time due to laboratory time restrictions. Holding time breaches were reported to range from 1-3 days outside of recommended holding time.

ALS noted that holding time exceedances may typically see a low bias (particularly for volatiles due to losses and breakdown. ALS noted that only two analytes (styrene and vinyl chloride) were subject to the 7 day holding time and that given the minor extent of the holding time breach, the potential for some analytes to experience low bias would be expected to be minimal.

Arcadis considers that the holding time breaches are not ideal for the assessment of analyte concentrations and that there is potential for concentrations of the above analytes to be under reported. Considering there were no soil exceedances reported for the former batch of analytes, Arcadis considers the impact on reported results to be minimal.

11.2.2 Laboratory Accreditation for Analytical Methods Used

The primary laboratory used for this Project was ALS Environmental Sydney (ALS). ALS is accredited by NATA to ISO/IEC 17025, accreditation number 825.

The secondary laboratory used was Envirolab Services Sydney (Envirolab). Envirolab is accredited by NATA to ISO/IEC 17025, accreditation number 2901.

11.2.3 Relative percentage Differences

The following soil RPD analytes were outside of acceptable range:

- Soil RPD exceedances for heavy metals ranged between 59% (Lead – BH01@2.00 and interlaboratory duplicate) and 184% (Lead – MW03@1.00 and interlaboratory duplicate); and
- Soil RPD exceedances for SVOCs ranged between 82% (Benz(a)anthracene – MW03@1.00 and intralaboratory duplicate; Benzo(a) pyrene - MW03@1.00 and intralaboratory duplicate; Benzo(a)pyrene TEQ (LOR) – BH01@2.00 and interlaboratory duplicate) and 184% (PAHs (Sum of total) – MW03@1.00 and intralaboratory duplicate).

The exceedances of RPD within soil is most likely due to the heterogenous nature of sampled material. Arcadis is confident that the exceeding RPDs for soil do not affect the integrity of the analytical data as the concentrations of all analytes were reported below adopted criteria.

The detailed RPD table is provided in ***Appendix E***.

11.2.4 Percent Recoveries of Spikes and Surrogates

Laboratory QA/QC is provided in the laboratory reports in ***Appendix G***.

Matrix spikes were generally within acceptable ranges. Matrix spikes reported outside of acceptable ranges were:

- Sample ES1837035—001 for Arsenic - MS recovery not determined, background level greater than or equal to 4x spike level.;
- Sample ES1838193--001 for Perfluorooctane sulfonic acid (PFOS) - MS recovery not determined, background level greater than or equal to 4x spike level.;

Surrogates reported outside of acceptable ranges were:

- Sample ES1838116-021 reported a recovery of 45%-46% for Toluene-D8;
- Sample ES1838116-021 reported a recovery of 27.1%-27.3% for 4-Bromofluorobenzene;
- Sample ES1838116-031 reported a recovery of 55.7%-56.7% for 4-Bromofluorobenzene;
- Sample ES1838118-014 reported a recovery of 55.6%-57.8% for Toluene-D8;
- Sample ES1838118-014 reported a recovery of 40.0%- 41.0% for 4-Bromofluorobenzene;
- Samples ES1904527-038, ES1904527-085, ES1904527-040, ES1904527-043, ES1904527-044, ES1904527-090, ES1904527-046 and ES1904527-055 reported a recovery of 110%-122% for 1.2-Dichlorobenzene-D4; and
- Samples ES1904527-035, ES1904527-010, ES1904527-071 and ES1904527-085 reported a recovery of 122%-125% for 2-Fluorobiphenyl.

Laboratory Control Spike (LCS) Recoveries reported outside of acceptable ranges were:

- Sample QC-2130614-002 reported a recovery of 60.9% for N-Nitrosodiethylamine;
- Sample QC-2130614-002 reported a recovery of 39.2% for 2-Picoline;
- Sample QC-2130614-002 reported a recovery of 55.4% for Bis(2-chloroethyl) ether;
- Sample QC-2184391-002 reported a recovery of 117% and 11% for 2.4.5-Trichlorophenol;
- Sample QC-2185545-002 reported a recovery of 99.2% for 4-Nitroquinoline-N-oxide; and
- Sample QC-2184391-002 reported a recovery of 118% for 4-Nitroaniline.

ALS considered that any potential issues that may have arisen from low surrogate recoveries were non-consequential. However, ALS also noted that if there were considerable detections there is potential for some analytes to experience a low bias as the sample matrix may have distorted or ‘hidden’ the analytes in the run. ALS noted that it was difficult to investigate as each analyte of concern would need to be run as a spike in the sample to identify any potential losses.

11.2.5 Standard Solution Results

All standard solution (or laboratory control samples) were within acceptable ranges.

11.2.6 Laboratory Duplicate Results

Laboratory duplicate results reported outside of acceptable ranges were:

- Sample ES1838118--003 reported an RPD of 95.5% for Zinc (LOR based limits 0%-50%).

11.2.7 Quality Control Sample Frequency

The following quality control sample frequency outliers were reported:

- ES1900690 reported laboratory duplicate sample frequency for Semivolatile Organic Compounds and TRH - Semivolatile Fraction below the expected rate.
- ES1900690 reported matrix spike sample frequency for Semivolatile Organic Compounds and TRH - Semivolatile Fraction below the expected rate.
- ES1904527 reported matrix spike sample frequency for Total Metals by ICP-AES below the expected rate.

11.3 QA/QC Data Evaluation

11.3.1 Evaluation of the QA/QC Information Compared to the DQOs

- Documentation completeness:
  - Soil logs and chain-of-custody forms were completed and appropriate.
- Data completeness:
  - All samples were received by the laboratory and analytical results reported including laboratory QA/QC.
- Data comparability:
  - Arcadis standard operating procedures, Australian Standards and industry practice were followed during sampling;
  - Consistent field conditions and similarly trained staff were used during sampling;
  - Standard analytical methods were used by the laboratories for all analyses; and
  - The limits of reporting are appropriate and generally consistent from each laboratory.
- Data representativeness:
  - After review Arcadis considers the analytical data shows that suitable decontamination methods were used during the field works; and
  - The frequency of laboratory blanks, spikes and standard solutions were acceptable, and the results/frequencies were generally reported within specified ranges.
- Precision:
  - QA/QC samples for soil were collected at a rate of 1:19, which is within guidance provided in AS4482.1-2005.
  - Laboratory duplicates were generally collected at acceptable frequencies. The intra-laboratory and inter-laboratory duplicates RPDs were generally reported within acceptable ranges.

In conclusion, Arcadis considers the data quality suitable for use in this assessment.

12 CONCLUSIONS AND RECOMMENDATIONS

Based on field observations and review of analytical data collected during the ESA, the following conclusions have been reached:

12.1 Summary of findings

The site has a history of farming and agriculture, manufacturing, rail and commercial / industrial land uses. CoPCs associated with historical land uses include heavy metals, BTEXN and TRH, asbestos, pesticides, VOCs/SVOCs and PFAS.

Fill material comprising asphalt and / or concrete hardstand, roads base and reworked silty sand was generally observed across the site to a maximum depth of 3.50 m below grade.

Several locations reported soil contaminant concentrations above the adopted soil guidelines.

Several soil contaminant exceedances were reported for the location BH47 situated just south west of the USTs in the Qantas bus refuel area:

- Concentrations of C6-C10 less BTEX (F1) in BH47@2.4 exceeded the NEPM 2013 Commercial / Industrial Coarse Soil HSL (Sand) guideline (630 mg/kg mg/kg).
- Concentrations of Benzene in BH47@2.4 exceeded the NEPM 2013 Commercial / Industrial Coarse Soil HSL (Sand) guideline (3 mg/kg).
- Management Limits were exceeded in three soil samples.

Arcadis considers that additional delineation works may be required to further investigate the risk to human health in the UST area. The delineation works would require the installation of two (2) soil vapour sampling points to the west of the tank pit area and one (1) additional downgradient groundwater monitoring well further west of the existing groundwater well locations MW1-MW4.

It is considered that an exceedance of Management Limits in the UST area is less relevant due to the site being an operating commercial / industrial site with limited sensitive receptors located in the area of potential impact. When the UPSS are decommissioned, the Management Limits will become more relevant.

If Qantas requires work to be done in the vicinity of the USTs located in the bus refuel area, Qantas will be required to decommission the USTs. The procedure for the removal of USTs from this area is required to be outlined in a Remedial Action Plan (RAP) however, Arcadis understands that removal of the UPSS is not required as part of the development of the site. Ongoing monitoring of the groundwater wells in the UST area in accordance with the Guidelines for Implementing the PoEO UPSS Regulation 2014 is recommended.

Several additional locations at the Site reported soil contaminant concentrations above the adopted soil guidelines:

- Concentrations of C16-C34 in soil samples BH07@0.20 (2,880 mg/kg), BH17@1.50 and BH37@1.1 exceeded the adopted NEPM 2013 Commercial / Industrial Coarse Soil ESL guideline (1,700 mg/kg).
- Concentrations of C10-C16 less Naphthalene (F2) in soil sample BH06@0.50 (170 mg/kg) exceeded the NEPM 2013 Commercial / Industrial (Coarse) ESL guideline (170 mg/kg).
- Lead concentrations in BH08@1.00 exceeded the NEPM 2013 Commercial / Industrial HIL guideline value (1,500 mg/kg). A 95% UCL of 180.1 mg/kg was

calculated for lead across the site making this exceedance an anomaly and Lead is not a Chemical of Concern from a human health perspective.

- Concentrations of benzo(a)pyrene (B(a)P) in BH16@0.50, BH17@1.50, BH19@0.40 and MW04@0.50, BH32@1 and BH44@0.3 exceeded the NEPM 2013 Commercial / Industrial Coarse Soil ESL guideline value (1.4 mg/kg). Benzo(a)pyrene contamination at historical manufacturing / industrial sites is generally attributed to man-made combustion, however it also occurs naturally in soils. B(a)P-TEQ (highest concentration 17.6 mg/kg) did not exceed the HIL criteria (40 mg/kg) in any of the soil samples analysed.
- Soil sample MW05@1.00 (south western corner of the site) was found to contain asbestos fibres and asbestos fines (AF) / fibrous asbestos (FA) above the adopted NEPM 2013 Commercial / Industrial criteria (0.001% w/w). MW04@0.50 was found to contain an unquantified amount of asbestos fibres and one (1) fragment of ACM was identified in BH44. Soil material excavated from these sections of the site is to be disposed of at an appropriate waste disposal facility that accepts asbestos contaminated waste.

Exceedances of the Ecological ESL criteria is not considered to pose an ecological risk as the majority of the Site surface will be capped by hardstand material, preventing access by potential ecological receptors. However, if the areas identified to contain impacted soil that exceeds the ecological guidelines are to remain uncapped, the impacted soil material will require removal as outlined in the CEMP.

Asbestos was positively identified in two (2) soil samples (MW05@1.00 and MW04@0.50) and within one (1) testing location (BH44) out of the 57 soil samples analysed for asbestos. Quantification was undertaken on all 57 samples and only in one sample (MW05@1.00) Asbestos Fines/Fibrous Asbestos was detected above the detection limit. Asbestos ID and Quantification was undertaken in accordance with AS 4964 – 2004.

The laboratory provided the following comments:

- MW05@1.00: Mid brown sandy soil plus three fragments of asbestos fibre board approx. 5 x 5 x 4mm plus several asbestos fibre bundles approx. 5 x 1 x 0.5mm
- MW04@0.50: Mid brown sandy soil containing one piece of asbestos cement sheeting approx. 25 x 20 x 5mm.
- BH44 – PACM: One piece of asbestos cement sheeting approximately 35x20x5mm.

The asbestos AF/FA concentration in MW5@1.00 was 0.036 %w/w (criteria is 0.001 %w/w). The majority of the AF/FA in this samples is due to 3 small pieces of ACM <7mm. The type of Asbestos analysed in this sample is Chrysotile. Whilst referring to the 2009 WA Asbestos guidelines, no distinction has been made between the different types of asbestos and the potential health impacts posed by different asbestos minerals, such as chrysotile and crocidolite, and fibre dimensions can be treated as equivalent. However, EnHealth (2005) provides reference to Hodgson and Darnton (2000) who reviewed several occupational cohorts and concluded that the risk of mesothelioma for chrysotile, amosite and crocidolite is 1:100:500 respectively (i.e. the risk from crocidolite could be 500 times higher than for chrysotile). Other estimates of increased mesothelioma risk from mixed amphibole exposure are variable (3–5, 15 and 30 times the risk from chrysotile alone) (Berman et al., 1995; Churg, 1988).

Based on the following, Arcadis is of the opinion that Asbestos remediation is not warranted. However, the presence of ACM, AF/FA suggests the potential for additional detections of within the fill material:

- Soils were screened for asbestos from samples collected from bores holes. It is not commercially feasible to screen the entire site asbestos, as such, potential for unexpected finds cannot be dismissed;
- Although there was a very limited amount of asbestos detected (ACM and AF/FA), it is a very common inclusion in fill materials;
- Asbestos fragments (ACM) were only detected in 3 out of 57 samples;
- Asbestos fibres, AF/FA (Chrysotile) was found to be present in one sample; and
- Currently the locations where asbestos was detected are covered by hard stand and there are no immediate human health risks, however, this may change with construction.

An Asbestos Management Plan (AMP) needs to be prepared and implemented during construction phase that includes provision for 'un-expected finds protocol'. If excavation in proximity to MW04, MW05 or BH44 is required, the waste should potentially be classified as special waste. This material needs to be kept separate from other excavation material and validation (from a waste classification perspective) might be required to show that all asbestos material has been segregated. These works should be undertaken by a Class A Asbestos removalist.

Groundwater contaminant concentrations were also reported above the adopted groundwater guidelines at the following locations:

- Concentrations of Zinc in MW01, MW02, MW04, MW05, MW06 and MW07 were all reported above the adopted ANZG 2018 MW (95%) and NEPM 2013 MW GIL guideline values (15 µg/L). Elevated zinc concentrations in groundwater are expected to be attributed to the Former Mascot Galvanising Facility located 40 m southeast of the site. The former galvanising site is known to contain high zinc concentrations in groundwater beneath the site.
- Several additional heavy metal exceedances were reported in groundwater well locations across the site. Concentrations of Arsenic in MW02 were reported above the adopted NEPM 2013 MW guideline value (13 µg/L), and concentrations of Cadmium in MW05 and Copper in MW06 were reported above the adopted NEPM 2013 MW GIL guideline values (0.7 µg/L and 1.3 µg/L respectively). Copper concentrations in MW06 were also reported above the adopted ANZG (2018) MW 95% guidelines (1.3 µg/L). Heavy metal exceedances are considered low and can be attributed to background levels.
- Concentrations of Ammonia as N in MW1 and MW4 were reported above the extrapolated ANZG 2018 FW (95%) criteria. The elevated ammonia levels (maximum level is 9.0 mg/L) could have a negative impact on the receiving waters in Botany Bay such as eutrophication (i.e. algal bloom). Eutrophication is a common phenomenon in coastal marine ecosystems. In contrast to freshwater systems (where phosphorus is the limiting factor), nitrogen is usually the limiting nutrient in coastal waters. Marine eutrophication along coastlines tends to be caused by excess nitrogen such as ammonium, nitrates, nitrites, urea or uric acid. All these can be converted by bacteria into ammonium (nitrification). In aquatic environments, enhanced growth of choking aquatic vegetation or algal blooms disrupt normal functioning of the ecosystem, causing problems such as a lack of oxygen in the water, needed for fish and other aquatic life to survive. The water then becomes cloudy, coloured a shade of green, yellow, brown, or red. Arcadis considers that there will be sufficient mixing and dilution before the groundwater discharges into the overlying waters.

Arcadis considers that the elevated levels of heavy metals identified in groundwater will require management under an Environmental Management Plan (EMP) to manage potential human exposure to heavy metal impacted groundwater during the construction phase and to prevent the spread of heavy metal impacted groundwater

into areas of uncontaminated soil and groundwater at the Site. A draft EMP had been prepared for the Site at the time of reporting.

12.2 Extent of Uncertainty in the Results

The sampling methodologies used by Arcadis during this investigation have been designed to limit uncertainty in the results. Arcadis is of the opinion that the results of this investigation give an acceptable representation of the current status of the site. However, it must be noted that in all subsurface investigations the potential remains for variation between sample points and conditions different from that reported here may exist on site.

12.3 Conclusions and Recommendations

- Arcadis recommends the preparation of an Environmental Management Plan (EMP) to manage the elevated concentrations of heavy metals in groundwater at the Site. Arcadis notes that a Draft EMP had been prepared at the time of writing this ESA.
- Arcadis recommends additional delineation works to further investigate the risk to human health in the UST area. The delineation works would require the installation of two (2) soil vapour sampling points to the west of the tank pit area and one (1) additional downgradient groundwater monitoring well further west of the existing groundwater well locations MW1-MW4.
- Arcadis recommends the ongoing monitoring of the groundwater wells in the UST area in accordance with the Guidelines for Implementing the PoEO UPSS Regulation 2014.
- Arcadis recommends the preparation of a Construction Environmental Management Plan (CEMP) to manage potential human exposure to impacted soil and groundwater during the construction phase. Some deeper excavations to allow for the construction of a pool (south-western corner of the site) will need to be addressed in the CEMP.
- Arcadis recommends the inclusion of an Asbestos Management Plan (AMP) in the CEMP to manage potential human exposure to ACM during the construction phase. Soil material excavated from the general vicinity of MW04, MW05 and BH44 is to be disposed of at a waste disposal facility licensed to accept asbestos contaminated waste.
- Arcadis understands that the site will require some cut & fill to provide the proposed development levels. An estimated volume of 1,794 m^3 (refer to drawing 'BULK EARTHWORKS' – Enstruct, 2019) will require removal from site. All waste streams generated during site works are to be disposed/re-used of in accordance with the NSW EPA (2014) Waste Classification Guidelines, the Amendment to Part 1 (2016) and/or the Exemptions and Orders such as the Excavated Natural Material exemption. Adherence to the ASSMP is required.
- Resampling of MW01 (north eastern corner) is recommended.
- Arcadis considers that the high levels of zinc in the wells on the southern part of the property (up to 1,660 ppb) in monitoring wells MW05, MW06 and MW07 may trigger Duty to Notify, however the existence of zinc in groundwater from the adjacent property to the southeast is well documented and covered by a Court Order and long historical involvement of NSW EPA. Whilst Arcadis cannot pre-empt of NSW EPA's decision, it is unlikely that regulation of this site will occur.

The objectives of the ESA at the Site are considered to have been met regarding soil and groundwater conditions, within the limitations of the scope completed. Arcadis

consider this ESA to be suitable for characterisation of the site against potential sources of contamination and associated contaminants arising from a site history that included farming, agriculture, rail, manufacturing and commercial / industrial land uses. Within the limitations of the report and the conclusions and recommendations provided, Arcadis considers the site to be suitable for the proposed land use.

13 REFERENCES

Australian and New Zealand Guidelines for Fresh and Marine Water Quality, Australian and New Zealand Environment and Conservation Council (ANZECC) and Agriculture and Resource Management Council of Australia and New Zealand (ARMCANZ) 2000, Fresh Water Guidelines.

Australian Standard AS4482.1-2005. *Guide to the Investigation and Sampling of Sites with Potentially Contaminated Soil. Part 1: Non-volatile and Semi-volatile Compounds*. 2005.

Australian Standard AS4482.2-1999. *Guide to the Investigation and Sampling of Sites with Potentially Contaminated Soil. Part 2: Volatile Substances*. 1999.

Lotsearch (2018), 297 King Street, Mascot, NSW 2020.

NEPC, 2013 National Environmental Protection (Assessment of Site Contamination) Measure (NEPM). *Schedule B (1) Guideline on the Investigation Levels for Soil and Groundwater*. 2013.

NEPM (2013) as amended Schedule B (1) Guideline on the Investigation Levels for Soil and Groundwater Health Investigation.

NSW EPA (1995) Sampling Design Guidelines.

NSW OEH (2011) Contaminated Sites: Guidelines for Consultants Reporting on Contaminated Sites.

Western Australia Department of Health (2009) Guidelines for the Assessment, Remediation and Management of Asbestos-Contaminated Sites in Western Australia.

APPENDIX A **FIGURES**

10026439 - King Street North



Legend

- Site Boundary
- Motorway
- Major roads
- Local road
- Railway

1:10,000 at A3

ARCADIS AUSTRALIA PACIFIC PTY LTD
ABN 76 104 485 289
Level 16, 580 George St | Sydney NSW 2000
P: +61 (0) 2 8907 9000 | F: +61 (0) 2 8907 9001

Coordinate System: GDA 1994 MGA Zone 56
Date issued: February 8, 2019

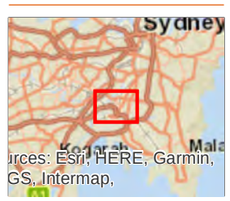


Figure 1 - Site Location

0 100 200 400 600 800
m

Date: 8/02/2019 Path: C:\Arc Templates\Temporary Projects\10026439 - King Street North\10026439 - Figure 1 - Site Location.mxd
Created by : Environmental Restoration
QA by : Environmental Restoration

10026439
Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020



Legend

- Site Boundary

Sampling Locations

- Soil Bores
- Monitoring Wells
- Existing Monitoring Wells (ES, 2013)

1:1,300 at A3

ARCADIS AUSTRALIA PACIFIC PTY LTD
ABN 76 104 485 289
Level 16, 580 George St | Sydney NSW 2000
P: +61 (0) 2 8907 9000 | F: +61 (0) 2 8907 9001

Coordinate System: GDA 1994 MGA Zone 56
Date issued: February 15, 2019

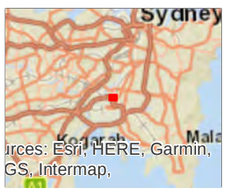
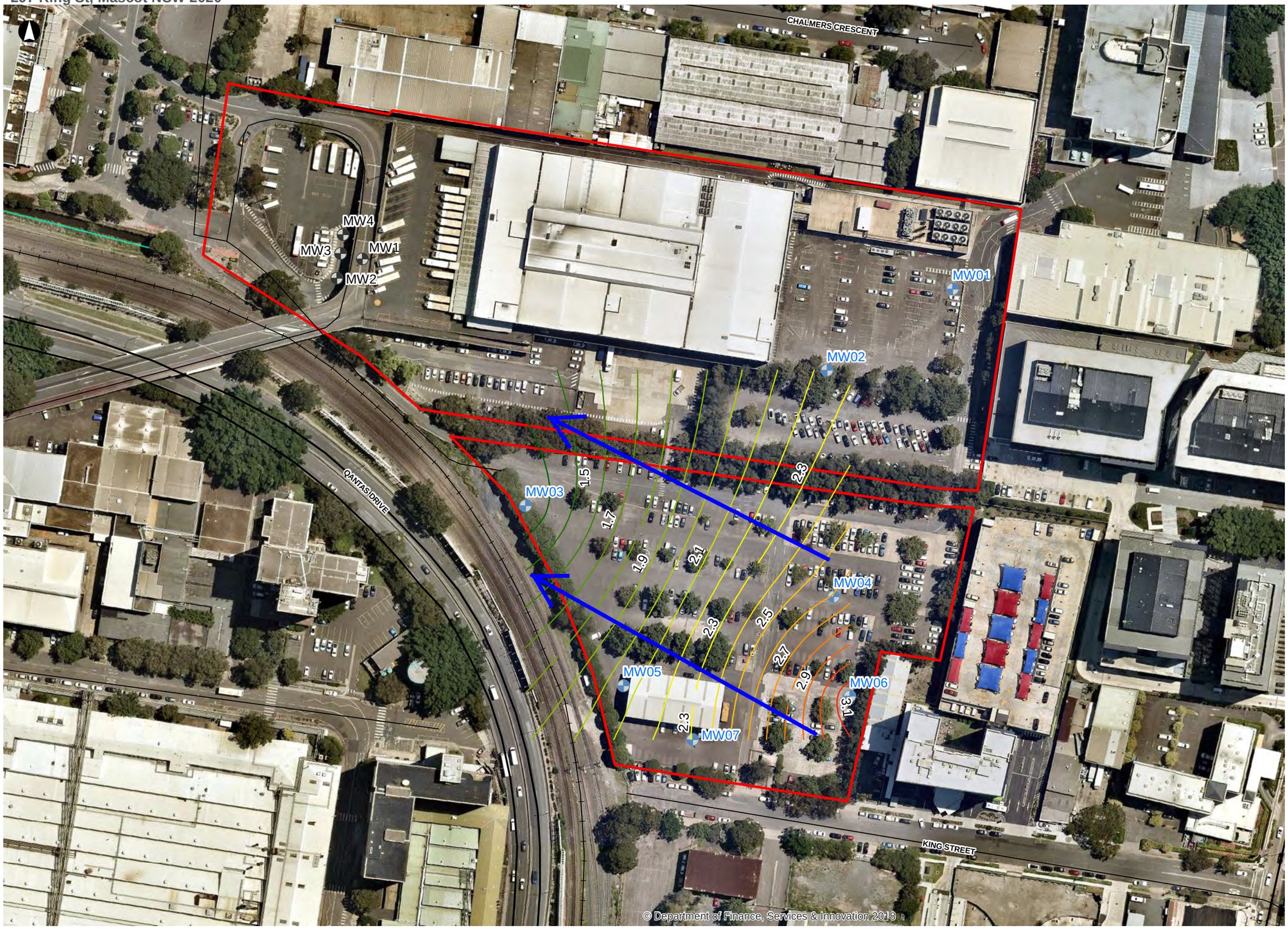


Figure 2 - Sample Locations

0 12.5 25 50 75 100
m

Date: 15/02/2019 Path: C:\Arc Templates\Temporary Projects\10026439 - King Street North\10026439 - Figure 2 - Sampling Locations_V2.mxd
Created by : Environmental Restoration
QA by : Environmental Restoration

10026439
Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020



Legend

- Site Boundary

Sampling Locations

- Monitoring Wells
- Existing Monitoring Wells (ES, 2013)

Height (AHD)

- 1.5
- 2
- 2.5
- 3

Groundwater Flow Direction

1:1,500 at A3

ARCADIS Design & Consultancy for natural and built assets

ARCADIS AUSTRALIA PACIFIC PTY LTD
ABN 76 104 485 289
Level 16, 580 George St | Sydney NSW 2000
P: +61 (0) 2 8907 9000 | F: +61 (0) 2 8907 9001

Coordinate System: GDA 1994 MGA Zone 56
Date issued: February 15, 2019

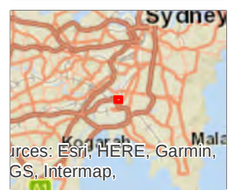
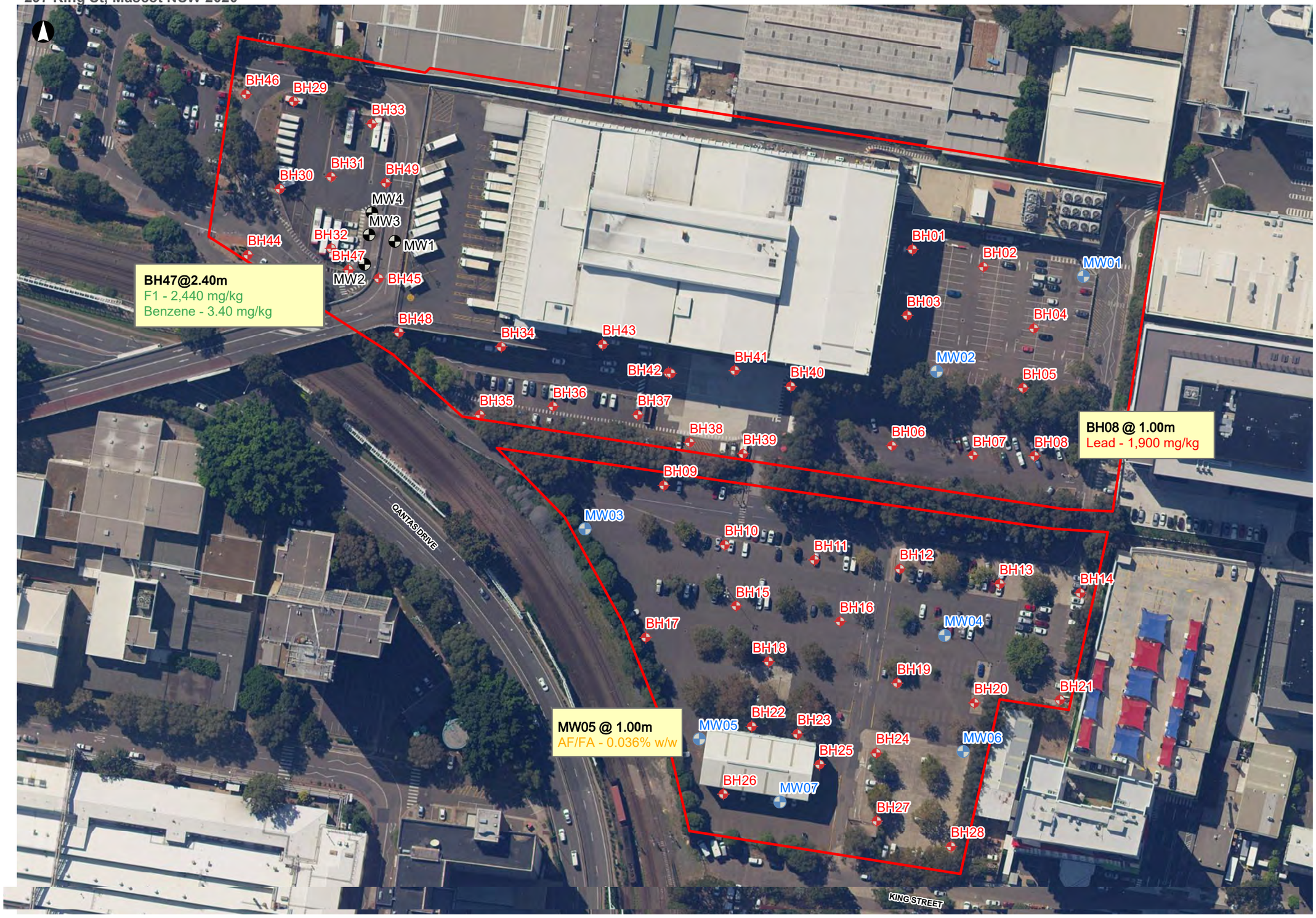


Figure 3 - Groundwater Contours

0 15 30 60 90 120
m

Date: 15/02/2019 Path: C:\Arc Templates\Temporary Projects\10026439 - King Street North\10026439 - Figure 3 - Groundwater Contours.mxd
Created by : Environmental Restoration
QA by : Environmental Restoration

10026439
Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020



Guideline

NEPM 2013 Commercial / Industrial HIL
Lead - 1500 mg/kg

NEPM 2013 Commercial / Industrial HSL D (Sand)
F1 (2-<4m)- 630 mg/kg
Benzene - 3 mg/kg

NEPM 2013
Asbestos HSL
AF/FA - 0.001% w/w

Legend

- Site Boundary

Sampling Locations

- Soil Bores
- Monitoring Wells
- Existing Monitoring Wells (ES, 2013)

1:1,300 at A3

ARCADIS Design & Consultancy for natural and built assets
ARCADIS AUSTRALIA PACIFIC PTY LTD
ABN 76 104 485 289
Level 16, 580 George St | Sydney NSW 2000
P: +61 (0) 2 8907 9000 | F: +61 (0) 2 8907 9001

Coordinate System: GDA 1994 MGA Zone 56
Date issued: February 15, 2019

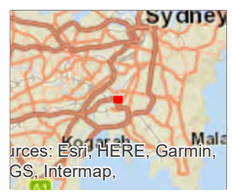
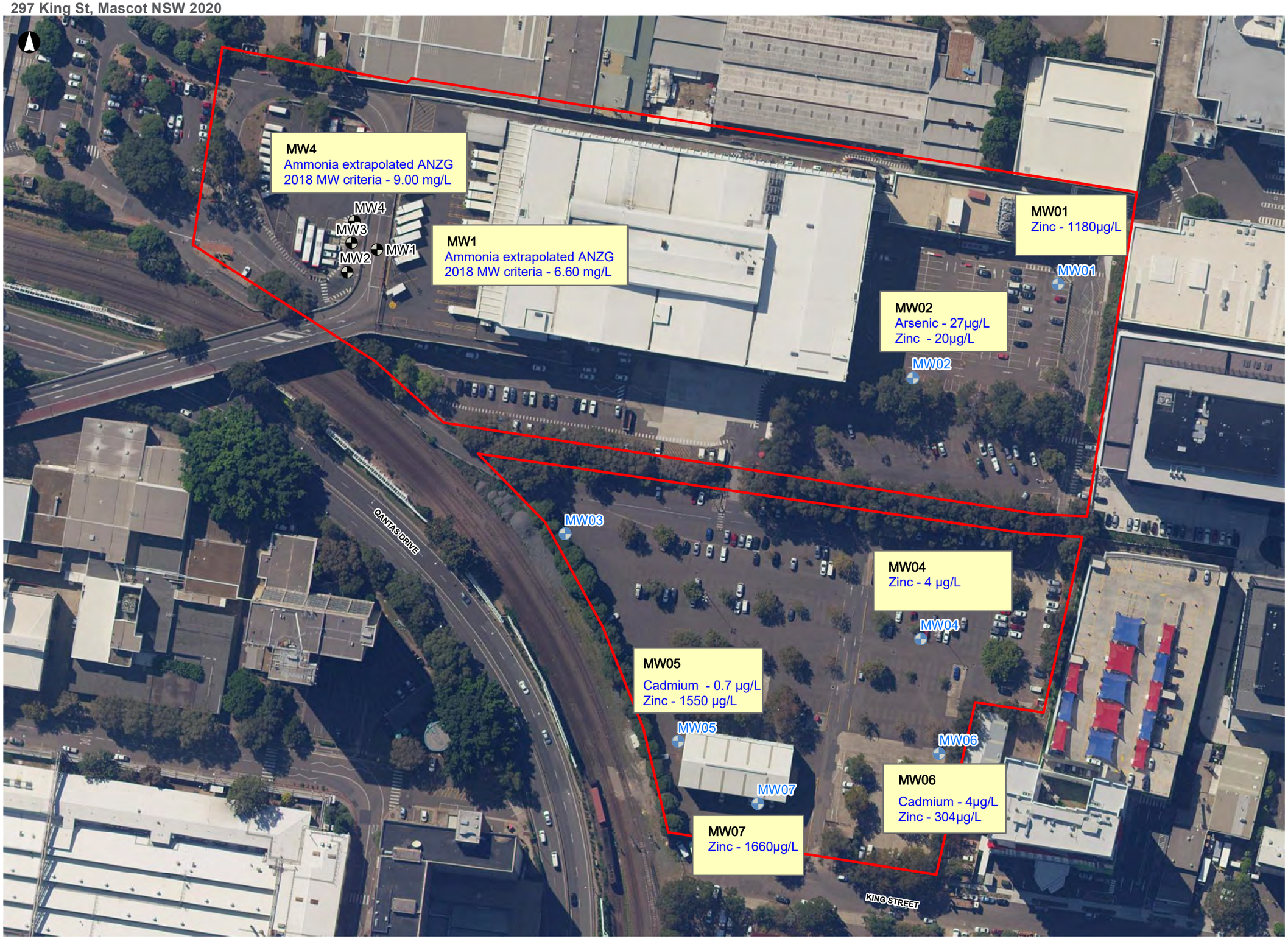


Figure 4a - Soil Exceedances

0 12.5 25 50 75 100
m

Date: 15/02/2019 Path: C:\Arc Templates\Temporary Projects\10026439 - King Street North\10026439 - Figure 2 - Sampling Locations_V2.mxd
Created by : Environmental Restoration
QA by : Environmental Restoration

10026439
Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020



Guideline

ANZG 2018 Marine Water (95%)
Ammonia as N - 0.91 mg/L
Cadmium - 5.50 µg/L
Copper - 1.30 µg/L
Zinc - 15 µg/L

NEPM 2013 GILs Marine Water
Ammonia as N - 0.91 mg/L
Arsenic - 13 µg/L
Cadmium - 0.70 µg/L
Copper - 1.30 µg/L
Zinc - 15 µg/L

Legend

Site Boundary

Sampling Locations

Monitoring Wells

Existing Monitoring Wells (ES, 2013)

1:1,300 at A3

ARCADIS Design & Consultancy for natural and built assets
ARCADIS AUSTRALIA PACIFIC PTY LTD
ABN 76 104 485 289
Level 16, 580 George St | Sydney NSW 2000
P: +61 (0) 2 8907 9000 | F: +61 (0) 2 8907 9001
Coordinate System: GDA 1994 MGA Zone 56
Date issued: February 15, 2019

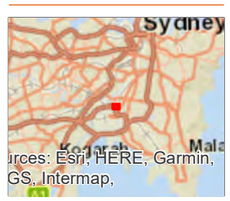


Figure 4b - Groundwater Exceedances

0 12.5 25 50 75 100
m

Date: 15/02/2019 Path: C:\Arc Templates\Temporary Projects\10026439 - King Street North\10026439 - Figure 2 - Sampling Locations_V2.mxd
Created by : Environmental Restoration
QA by : Environmental Restoration

APPENDIX B **SITE PHOTOGRAPHS**

ARCADIS Design & Consultancy for natural and built assets	SITE PHOTOGRAPHS	
Client Name: **Qantas Australia Limited**	**Site Location:** **King St North Carpark – 297 King St, Mascot NSW 2020** **Lots 2,3 & 4 DP 234489, Lot B DP 164829, Lot 133 DP 659434 and Lot 1 DP 202747**	**Project No.** **10026439**

Photo No.	**Date**
1.	22/01/19

Description:

Facing north – View of the site from King St, Mascot NSW.



Photo No.	**Date**
2.	22/01/19

Description:

Facing north – The entrance to the King St North Carpark viewed from King St.

A small building is observed to the right of the carpark entry driveway. The building consists of brick walls, metal supports, metal barred windows and a wooden door. Though the building is of relatively new construction (approximately 1980s-1990s), there is considered to be medium potential for the building to contain ACM.



ARCADIS Design & Consultancy for natural and built assets	SITE PHOTOGRAPHS	
Client Name: **Qantas Australia Limited**	**Site Location:** **King St North Carpark – 297 King St, Mascot NSW 2020** **Lots 2,3 & 4 DP 234489, Lot B DP 164829, Lot 133 DP 659434 and Lot 1 DP 202747**	**Project No.** **10026439**

Photo No.	**Date**
3.	22/01/19

Description:

Facing northwest – The warehouse building located in the southwestern corner of the site is pictured. The building is constructed of cinderblock walls, a metal roof and contains a metal roller door and wooden door on its eastern side. The majority of windows on the building have been barricaded with timber.

PACM was not observed during the site visit, however considering the age of the building (late 1960s), there is potential for the building to contain ACM.



Photo No.	**Date**
4.	22/01/19

Description:

Facing west – The inner construction of the warehouse building is pictured. The building is constructed of concrete floors, cinderblock walls, metal frames and foil-faced roof insulation. The warehouse building appears to have been recently refurbished.

PACM was not observed during the site visit, however considering the age of the building (late 1960s) there is potential for the building to contain ACM.

The warehouse building appears to be used for general storage by Qantas Supply Chain.



ARCADIS Design & Consultancy for natural and built assets	SITE PHOTOGRAPHS	
Client Name: **Qantas Australia Limited**	**Site Location:** **King St North Carpark – 297 King St, Mascot NSW 2020** **Lots 2,3 & 4 DP 234489, Lot B DP 164829, Lot 133 DP 659434 and Lot 1 DP 202747**	**Project No.** **10026439**

Photo No.	**Date**
5.	22/01/19

Description:

Facing north – An old electrical substation pad located just north east of the warehouse building.



Photo No.	**Date**
6.	22/01/19

Description:

Facing west-southwest – An old building footprint is observed just north of the warehouse building.



ARCADIS Design & Consultancy for natural and built assets	SITE PHOTOGRAPHS	
Client Name: **Qantas Australia Limited**	**Site Location:** **King St North Carpark – 297 King St, Mascot NSW 2020** **Lots 2,3 & 4 DP 234489, Lot B DP 164829, Lot 133 DP 659434 and Lot 1 DP 202747**	**Project No.** **10026439**

Photo No.	**Date**
7.	22/01/19

Description:

Facing south-southeast – An old building footprint is observed just north of the King St entry point.



Photo No.	**Date**
8.	22/01/19

Description:

Facing northeast – An old building footprint is observed in the centre-east location of the southern carpark.



ARCADIS Design & Consultancy for natural and built assets	SITE PHOTOGRAPHS	
Client Name: **Qantas Australia Limited**	**Site Location:** **King St North Carpark – 297 King St, Mascot NSW 2020** **Lots 2,3 & 4 DP 234489, Lot B DP 164829, Lot 133 DP 659434 and Lot 1 DP 202747**	**Project No.** **10026439**

Photo No.	**Date**
9.	22/01/19

Description:

Facing southwest – The carpark located in the centre of the site is observed.



Photo No.	**Date**
10.	22/01/19

Description:

Facing northwest – The carpark located in the northern section of the site is observed.



ARCADIS Design & Consultancy for natural and built assets	SITE PHOTOGRAPHS	
Client Name: **Qantas Australia Limited**	**Site Location:** **King St North Carpark – 297 King St, Mascot NSW 2020** **Lots 2,3 & 4 DP 234489, Lot B DP 164829, Lot 133 DP 659434 and Lot 1 DP 202747**	**Project No.** **10026439**

Photo No.	**Date**
11.	11/02/19

Description:
Facing southeast – The bus refuel station located in the northwestern carpark.



Photo No.	**Date**
12.	11/02/19

Description:

Facing East – The Qantas bus maintenance area located to the east of the northwestern carpark.



ARCADIS Design & Consultancy for natural and built assets	SITE PHOTOGRAPHS	
Client Name: **Qantas Australia Limited**	**Site Location:** **King St North Carpark – 297 King St, Mascot NSW 2020** **Lots 2,3 & 4 DP 234489, Lot B DP 164829, Lot 133 DP 659434 and Lot 1 DP 202747**	**Project No.** **10026439**

Photo No.	**Date**
13.	11/02/19

Description:

Facing southeast – Cracks in the asphalt and concrete located on the ground surface of the northwestern carpark. Staining is observed in the cracked ground surface locations downgradient of the refuel area.



Photo No.	**Date**
14.	11/02/19

Description:

Facing southeast – Surface water drainage located within the northwestern carpark. There is an additional storm water drain located further south to the west of the refuel area.



APPENDIX C **LOTSEARCH REPORT**

LOTSEARCH

LOTSEARCH ENVIRO PROFESSIONAL

Date: 05 Dec 2018 09:55:16

Reference: LS004752 EP

Address: 297 King Street, Mascot, NSW 2020

Disclaimer:
The purpose of this report is to provide an overview of some of the site history, environmental risk and planning information available, affecting an individual address or geographical area in which the property is located. It is not a substitute for an on-site inspection or review of other available reports and records. It is not intended to be, and should not be taken to be, a rating or assessment of the desirability or market value of the property or its features.
You should obtain independent advice before you make any decision based on the information within the report.
The detailed terms applicable to use of this report are set out at the end of this report.

Table of Contents

Location Confidences 2
Dataset Listings 3
Site Location Aerial 6
Contaminated Land & Waste Management Facilities 7
EPA PFAS Investigation Program 11
EPA Other Sites with Contamination Issues 13
EPA Current Licensed Activities 14
EPA Delicensed & Former Licensed Activities 16
UPSS Sensitive Zones 19
Historical Business Activities 20
Historical Aerial Imagery & Maps 65
Topographic Features 79
Elevation Contours 84
Hydrogeology & Groundwater 85
Geology 109
Naturally Occurring Asbestos Potential 111
Soils 112
Acid Sulfate Soils 116
Dryland Salinity 120
Mining Subsidence Districts 121
State Environmental Planning 122
Local Environmental Planning 123
Heritage 128
Natural Hazards 131
Ecological Constraints 132
Terms & Conditions 141

Location Confidences

Where Lotsearch has had to georeference features from supplied addresses, a location confidence has been assigned to the data record. This indicates a confidence to the positional accuracy of the feature. Where applicable, a confidence is given under the field heading “LocConf” or “Location Confidence”.

LC Code	Location Confidence
Premise match	Georeferenced to the site location / premise or part of site
General area or suburb match	Georeferenced with the confidence of the general/approximate area
Road match	Georeferenced to the road or rail
Road intersection	Georeferenced to the road intersection
Feature is a buffered point	Feature is a buffered point
Land adjacent to geocoded site	Land adjacent to Georeferenced Site

Dataset Listing

Datasets contained within this report, detailing their source and data currency:

Dataset Name	Custodian	Supply Date	Currency Date	Update Frequency	Dataset Buffer (m)	No. Features Onsite	No. Features within 100m	No. Features within Buffer
Cadastre Boundaries	Dept. Finance, Services & Innovation	05/12/2018	05/12/2018	Daily	-	-	-	-
Topographic Data	Dept. Finance, Services & Innovation	17/07/2018	17/07/2018	As required	-	-	-	-
List of NSW contaminated sites notified to EPA	Environment Protection Authority	29/11/2018	09/11/2018	Monthly	1000	0	1	12
Contaminated Land Records of Notice	Environment Protection Authority	13/11/2018	13/11/2018	Monthly	1000	0	1	4
Former Gasworks	Environment Protection Authority	04/12/2018	11/10/2017	Monthly	1000	0	0	0
National Waste Management Facilities Database	Geoscience Australia	06/11/2018	07/03/2017	Quarterly	1000	0	0	0
EPA PFAS Investigation Program	Environment Protection Authority	29/11/2018	29/11/2018	Monthly	2000	0	1	1
EPA Other Sites with Contamination Issues	Environment Protection Authority	11/01/2018	11/01/2018	As required	1000	0	0	0
Licensed Activities under the POEO Act 1997	Environment Protection Authority	27/11/2018	27/11/2018	Monthly	1000	1	3	12
Delicensed POEO Activities still Regulated by the EPA	Environment Protection Authority	27/11/2018	27/11/2018	Monthly	1000	1	3	8
Former POEO Licensed Activities now revoked or surrendered	Environment Protection Authority	27/11/2018	27/11/2018	Monthly	1000	0	1	12
UPSS Environmentally Sensitive Zones	Environment Protection Authority	14/04/2015	12/01/2010	As required	1000	1	1	1
UBD Business to Business Directory 1991 (Premise & Intersection Matches)	Hardie Grant			Not required	150	0	14	41
UBD Business to Business Directory 1991 (Road & Area Matches)	Hardie Grant			Not required	150	-	2	2
UBD Business to Business Directory 1986 (Premise & Intersection Matches)	Hardie Grant			Not required	150	0	23	81
UBD Business to Business Directory 1986 (Road & Area Matches)	Hardie Grant			Not required	150	-	17	18
UBD Business Directory 1982 (Premise & Intersection Matches)	Hardie Grant			Not required	150	0	21	62
UBD Business Directory 1982 (Road & Area Matches)	Hardie Grant			Not required	150	-	18	19
UBD Business Directory 1978 (Premise & Intersection Matches)	Hardie Grant			Not required	150	0	26	72
UBD Business Directory 1978 (Road & Area Matches)	Hardie Grant			Not required	150	-	12	14
UBD Business Directory 1975 (Premise & Intersection Matches)	Hardie Grant			Not required	150	0	39	78
UBD Business Directory 1975 (Road & Area Matches)	Hardie Grant			Not required	150	-	17	17
UBD Business Directory 1970 (Premise & Intersection Matches)	Hardie Grant			Not required	150	0	37	69
UBD Business Directory 1970 (Road & Area Matches)	Hardie Grant			Not required	150	-	48	48
UBD Business Directory 1965 (Premise & Intersection Matches)	Hardie Grant			Not required	150	0	26	58
UBD Business Directory 1965 (Road & Area Matches)	Hardie Grant			Not required	150	-	45	47
UBD Business Directory 1961 (Premise & Intersection Matches)	Hardie Grant			Not required	150	0	18	47
UBD Business Directory 1961 (Road & Area Matches)	Hardie Grant			Not required	150	-	35	36
UBD Business Directory 1950 (Premise & Intersection Matches)	Hardie Grant			Not required	150	0	1	3
UBD Business Directory 1950 (Road & Area Matches)	Hardie Grant			Not required	150	-	34	57

Dataset Name	Custodian	Supply Date	Currency Date	Update Frequency	Dataset Buffer (m)	No. Features Onsite	No. Features within 100m	No. Features within Buffer
UBD Business Directory Drycleaners & Motor Garages/Service Stations (Premise & Intersection Matches)	Hardie Grant			Not required	500	0	1	31
UBD Business Directory Drycleaners & Motor Garages/Service Stations (Road & Area Matches)	Hardie Grant			Not required	500	-	7	14
Points of Interest	Dept. Finance, Services & Innovation	12/10/2018	12/10/2018	Quarterly	1000	0	0	32
Tanks (Areas)	Dept. Finance, Services & Innovation	15/10/2018	15/10/2018	Quarterly	1000	0	0	0
Tanks (Points)	Dept. Finance, Services & Innovation	15/10/2018	15/10/2018	Quarterly	1000	0	0	0
Major Easements	Dept. Finance, Services & Innovation	12/10/2018	12/10/2018	Quarterly	1000	0	0	5
State Forest	Dept. Finance, Services & Innovation	18/01/2018	18/01/2018	As required	1000	0	0	0
NSW National Parks and Wildlife Service Reserves	NSW Office of Environment & Heritage	18/01/2018	30/09/2017	Annually	1000	0	0	0
Hydrogeology Map of Australia	Commonwealth of Australia (Geoscience Australia)	08/10/2014	17/03/2000	As required	1000	1	1	1
Botany Groundwater Management Zones	NSW Department of Primary Industries	15/03/2018	01/10/2005	As required	1000	1	1	1
Groundwater Boreholes	NSW Dept. of Primary Industries - Water NSW; Commonwealth of Australia (Bureau of Meteorology)	24/07/2018	23/07/2018	Annually	2000	0	23	276
Geological Units 1:100,000	NSW Dept. of Industry, Resources & Energy	20/08/2014		None planned	1000	2	-	4
Geological Structures 1:100,000	NSW Dept. of Industry, Resources & Energy	20/08/2014		None planned	1000	0	-	0
Naturally Occurring Asbestos Potential	NSW Dept. of Industry, Resources & Energy	04/12/2015	24/09/2015	Unknown	1000	0	0	0
Soil Landscapes	NSW Office of Environment & Heritage	12/08/2014		None planned	1000	2	-	3
Atlas of Australian Soils	CSIRO	19/05/2017	17/02/2011	As required	1000	1	1	1
Environmental Planning Instrument - Acid Sulfate Soils	NSW Department of Planning and Environment	23/10/2018	12/10/2018	As required	500	1	-	-
Atlas of Australian Acid Sulfate Soils	CSIRO	19/01/2017	21/02/2013	As required	1000	1	1	3
Dryland Salinity - National Assessment	National Land and Water Resources Audit	18/07/2014	12/05/2013	None planned	1000	0	0	0
Dryland Salinity Potential of Western Sydney	NSW Office of Environment & Heritage	12/05/2017	01/01/2002	None planned	1000	-	-	-
Mining Subsidence Districts	Dept. Finance, Services & Innovation	13/07/2017	01/07/2017	As required	1000	0	0	0
SEPP 14 - Coastal Wetlands	NSW Planning and Environment	17/12/2015	24/10/2008	Annually	1000	0	0	0
SEPP 26 - Littoral Rainforest	NSW Planning and Environment	17/12/2015	05/02/1988	Annually	1000	0	0	0
SEPP 71 - Coastal Protection	NSW Planning and Environment	17/12/2015	01/08/2003	Annually	1000	0	0	0
SEPP Major Developments 2005	NSW Planning and Environment	09/03/2013	25/05/2005	Under Review	1000	0	0	0
SEPP Strategic Land Use Areas	NSW Planning and Environment	01/08/2017	28/01/2014	Annually	1000	0	0	0
EPI - Land Zoning	NSW Planning and Environment	23/10/2018	12/10/2018	Quarterly	1000	1	4	70
EPI - Minimum Lot Size	NSW Planning and Environment	23/10/2018	12/10/2018	Quarterly	0	0	-	-
EPI - Height of Buildings	NSW Planning and Environment	23/10/2018	12/10/2018	Quarterly	0	1	-	-
EPI - Floor Space Ratio	NSW Planning and Environment	23/10/2018	12/10/2018	Quarterly	0	2	-	-
EPI - Land Application	NSW Planning and Environment	23/10/2018	12/10/2018	Quarterly	0	1	-	-
EPI - Land Reservation Acquisition	NSW Planning and Environment	23/10/2018	12/10/2018	Quarterly	0	0	-	-
State Heritage Register - Curtilages	NSW Office of Environment & Heritage	18/10/2018	19/01/2018	Quarterly	1000	0	0	1

Dataset Name	Custodian	Supply Date	Currency Date	Update Frequency	Dataset Buffer (m)	No. Features Onsite	No. Features within 100m	No. Features within Buffer
Environmental Planning Instrument - Heritage	NSW Department of Planning and Environment	10/09/2018	27/07/2018	Quarterly	1000	0	1	38
Bush Fire Prone Land	NSW Rural Fire Service	27/11/2018	31/07/2018	Quarterly	1000	0	0	0
Native Vegetation of the Sydney Metropolitan Area	NSW Office of Environment & Heritage	01/03/2017	16/12/2016	As required	1000	1	1	3
Ramsar Wetlands	Commonwealth of Australia Department of the Environment	08/10/2014	24/06/2011	As required	1000	0	0	0
Groundwater Dependent Ecosystems	Bureau of Meteorology	14/08/2017	15/05/2017	Unknown	1000	0	0	0
Inflow Dependent Ecosystems Likelihood	Bureau of Meteorology	14/08/2017	15/05/2017	Unknown	1000	0	0	0
NSW BioNet Species Sightings	NSW Office of Environment & Heritage	05/12/2018	05/12/2018	Daily	10000	-	-	-

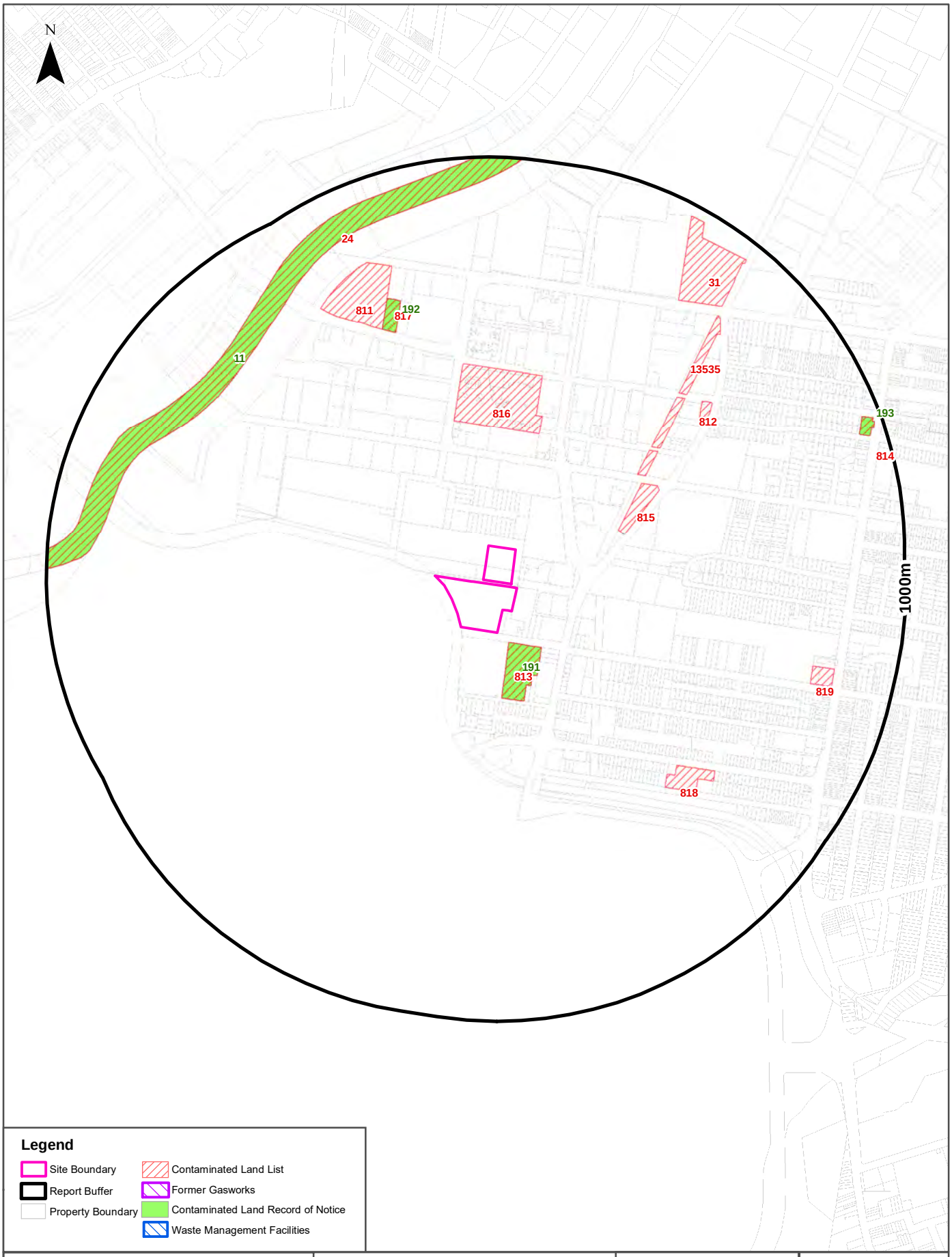
Aerial Imagery 2018

297 King Street, Mascot, NSW 2020



Contaminated Land & Waste Management Facilities

297 King Street, Mascot, NSW 2020



Contaminated Land & Waste Management Facilities

297 King Street, Mascot, NSW 2020

List of NSW contaminated sites notified to EPA

Records from the NSW EPA Contaminated Land list within the dataset buffer:

Map Id	Site	Address	Suburb	Activity	Management Class	Status	Location Confidence	Dist (m)	Direction
813	Former Mascot Galvanising	336-348 King Street	Mascot	Metal Industry	Contamination currently regulated under CLM Act	Current EPA List	Premise Match	38m	South East
815	Former Zinc Smelter and Paint Manufacturing Facility	163 O'Riordan Street	Mascot	Metal Industry	Regulation under CLM Act not required	Current EPA List	Premise Match	267m	North East
816	Ing Industrial Fund (unoccupied Land and General Parking)	19-33 Kent Road	Mascot	Landfill	Regulation under CLM Act not required	Current EPA List	Premise Match	302m	North
13535	Linear Park	Lot 2, 3, 4 & 5 in DP 85917	MASCOT	Landfill	Regulation under CLM Act not required	Current EPA List	Premise Match	366m	North East
818	Sokol Corporation	50-56 Robey Street	Mascot	Other Industry	Regulation under CLM Act not required	Current EPA List	Premise Match	568m	South East
812	Caltex Service Station	125 O'Riordan Street	Mascot	Service Station	Regulation under CLM Act not required	Current EPA List	Premise Match	577m	North East
817	Mascot Pioneer Plating	25-29 Ricketty Street	Mascot	Metal Industry	Contamination currently regulated under CLM Act	Current EPA List	Premise Match	598m	North
811	Heritage Business Centre	5-9 Ricketty Street	Mascot	Unclassified	Regulation under CLM Act not required	Current EPA List	Premise Match	621m	North West
24	Alexandra Canal Sediments	Off Huntley Street	Alexandria	Unclassified	Contamination currently regulated under CLM Act	Current EPA List	Network of Features	725m	North West
31	Mascot Developments	494-504 Gardeners Road	Alexandria	Other Industry	Regulation under CLM Act not required	Current EPA List	Premise Match	766m	North East
819	Telstra Exchange	904-922 Botany Road	Mascot	Other Industry	Regulation under CLM Act not required	Current EPA List	Premise Match	785m	East
814	Former Shell Service Station Mascot	746 Botany Road	Mascot	Service Station	Contamination currently regulated under CLM Act	Current EPA List	Premise Match	931m	North East

The values within the EPA site management class in the table above, are given more detailed explanations in the table below:

EPA site management class	Explanation
Contamination being managed via the planning process (EP&A Act)	The EPA has completed an assessment of the contamination and decided that the contamination is significant enough to warrant regulation. The contamination of this site is managed by the consent authority under the Environmental Planning and Assessment Act 1979 (EP&A Act) planning approval process, with EPA involvement as necessary to ensure significant contamination is adequately addressed. The consent authority is typically a local council or the Department of Planning and Environment.
Contamination currently regulated under CLM Act	The EPA has completed an assessment of the contamination and decided that the contamination is significant enough to warrant regulation under the Contaminated Land Management Act 1997 (CLM Act). Management of the contamination is regulated by the EPA under the CLM Act. Regulatory notices are available on the EPA's Contaminated Land Public Record of Notices.
Contamination currently regulated under POEO Act	The EPA has completed an assessment of the contamination and decided that the contamination is significant enough to warrant regulation. Management of the contamination is regulated under the Protection of the Environment Operations Act 1997 (POEO Act). The EPA's regulatory actions under the POEO Act are available on the POEO public register.
Contamination formerly regulated under the CLM Act	The EPA has determined that the contamination is no longer significant enough to warrant regulation under the Contaminated Land Management Act 1997 (CLM Act). The contamination was addressed under the CLM Act.
Contamination formerly regulated under the POEO Act	The EPA has determined that the contamination is no longer significant enough to warrant regulation. The contamination was addressed under the Protection of the Environment Operations Act 1997 (POEO Act).
Contamination was addressed via the planning process (EP&A Act)	The EPA has determined that the contamination is no longer significant enough to warrant regulation. The contamination was addressed by the appropriate consent authority via the planning process under the Environmental Planning and Assessment Act 1979 (EP&A Act).
Ongoing maintenance required to manage residual contamination (CLM Act)	The EPA has determined that ongoing maintenance, under the Contaminated Land Management Act 1997 (CLM Act), is required to manage the residual contamination. Regulatory notices under the CLM Act are available on the EPA's Contaminated Land Public Record of Notices.
Regulation being finalised	The EPA has completed an assessment of the contamination and decided that the contamination is significant enough to warrant regulation under the Contaminated Land Management Act 1997. A regulatory approach is being finalised.
Regulation under the CLM Act not required	The EPA has completed an assessment of the contamination and decided that regulation under the Contaminated Land Management Act 1997 is not required.
Under assessment	The contamination is being assessed by the EPA to determine whether regulation is required. The EPA may require further information to complete the assessment. For example, the completion of management actions regulated under the planning process or Protection of the Environment Operations Act 1997. Alternatively, the EPA may require information via a notice issued under s77 of the Contaminated Land Management Act 1997 or issue a Preliminary Investigation Order.

NSW EPA Contaminated Land List Data Source: Environment Protection Authority

© State of New South Wales through the Environment Protection Authority

Contaminated Land & Waste Management Facilities

297 King Street, Mascot, NSW 2020

Contaminated Land: Records of Notice

Record of Notices within the dataset buffer:

Map Id	Name	Address	Suburb	Notices	Area No	Location Confidence	Distance	Direction
191	Former Mascot Galvanising	336-348 King Street	Mascot	5 current and 2 former	3125	Premise Match	38m	South East
192	Mascot Pioneer Plating	25-29 Ricketty Street	Mascot	1 current	3347	Premise Match	598m	North
11	Alexandra Canal Sediments	Off Huntley Street	Alexandria	2 current	3151	Network of Features	725m	North West
193	Former Shell Service Station Mascot	746 Botany Road	Mascot	6 current and 1 former	3192	Premise Match	931m	North East

Contaminated Land Records of Notice Data Source: Environment Protection Authority
© State of New South Wales through the Environment Protection Authority
Terms of use and disclaimer for Contaminated Land: Record of Notices, please visit
http://www.epa.nsw.gov.au/clm/clmdisclaimer.htm

Former Gasworks

Former Gasworks within the dataset buffer:

Map Id	Location	Council	Further Info	Location Confidence	Distance	Direction
N/A	No records in buffer					

Former Gasworks Data Source: Environment Protection Authority
© State of New South Wales through the Environment Protection Authority

National Waste Management Site Database

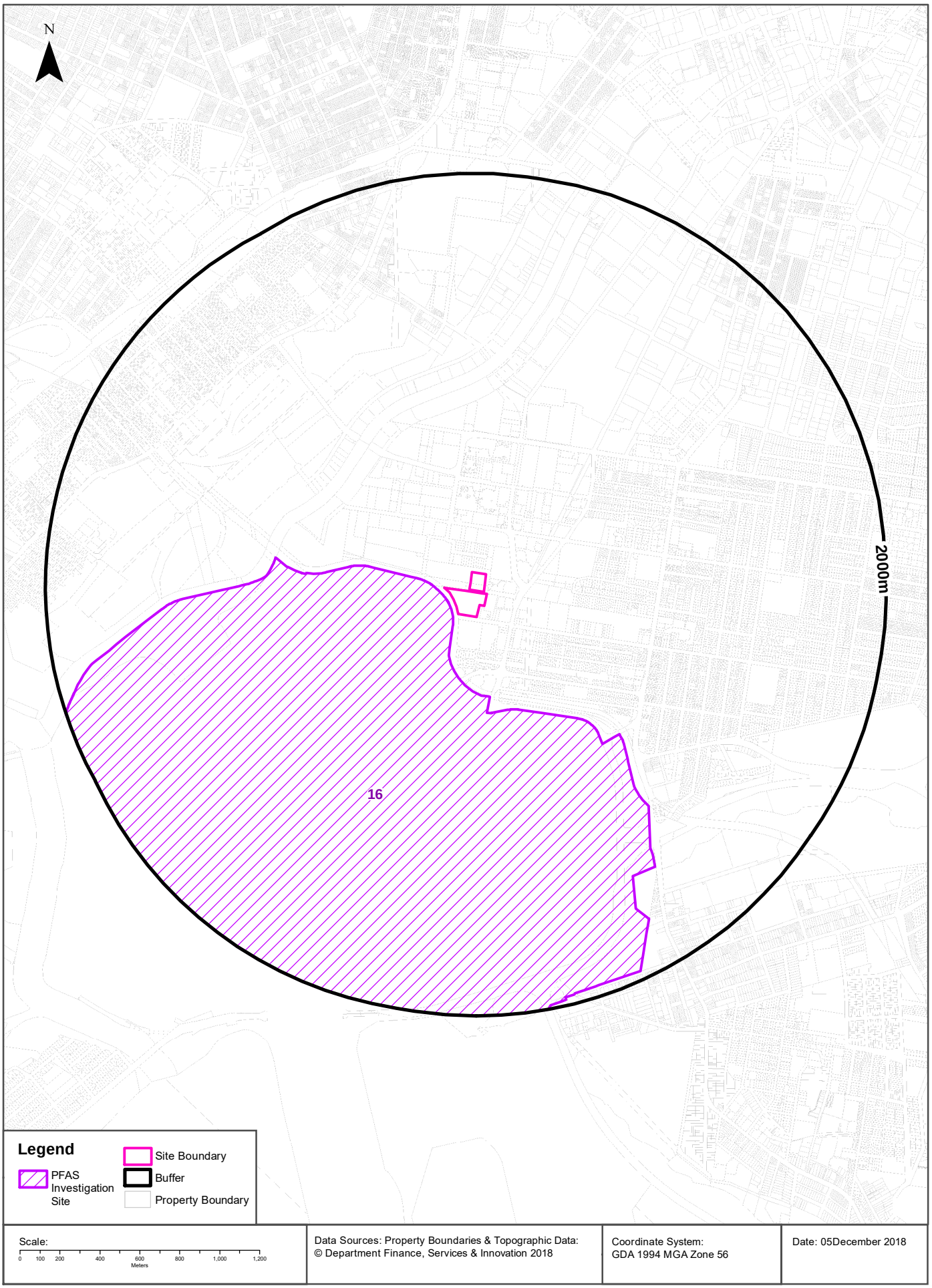
Sites on the National Waste Management Site Database within the dataset buffer:

Site Id	Owner	Name	Address	Suburb	Class	Landfill	Reprocess	Transfer	Comments	Loc Conf	Dist (m)	Direction
N/A	No records in buffer											

Waste Management Facilities Data Source: Geoscience Australia
Creative Commons 3.0 © Commonwealth of Australia http://creativecommons.org/licenses/by/3.0/au/deed.en

EPA PFAS Investigation Program

297 King Street, Mascot, NSW 2020



EPA PFAS Investigation Program

297 King Street, Mascot, NSW 2020

EPA PFAS Investigation Program

Sites that are part of the EPA PFAS investigation program, within the dataset buffer:

Id	Site	Address	Location Confidence	Distance	Direction
16	Botany Bay area & Georges River	Botany Bay area & Georges River	General Area/ Suburb Match	27m	South

EPA PFAS Investigation Program: Environment Protection Authority
© State of New South Wales through the Environment Protection Authority

EPA Other Sites with Contamination Issues

297 King Street, Mascot, NSW 2020

EPA Other Sites with Contamination Issues

This dataset contains other sites identified on the EPA website as having contamination issues. This dataset currently includes:

- James Hardie asbestos manufacturing and waste disposal sites
- Radiological investigation sites in Hunter's Hill

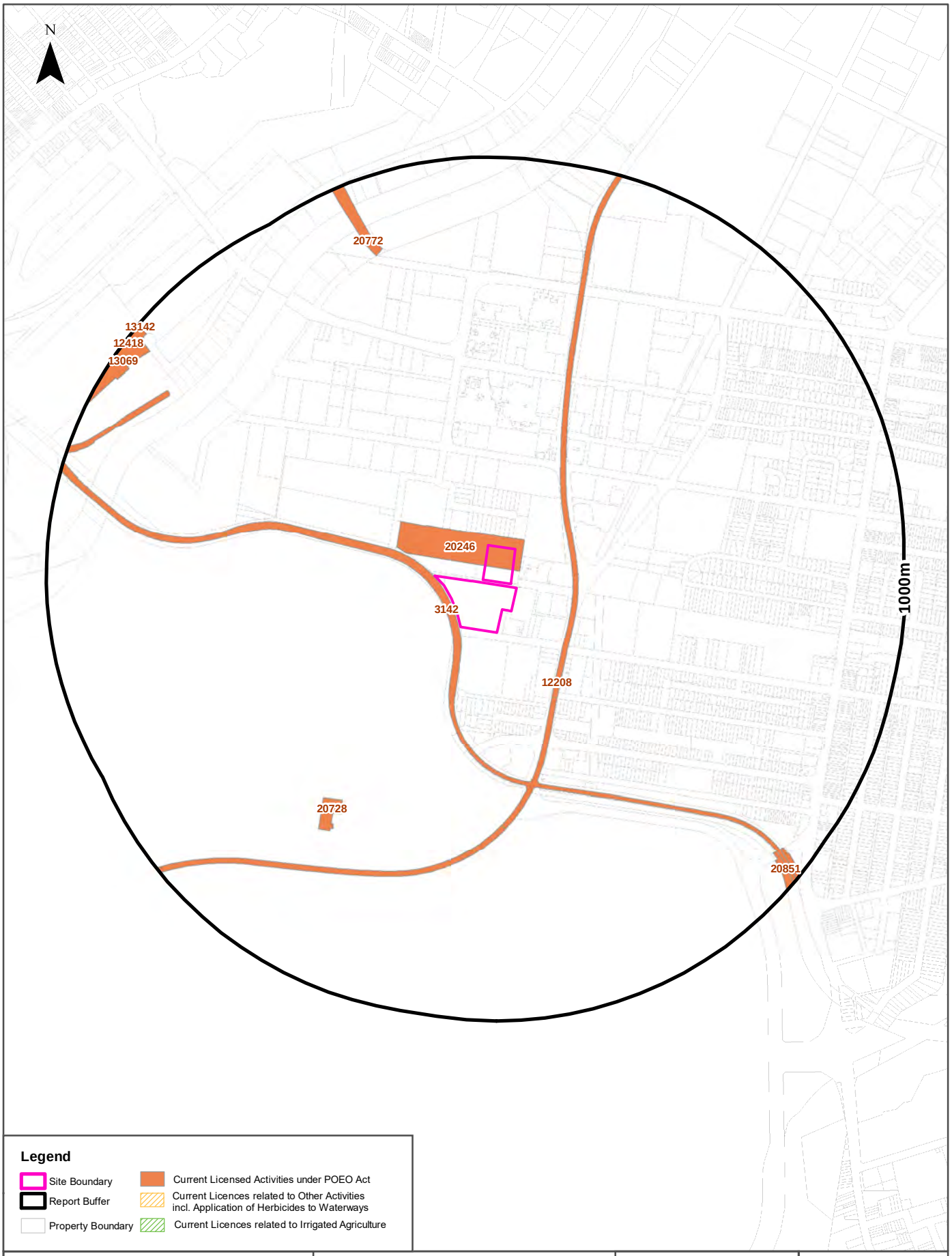
Sites within the dataset buffer:

Site Id	Site Name	Site Address	Dataset	Comments	Location Confidence	Distance	Direction
N/A	No records in buffer						

EPA Other Sites with Contamination Issues: Environment Protection Authority
© State of New South Wales through the Environment Protection Authority

Current EPA Licensed Activities

297 King Street, Mascot, NSW 2020



EPA Activities

297 King Street, Mascot, NSW 2020

Licensed Activities under the POEO Act 1997

Licensed activities under the Protection of the Environment Operations Act 1997, within the dataset buffer:

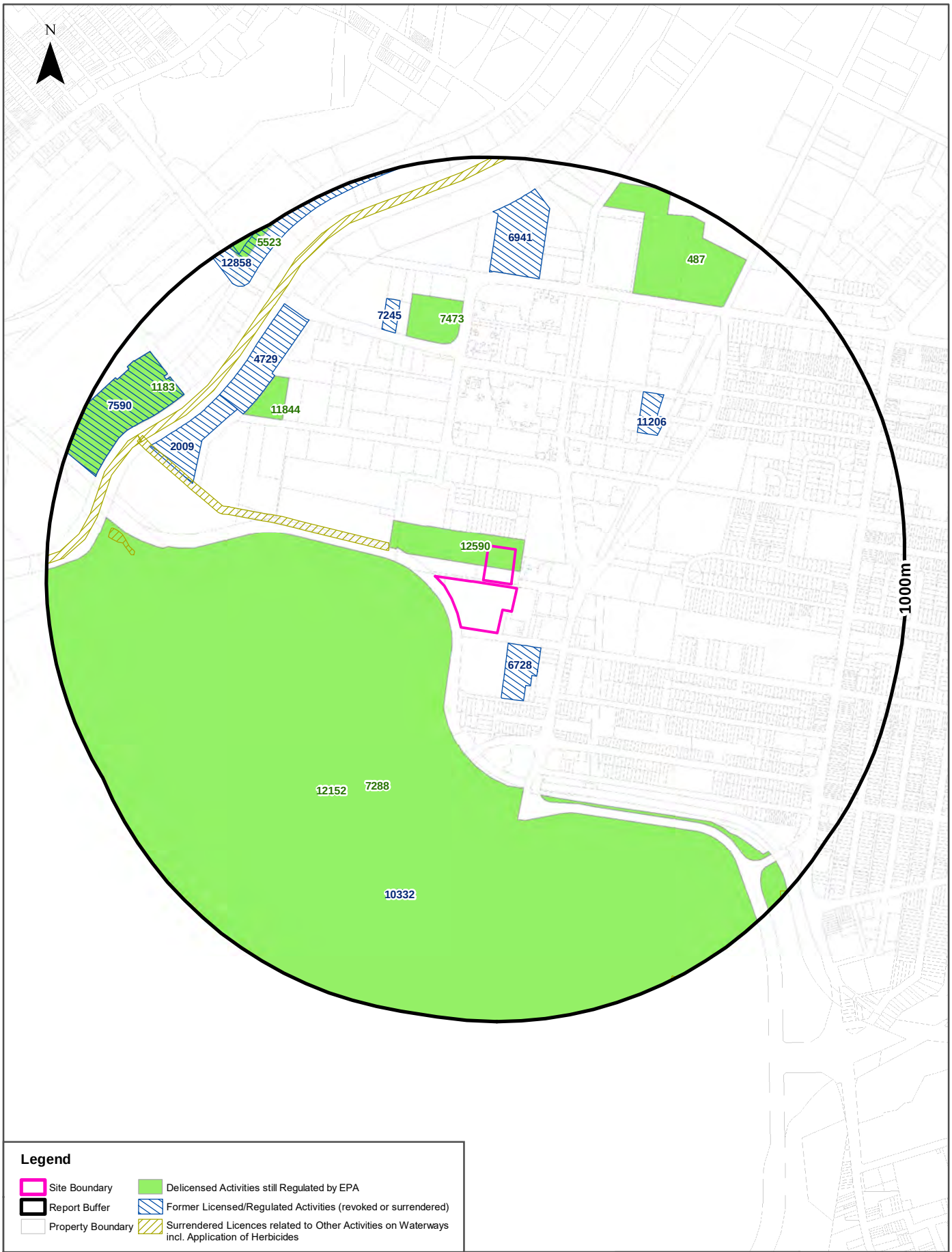
EPL	Organisation	Name	Address	Suburb	Activity	Loc Conf	Distance	Direction
20246	ENWAVE MASCOT PTY LTD	GridX Power Pty Ltd	10 Bourke Road	MASCOT	Generation of electrical power from gas	Premise Match	0m	Onsite
12208	SYDNEY TRAINS		PO BOX K349, HAYMARKET, NSW 1238		Railway systems activities	Road Match	4m	South West
3142	AUSTRALIAN RAIL TRACK CORPORATION LIMITED		Australian Rail Track Corporation (ARTC) network as defined by the ARTC Network Deeds within NSW., SYDNEY, NSW 2001		Railway systems activities	Network of Features	4m	West
20728	ENWAVE MASCOT PTY LTD		Shiers Avenue, MASCOT, NSW 2020	MASCOT, NSW 2020	Generation of Electrical Power from Gas	Premise Match	541m	South West
20772	CPB CONTRACTORS PTY LIMITED	WESTCONNEX NEW M5	Between Beverly Hills and St Peters, BEVERLY HILLS, NSW 2209		Road construction	Road Match	799m	North
20851	JOHN HOLLAND PTY LTD		Port Botany Freight Rail Corridor at General Holmes Dr, MASCOT, NSW 2020		Railway systems activities	Road Match	909m	South East
12418	BORAL RECYCLING PTY LIMITED	Boral Recycling Pty Ltd	25 Burrows Road South	ST PETERS	Recovery of general waste	Premise Match	934m	North West
12418	BORAL RECYCLING PTY LIMITED	Boral Recycling Pty Ltd	25 Burrows Road South	ST PETERS	Waste storage - other types of waste	Premise Match	934m	North West
13069	VISY PAPER PTY. LTD.	Visy Paper Pty Ltd	6-10 Burrows Road South	ST PETERS	Recovery of general waste	Premise Match	934m	North West
13069	VISY PAPER PTY. LTD.	Visy Paper Pty Ltd	6-10 Burrows Road South	ST PETERS	Waste storage - other types of waste	Premise Match	934m	North West
13142	SPRC PTY LTD	SPRC Pty Ltd	6-10 Burrows Road South	ST PETERS	Non-thermal treatment of general waste	Premise Match	934m	North West
13142	SPRC PTY LTD	SPRC Pty Ltd	6-10 Burrows Road South	ST PETERS	Waste storage - other types of waste	Premise Match	934m	North West

POEO Licence Data Source: Environment Protection Authority

© State of New South Wales through the Environment Protection Authority

Delicensed & Former Licensed EPA Activities

297 King Street, Mascot, NSW 2020



EPA Activities

297 King Street, Mascot, NSW 2020

Delicensed Activities still regulated by the EPA

Delicensed activities still regulated by the EPA, within the dataset buffer:

Licence No	Organisation	Name	Address	Suburb	Activity	Loc Conf	Distance	Direction
12590	QANTAS FLIGHT CATERING LIMITED	Qantas Flight Catering Centre	Qantas Jet Base (Kingsford Smith)	MASCOT	Hazardous, Industrial or Group A Waste Generation or Storage	Premise Match	0m	Onsite
12152	QANTAS AIRWAYS LIMITED	Qantas Jet Base	Sydney Airport	MASCOT	Hazardous, Industrial or Group A Waste Generation or Storage	Premise Match	27m	South West
7288	SYDNEY AIRPORT CORPORATION LIMITED	SYDNEY AIRPORT	241 O'RIODAN STREET	MASCOT	Hazardous, Industrial or Group A Waste Generation or Storage	Premise Match	27m	South West
7473	EATON ELECTRIC SYSTEMS PTY LTD	EATON ELECTRIC SYSTEMS PTY LTD	10 KENT ROAD	MASCOT	Hazardous, Industrial or Group A Waste Generation or Storage	Premise Match	531m	North
11844	HY-TEC INDUSTRIES PTY LTD	HY-TEC INDUSTRIES PTY LTD	296 COWARD STREET	MASCOT	Concrete works	Premise Match	563m	North West
487	GOODMAN FIELDER CONSUMER FOODS PTY LIMITED	GOODMAN FIELDER COMMERCIAL	198 Bourke Road	MASCOT	Hazardous, Industrial or Group A Waste Generation or Storage	Premise Match	725m	North East
1183	BORAL RESOURCES (NSW) PTY LTD	BORAL CONCRETE	25 BURROWS ROAD SOUTH	ST PETERS	Concrete works	Premise Match	797m	North West
5523	SEALED AIR AUSTRALIA PTY LIMITED	SEALED AIR AUSTRALIA PTY LTD	3 BURROWS ROAD	ST PETERS	Hazardous, Industrial or Group A Waste Generation or Storage	Premise Match	948m	North West

Delicensed Activities Data Source: Environment Protection Authority
© State of New South Wales through the Environment Protection Authority

Former Licensed Activities under the POEO Act 1997, now revoked or surrendered

Former Licensed activities under the Protection of the Environment Operations Act 1997, now revoked or surrendered, within the dataset buffer:

Licence No	Organisation	Location	Status	Issued Date	Activity	Loc Conf	Distance	Direction
6728	INDUSTRIAL GALVANIZERS CORPORATION PTY LTD	342 KING STREET, MASCOT, NSW 2020	Surrendered	30/08/2000	Hazardous, Industrial or Group A Waste Generation or Storage	Premise Match	38m	South East
4653	LUHRMANN ENVIRONMENT MANAGEMENT PTY LTD	WATERWAYS THROUGHOUT NSW	Surrendered		Other Activities / Non Scheduled Activity - Application of Herbicides	Network of Features	136m	-
4838	Robert Orchard	Various Waterways throughout New South Wales - SYDNEY NSW 2000	Surrendered		Other Activities / Non Scheduled Activity - Application of Herbicides	Network of Features	136m	-

Licence No	Organisation	Location	Status	Issued Date	Activity	Loc Conf	Distance	Direction
6630	SYDNEY WEED & PEST MANAGEMENT PTY LTD	WATERWAYS THROUGHOUT NSW - PROSPECT, NSW, 2148	Surrendered		Other Activities / Non Scheduled Activity - Application of Herbicides	Network of Features	136m	-
11206	EMILY SULLIVAN	7 CHURCH AVENUE, MASCOT,	Surrendered	23/08/2000	Hazardous, Industrial or Group A Waste Generation or Storage	Premise Match	435m	North East
7245	PLATING 'R US PTY LTD	25-29 RICKETTY STREET, MASCOT, NSW 2020	Surrendered	26/06/2000	Hazardous, Industrial or Group A Waste Generation or Storage	Premise Match	598m	North
4729	Q CATERING RIVERSIDE PTY LIMITED	300 COWARD STREET, MASCOT, NSW 2020	Surrendered	22/12/2000	Non-thermal treatment of hazardous and other waste; Waste storage - hazardous, restricted solid, liquid, clinical and related waste and asbestos waste	Premise Match	645m	North West
2009	SIMS GROUP AUSTRALIA HOLDINGS LIMITED	283 COWARD STREET, MASCOT, NSW 2020	Surrendered	02/02/2000	Hazardous, Industrial or Group A Waste Generation or Storage; Scrap metal processing	Premise Match	665m	North West
10332	GATE GOURMET AUSTRALIA PTY	KEITH SMITH AVE & SIXTH ST, MASCOT, NSW 2020	Revoked	11/01/2000	Hazardous, Industrial or Group A Waste Generation or Storage	Road Intersection	692m	South
6941	FUJI XEROX AUSTRALIA PTY. LIMITED	546 GARDENERS ROAD, ALEXANDRIA, NSW 2015	Surrendered	26/06/2000	Hazardous, Industrial or Group A Waste Generation or Storage	Premise Match	699m	North
7590	BITUPAVE LTD	BURROWS ROAD SOUTH, ST PETERS, NSW 2044	Surrendered	22/09/2000	Bitumen pre-mix or hot-mix production	Premise Match	797m	North West
12858	MCCONNELL DOWELL CONSTRUCTORS (AUST) PTY LTD	Various streets from Kurnell to Erskineville, including the pipeline route across Botany Bay, KURNELL, NSW 2231	Surrendered	01/05/2008	Water-based extractive activity, Miscellaneous licensed discharge to waters (at any time)	Network of Features	893m	North West

Former Licensed Activities Data Source: Environment Protection Authority

© State of New South Wales through the Environment Protection Authority

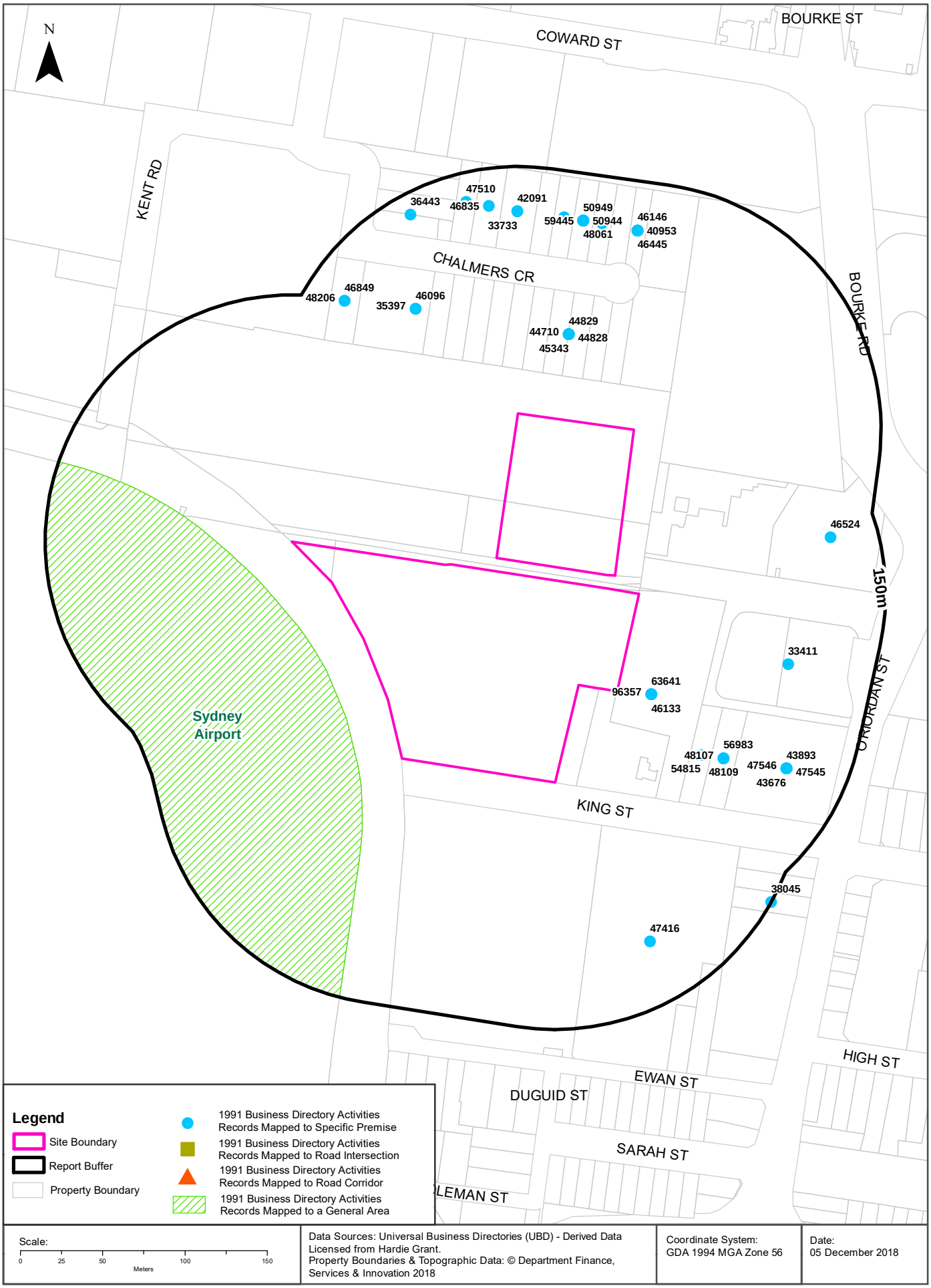
UPSS Sensitive Zones

297 King Street, Mascot, NSW 2020



1991 Historical Business Directory Records

297 King Street, Mascot, NSW 2020



Historical Business Directories

297 King Street, Mascot, NSW 2020

1991 Business to Business Directory Records
Premise or Road Intersection Matches

Records from the 1991 UBD Business to Business Directory, mapped to a premise or road intersection, within the dataset buffer:

Business Activity	Premise	Ref No.	Location Confidence	Distance to Feature Point	Direction
Sugar Millers &/or Refiners	Industrial Sugar Mills Pty Ltd, 289 King St Mascot 2020	63641	Premise Match	21m	South East
Food Products Mfrs &/or Processors	Industrial Sugar Mills Pty Ltd, 289 King St., Mascot 2020	46133	Premise Match	21m	South East
Hotel &/or Motel Equipment &/or Supplies	Industrial Sugar Mills Pty.Ltd., 289 King St, Mascot.2020	96357	Premise Match	21m	South East
Engineers Repetition	Wise Eric Pty Ltd, 9 Chalmers Cr., Mascot 2020	44828	Premise Match	52m	North
Engineers Repetition	Wise Eric E Pty Ltd, 9 Chalmers Cr Mascot 2020	44829	Premise Match	52m	North
Engineers Precision	Wise Eric E Pty Ltd., 9 Chalmers Cr., Mascot 2020	44710	Premise Match	52m	North
Fastener Mfrs &/or Dists	Wise Eric E. Pty. Ltd., 9 Chalmers Cr., Mascot 2020	45343	Premise Match	52m	North
Motor Panel Beaters &/or Spray Painters	Southport Smash Repairs, 287 King St Mascot 2020	54815	Premise Match	64m	South East
Hairdressers &/or Beauty Salon Supplies	Joy Cosmetics Engineering Pty. Ltd., 285 King St., Mascot. 2020	48107	Premise Match	76m	South East
Hairdressers &/or Beauty Salon Supplies	McKewins Hair & Beauty Supplies Pty. Ltd., 202 Willoughby St., Mascot. 2020	48109	Premise Match	76m	South East
Perfume &/or Toilet Preparation Mfrs &/or Imps &/or W/Salers	Oz Australia, 285 King St., Mascot .2020	56983	Premise Match	76m	South East
Bakers & Pastrycooks Supplies	Brookes Foods Pty Ltd, 5 Chalmers Cr, Mascot 2020	35397	Premise Match	89m	North
Food Products Mfrs &/or Processors	Brookes Foods Pty Ltd, 5 Chalmers Cr., Mascot 2020	46096	Premise Match	89m	North
Adhesive Mfrs &/or Imps &/or Dists	Emhart Australia Pty. Ltd., 191 O' Riordan St., Mascot 2020	33411	Premise Match	98m	East
Galvanising &/or Tinning	Mascot Galvanising Works Pty Ltd, 342 King St., Mascot .2020	47416	Premise Match	112m	South East
Engineers Fabricating	A.E.P. Sheet Metal Pty Ltd, 205 O'Riordan St., Mascot 2020	43676	Premise Match	113m	South East
Gear Cutters &/or Mfrs	Austral Engineering Products Pty Ltd, 205-213 O'Riordan St Mascot 2020	47545	Premise Match	113m	South East
Engineers General	Austral Engineering Products Pty Ltd, 205-213 O'Riordan Street, Mascot 2020	43892	Premise Match	113m	South East
Gear Cutters &/or Mfrs	Austral Engineering Products Pty Ltd, 209 O'Riordan St., Mascot .2020	47546	Premise Match	113m	South East
Engineers General	Austral Engineering Products Pty Ltd, 209 O'Riordan St., Mascot 2020	43893	Premise Match	113m	South East
Customs & Tariff Concession Consultants	Angus International Freight Pty. Ltd., 18 Chalmers Cr., Mascot 2020	41110	Premise Match	120m	North
Freight Forwarders	Asean Cargo Services Pty. Ltd., 18 Chalmers Cr., Mascot 2020	46445	Premise Match	120m	North
Courier Services	City Link Messengers, 18 Chalmers Cr., Mascot 2020	40953	Premise Match	120m	North
Food Products Mfrs &/or Processors	Mayer F. Imports Pty Ltd., 18 Chalmers Cr., Mascot 2020	46146	Premise Match	120m	North
Freight Forwarders	Strang International Pty Ltd, 185 O'Riordan St., Mascot 2020	46524	Premise Match	122m	East
Scale &/or Weighing Machine Mfrs &/or Imps &/or Dealers	Annemac Pty Ltd, 12 Chalmers Cr Mascot 2020	61591	Premise Match	122m	North

Business Activity	Premise	Ref No.	Location Confidence	Distance to Feature Point	Direction
Grinders Precision	Churchill Precision Grinding, 14 Chalmers Cr., Mascot .2020	48003	Premise Match	122m	North
Machine Knife Mfrs &/or Dists	Churchill Precision Grinding, 14 Chalmers Cr., Mascot 2020	50944	Premise Match	122m	North
Carriers &/or Cartage Contractors	Dickson Carrier Pty. Ltd., 16 Chalmers Cr., Mascot 2020	38359	Premise Match	122m	North
Printers Supplies & Services	National Saw Works 14 Chalmers Cr Mascot 2020	59445	Premise Match	122m	North
Guillotione Blade &/or Shear Mfrs &/or Dists	National Saw Works, 14 Chalmers Cr., Mascot .2020	48061	Premise Match	122m	North
Machine Knife Mfrs &/or Dists	National Saw Works, 14 Chalmers Cr., Mascot 2020	50949	Premise Match	122m	North
Grinders Precision	National Saw Works, 14 Chalmers Cr., Mascot. 2020	48014	Premise Match	122m	North
Electric Light Fittings (Shades, Brackets, Etc) Mfrs &/or Dists	Odyssey Lighting (Australia) Pty. Ltd., 1/10 Chalmers Cr, Mascot 2020	42091	Premise Match	123m	North
Air Cargo Agents	Pacific Network Cargo, 10 Chalmers Cr., Mascot 2020	33733	Premise Match	123m	North
Hardware Mfrs &/or Dists &/or W/salers	Primeline A/Aasia Pty. Ltd., 1 Chalmers Cr., Mascot. 2020	48206	Premise Match	126m	North West
Furniture &/or Cabinet Makers Suppliers	Primeline A/Asia Pty Ltd, 1 Chalmers Cr., Mascot 2020	46849	Premise Match	126m	North West
Furniture &/or Cabinet Makers Suppliers	Geneva Furniture Pty. Ltd., 8 Chalmers Cr., Mascot 2020	46835	Premise Match	127m	North
Gas Industrial &/or Medical Mfrs &/or Dists	Natgas Pty. Ltd., 6 Chalmers Cr., Mascot. 2020	47510	Premise Match	132m	North
Bookbinders Supplies	lngster & Co. Pty. Ltd., 4 Chalmers Cr., Mascot 2020	36443	Premise Match	137m	North
Canvas Goods Mfrs &/or Dists	Goodearl & Bailey Pty Ltd, 219 O'Riordan St., Mascot 2020	38045	Premise Match	150m	South East

Business Directory Content Derived from Universal Business Directories (UBD) - Licensed from Hardie Grant

1991 Business to Business Directory Records Road or Area Matches

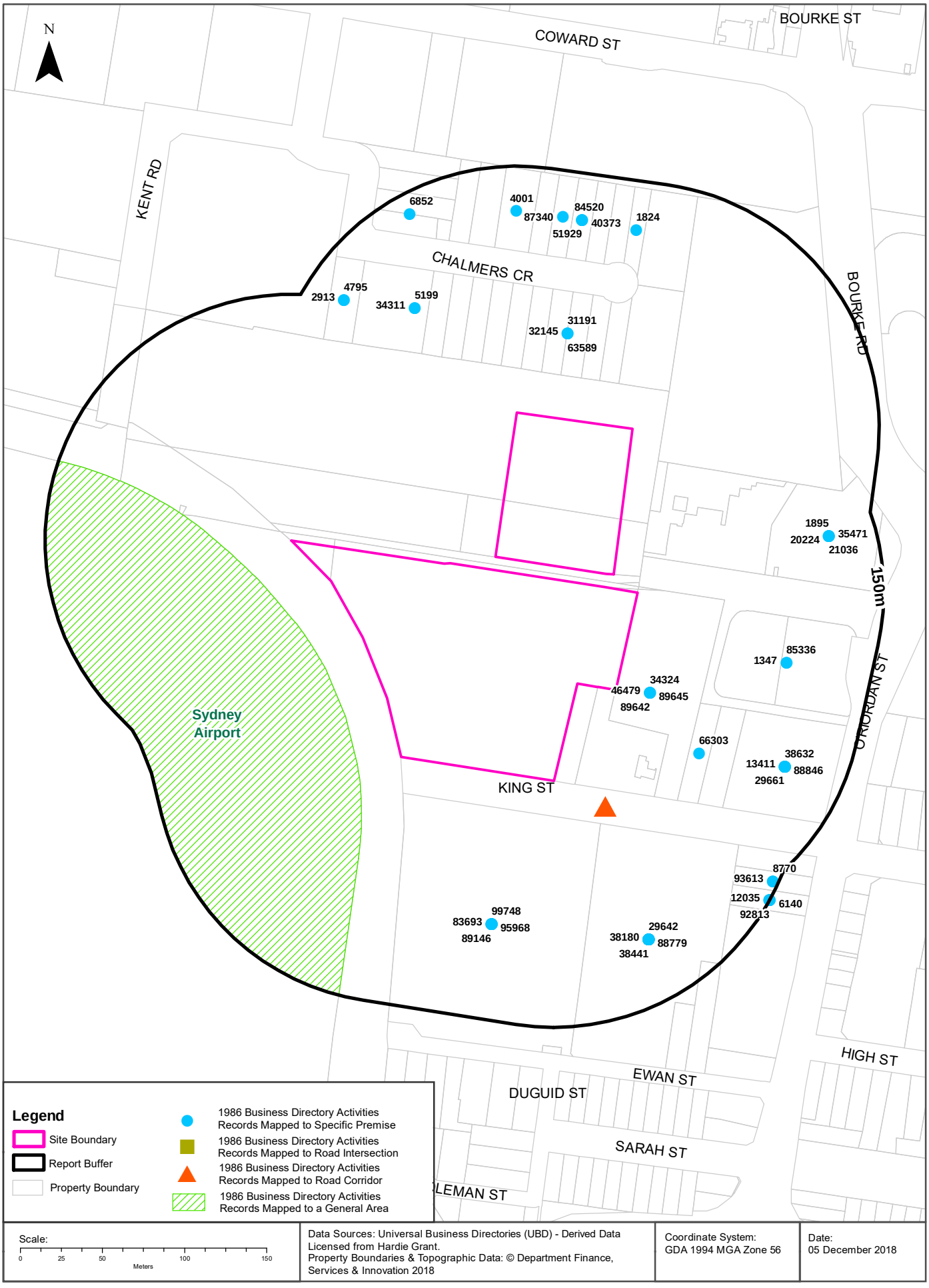
Records from the 1991 UBD Business to Business Directory, mapped to a road or an area, within the dataset buffer. Records are mapped to the road when a building number is not supplied, cannot be found, or the road has been renumbered since the directory was published:

Business Activity	Premise	Ref No.	Location Confidence	Distance to Road Corridor or Area
Air Cargo Agents	Continental Airlines Inc., Hangar 85, Sydney Airport, Mascot 2020	33696	Area Match	27m
Helicopter Charter &/or Service Operators	Helicopter Charter Pty. Ltd., Heliport, Heliport Rd., Mascot. 2020	48338	Area Match	27m

Business Directory Content Derived from Universal Business Directories (UBD) - Licensed from Hardie Grant

1986 Historical Business Directory Records

297 King Street, Mascot, NSW 2020



Historical Business Directories

297 King Street, Mascot, NSW 2020

1986 Business to Business Directory Records
Premise or Road Intersection Matches

Records from the 1986 UBD Business to Business Directory, mapped to a premise or road intersection, within the dataset buffer:

Business Activity	Premise	Ref No.	Location Confidence	Distance to Feature Point	Direction
SUGAR REFINERS.	Industrial Sugar Mills Pty. Ltd. 289 King Street, Mascot.	89642	Premise Match	21m	South East
ICING SUGAR MFRS.	Industrial Sugar Mills Pty. Ltd., 289 King St, Mascot.	47438	Premise Match	21m	South East
SUGAR REFINERS.	Industrial Sugar Mills Pty. Ltd., 289 King St., Mascot.	89645	Premise Match	21m	South East
HOTEL &/OR MOTEL EQUIPMENT &/OR SUPPLIES.	Industrial Sugar Mills Pty. Ltd., 289 King St., Mascot.	46479	Premise Match	21m	South East
FOOD PROCESSORS &/OR PACKERS.	Industrial Sugar Mills Pty. Ltd., 289 King St., Mascot.	34324	Premise Match	21m	South East
MOTOR ENGINEERS.	Timmy's Motor Repairs, Rear 9 Chalmers Cr., Mascot.	63589	Premise Match	52m	North
FASTENER MFRS. &/OR DISTS.	Wise, Eric E. Pty. Ltd., 9 Chalmers Cr., Mascot.	32145	Premise Match	52m	North
ENGINEERS – REPETITION.	Wise, Eric E. Pty. Ltd., 9 Chalmers Cr., Mascot.	31191	Premise Match	52m	North
MOTOR PANEL BEATERS &/OR SPRAY PAINTERS.	Reetworld Panel Repairs, 287 King St., Mascot.	66303	Premise Match	64m	South East
BAKERS & PASTRYCOOKS SUPPLIES.	Brookes Foods Pty. Ltd., 5 Chalmers Cr., Mascot	5199	Premise Match	89m	North
FOOD PROCESSORS &/OR PACKERS.	Brookes Foods Pty. Ltd., 5 Chalmers Cr., Mascot.	34311	Premise Match	89m	North
STEEL MERCHANTS - GENERAL.	Murray-More, J. (N,S.W.), 364 King St., Mascot.	89181	Premise Match	92m	South
STEEL MERCHANTS - GENERAL.	Murray-More, J. (N.S.W.) 364 King Street, Mascot.	89146	Premise Match	92m	South
STEEL MERCHANTS - BLACK SHEETS &/OR STRIP.	Murray-More, J. (N.S.W.), 364 King St, Mascot.	89133	Premise Match	92m	South
STEEL TUBING MFRS. &/OR DISTS.	Murray-More, J. (N.S.W.), 364 King St, Mascot.	89273	Premise Match	92m	South
EXPANDED METAL MFRS. &/OR DISTS.	Murray-More, J. (N.S.W.), 364 King St., Mascot	31685	Premise Match	92m	South
STEEL REINFORCEMENT DISTS.	Murray-More, J. (N.S.W.), 364 King St., Mascot.	89228	Premise Match	92m	South
ROOFING MATERIAL MFRS. &/OR DISTS.	Murray-More, J. (N.S.W.), 364 King St., Mascot.	83693	Premise Match	92m	South
PIPE &/OR PIPE FITTINGS MFRS. &/OR DISTS.	Murray-More, J. (N.S.W.), 364 King St., Mascot.	73964	Premise Match	92m	South
TUBE MFRS. &/OR DISTS.	Murray-More, J. (N.S.W.), 364 King St., Mascot.	95968	Premise Match	92m	South
WIRE MESH MFRS &/OR DISTS.	Murray-More, J. (N.S.W.), 364 King St., Mascot.	99748	Premise Match	92m	South
SEALING COMPOUNDS.	Emhart Australia Pty. Ltd. Bostik Division, 191 O'Riordan St., Mascot.	85336	Premise Match	98m	East
ADHESIVES MFRS. &/OR DISTS.	Emhart Australia Pty. Ltd. Bostik Division, 191 O'Riordan St., Mascot.	1347	Premise Match	98m	East
BOILER REPAIRERS &/OR SERVICEMEN.	Burner Combustion & Engineering Pty. Limited, 342 King St., Mascot.	6572	Premise Match	112m	South East

Business Activity	Premise	Ref No.	Location Confidence	Distance to Feature Point	Direction
FURNACE & COMBUSTION EQUIPMENT MFRS. &/OR IMPS. &/OR DISTS.	Burner Combustion & Engineering Pty. Ltd., 342 King St, Mascot	36569	Premise Match	112m	South East
GAS BURNERS-INDUSTRIAL-MFRS. &/OR DISTS.	Burner Combustion & Engineering Pty. Ltd., 342 King St, Mascot.	38441	Premise Match	112m	South East
HEAT EXCHANGER MFRS. &/OR DISTS.	Burner Combustion & Engineering Pty. Ltd., 342 King St., Mascot.	45443	Premise Match	112m	South East
OIL BURNER MFRS. &/OR IMPS. &/OR DISTS.	Burner Combustion & Engineering Pty. Ltd., 342 King St., Mascot.	70504	Premise Match	112m	South East
ENGINEERS-COMBUSTION.	Burner Combustion & Engineering Pty. Ltd., 342 King St., Mascot.	28700	Premise Match	112m	South East
ENGINEERS – FURNACES &/ OR COMBUSTION.	Burner Combustion & Engineering Pty. Ltd., 342 King St., Mascot.	29642	Premise Match	112m	South East
DRYING ROOM SYSTEMS MFRS. &/OR INSTALLERS.	Carmichael Steam Boilers Pty. Ltd , 342 King St, Mascot.	25586	Premise Match	112m	South East
BOILER REPAIRERS &/OR SERVICEMEN.	Carmichael Steam Boilers Pty. Ltd., 342 King St, Mascot.	6573	Premise Match	112m	South East
OIL BURNER MFRS. &/OR IMPS. &/OR DISTS.	Carmichael Steam Boilers Pty. Ltd., 342 King St, Mascot.	70505	Premise Match	112m	South East
STEAM GENERATOR MFRS. &/OR DISTS.	Carmichael Steam Boilers Pty. Ltd., 342 King St, Mascot.	88772	Premise Match	112m	South East
STEAM PLANT &/OR EQUIPMENT MFRS. &/OR DISTS.	Carmichael Steam Boilers Pty. Ltd., 342 King St, Mascot.	88779	Premise Match	112m	South East
BOILER PLANT MFRS. &/OR IMPS. &/OR DISTS.	Carmichael Steam Boilers Pty. Ltd., 342 King St., Mascot	6548	Premise Match	112m	South East
CONCRETE HANDLING EQUIPMENT & MACHINERY MFRS. &/OR IMPS. &/OR DISTS.	Carmichael Steam Boilers Pty. Ltd., 342 King St., Mascot	19808	Premise Match	112m	South East
ENGINEERS-COMBUSTION.	Carmichael Steam Boilers Pty. Ltd., 342 King St., Mascot.	28701	Premise Match	112m	South East
BOILERMAKERS.	Carmichael Steam Boilers Pty. Ltd., 342 King St., Mascot.	6596	Premise Match	112m	South East
STEAM PLANT INSTALLATION SPECIALISTS.	Carmichael Steam Boilers Pty. Ltd., 342 King St., Mascot.	88791	Premise Match	112m	South East
PRESSURE VESSEL MFRS.	Carmichael Steam Boilers Pty. Ltd., 342 King St., Mascot.	75826	Premise Match	112m	South East
GAS BURNERS-INDUSTRIAL-MFRS. &/OR DISTS.	Carmichael Steam Boilers Pty. Ltd., 342 King St., Mascot.	38445	Premise Match	112m	South East
TIMBER TREATMENT SPECIALISTS.	Carmichael Steam Boilers Pty. Ltd., 342 King St., Mascot.	93652	Premise Match	112m	South East
GALVANISING &/OR TINNING.	Mascot Galvanising Works Pty. Ltd., 342 King St., Mascot.	38180	Premise Match	112m	South East
IRRIGATION SYSTEMS & EQUIPMENT MFRS. &/OR DISTS. WOR INSTALLERS.	McCarey Irrigation Pty. Ltd., 11 Ewan St., Mascot.	49333	Premise Match	112m	South East
PNEUMATIC TOOLS MFRS. &/OR DISTS.	A.E.P. Engineering Sales Pty. Ltd. 205-213 O'Riordan St., Mascot.	75328	Premise Match	113m	South East
AIR EQUIPMENT MFRS. &/OR DISTS.	A.E.P. Engineering Sales Pty. Ltd., 209 O'Riordan St., Mascot	2507	Premise Match	113m	South East
CHAIN-HEAVY-MFRS. &/OR IMPS. &/OR DISTS.	A.E.P. Engineering Sales Pty. Ltd., 209 O'Riordan St., Mascot	13426	Premise Match	113m	South East
CHAIN DRIVE SPECIALISTS.	A.E.P. Engineering Sales Pty. Ltd., 209 O'Riordan St., Mascot.	13411	Premise Match	113m	South East
PNEUMATIC TOOLS MFRS. &/OR DISTS.	A.E.P. Engineering Sales Pty. Ltd., 209 O'Riordan St., Mascot.	75330	Premise Match	113m	South East
SHEET METAL WORKERS.	A.E.P. Sheet Metal Pty. Ltd., 205 O'Riordan St, Mascot.	85949	Premise Match	113m	South East
STEEL FABRICATORS.	A.E.P. Sheet Metal Pty. Ltd., 205 O'Riordan St., Mascot.	88846	Premise Match	113m	South East
ENGINEERS – FABRICATING.	A.E.P. Sheet Metal Pty. Ltd., 205 O'Riordan St., Mascot.	29327	Premise Match	113m	South East

Business Activity	Premise	Ref No.	Location Confidence	Distance to Feature Point	Direction
ENGINEERS – GENERAL &/ OR MANUFACTURING &/ OR MECHANICAL.	Austral Engineering Products Pty. Ltd. 205-213 O'Riordan St., Mascot.	29661	Premise Match	113m	South East
GEAR CUTTERS &/OR MFRS.	Austral Engineering Products Pty. Ltd. 205-213 O'Riordan Street, Mascot.	38627	Premise Match	113m	South East
GEAR CUTTERS &/OR MFRS.	Austral Engineering Products Pty. Ltd., 209 O'Riordan St., Mascot	38632	Premise Match	113m	South East
CHAIN SPROCKETS MFRS. &/OR DISTS.	Austral Engineering Products Pty. Ltd., 209 O'Riordan St., Mascot	13486	Premise Match	113m	South East
ENGINEERS – GENERAL &/ OR MANUFACTURING &/ OR MECHANICAL.	Austral Engineering Products Pty. Ltd., 209 O'Riordan St., Mascot.	29746	Premise Match	113m	South East
AIR CARGO AGENTS.	Brambles International, 18 Chalmers Cr., Mascot.	1824	Premise Match	120m	North
AIR CARGO AGENTS.	Tradex Transport Pty. Ltd., 185 O'Riordan St., Mascot.	1895	Premise Match	122m	East
CONTAINER TRANSPORT SERVICES.	Tradex Transport Pty. Ltd., 185 O'Riordan St., Mascot.	20224	Premise Match	122m	East
CONTAINER-CARGO-REPAIR & STORAGE.	Tradex Transport Pty. Ltd., 185 O'Riordan St., Mascot.	20186	Premise Match	122m	East
CUSTOMS AGENTS.	Tradex Transport Pty. Ltd., 185 O'Riordan St., Mascot.	21036	Premise Match	122m	East
FREIGHT FORWARDERS.	Tradex Transport Pty. Ltd, 185 O'Riordan St., Mascot.	35471	Premise Match	122m	East
SPORTING GOODS MFRS. &/OR IMPS. &/OR W/SALERS.	Blue Dot Targets, 12 Chalmers Cr., Mascot.	87340	Premise Match	122m	North
SAW &/OR KNIFE &/OR TOOL SHARPENER.	National Saw Works Pty. Ltd., 14 Chalmers Cr., Mascot.	84561	Premise Match	122m	North
SAW BLADES - BAND, CIRCULAR, - MFRS. &/OR IMPS. &/OR DISTS.	National Saw Works Pty. Ltd., 14 Chalmers Cr., Mascot.	84520	Premise Match	122m	North
GRINDERS PRECISION.	National Saw Works Pty. Ltd., 14 Chalmers Cr., Mascot.	40373	Premise Match	122m	North
MACHINE KNIFE MFRS.	National Saw Works Pty. Ltd., 14 Chalmers Cr., Mascot.	51929	Premise Match	122m	North
ASBESTOS REMOVAL CONTRACTORS	Interfil (Aust.) Pty. Ltd., 10 Chalmers Cr., Mascot.	4001	Premise Match	123m	North
AUTOMATIC SLOT MACHINES MFRS. &/OR DISTS.	Talto (Australia) Pty. Ltd., 1 Chalmers Cr., Mascot.	4795	Premise Match	126m	North West
AMUSEMENT MACHINES.	Talto (Australia) Pty. Ltd., 1 Chalmers Cr., Mascot.	2913	Premise Match	126m	North West
BOOKBINDERS SUPPLIES.	Ingster & Co. Pty. Ltd., 4 Chalmers Cr„ Mascot.	6852	Premise Match	137m	North
BUILDERS SUPPLIERS.	South Sydney Building Service, 217 O'Riordan St., Mascot.	8770	Premise Match	146m	South East
TIMBER MERCHANTS.	South Sydney Building Service, 217 O'Riordan St., Mascot.	93613	Premise Match	146m	South East
HORSE &/OR CATTLE RUG MFRS.	Goodearl & Bailey Pty. Ltd , 219 O'Riordan St., Mascot.	46122	Premise Match	150m	South East
CAMPING EQUIPMENT MFRS.	Goodearl & Bailey Pty. Ltd., 219 O'Riordan St., Mascot.	12035	Premise Match	150m	South East
CANVAS GOODS MFRS. &/OR DISTS.	Goodearl & Bailey Pty. Ltd., 219 O'Riordan St., Mascot.	12168	Premise Match	150m	South East
BLIND MFRS. &/OR DISTS.-CANVAS-HOLLAND-VENETIAN.	Goodearl & Bailey Pty. Ltd., 219 O'Riordan St., Mascot.	6079	Premise Match	150m	South East
BLIND MFRS SUPPLIES.	Goodearl & Bailey Pty. Ltd., 219 O'Riordan St., Mascot.	6140	Premise Match	150m	South East
TENTS &/OR TARPAULINS.	Weed & Bailey Pty. Ltd.; 219 O'Riordan St., Mascot.	92813	Premise Match	150m	South East

Business Directory Content Derived from Universal Business Directories (UBD) - Licensed from Hardie Grant

1986 Business to Business Directory Records
Road or Area Matches

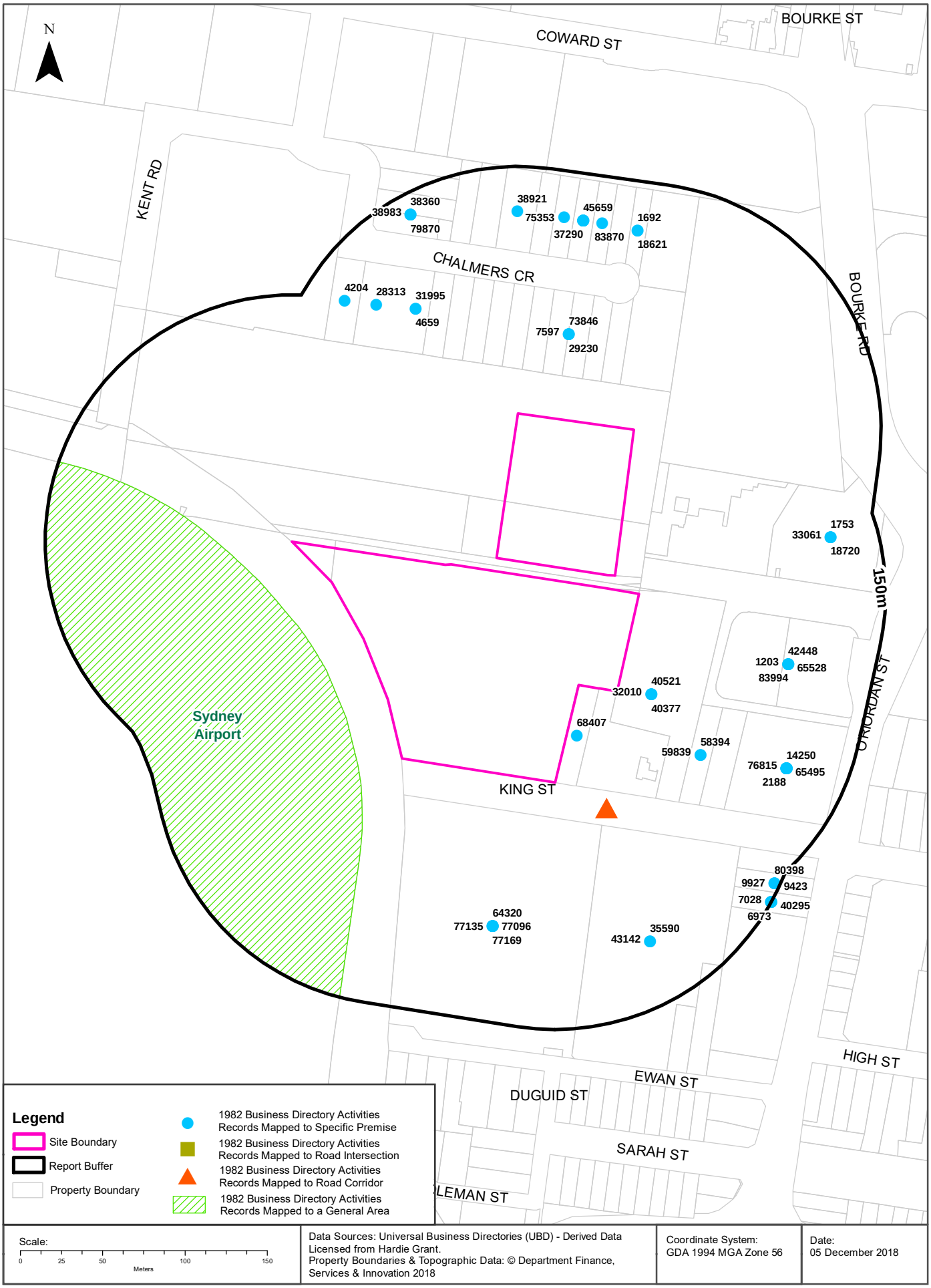
Records from the 1986 UBD Business to Business Directory, mapped to a road or an area, within the dataset buffer. Records are mapped to the road when a building number is not supplied, cannot be found, or the road has been renumbered since the directory was published:

Business Activity	Premise	Ref No.	Location Confidence	Distance to Road Corridor or Area
ARTISTS-COMMERCIAL & INDUSTRIAL.	A.S. Promotion, King St., Mascot.	3829	Road Match	0m
FREIGHT FORWARDERS.	Australian Air Freight Forwarders Pty. Ltd., King St., Mascot,	35374	Road Match	0m
AIR CARGO AGENTS.	Australian Air Freight Forwarders Pty. Ltd., King St., Mascot.	1820	Road Match	0m
DENTISTS.	Chang, P., 203 King St., Mascot.	22395	Road Match	0m
TRAVEL AGENCIES &/OR BOOKING OFFICES.	South Sydney Travel, 203 King St., Mascot.	95592	Road Match	0m
MOTOR BODY REPAIRS &/OR CONVERTERS. (M5140)	Sweetings Service Station, King St., Mascot,.	61439	Road Match	0m
ENGINEERS – GENERAL &/ OR MANUFACTURING &/ OR MECHANICAL.	Sweetings Service Station, King St., Mascot.	30359	Road Match	0m
MOTOR ACCESSORIES – RETAIL .	Sweetings Service Station, King St., Mascot.	61205	Road Match	0m
MOTOR GARAGES & SERVICE STATIONS.	Sweetings Service Station, King St., Mascot.	65543	Road Match	0m
MOTOR PANEL BEATERS &/OR SPRAY PAINTERS.	Sweetings Service Station, King St., Mascot.	66808	Road Match	0m
FREIGHT FORWARDERS.	Ansett Air Freight Ansett Terminal: Keith Smith Avenue, Mascot.	35353	Area Match	27m
GOVERNMENT DEPARTMENTS-COMMONWEALTH.	Civil Aviation Dept , Kingsford Smith Aerodrome, Mascot.	40140	Area Match	27m
AIR CARGO AGENTS.	Continental Airlines Inc., Hanger 85 Sydney Airport, Mascot.	1837	Area Match	27m
AIR SERVICE OPERATORS.	Flying Tigers, Kingsford Smith Airport, Third St., Mascot.	2551	Area Match	27m
HELICOPTER CHARTER.	Helicopter Charter Pty. Ltd., Heliport, Heliport Pl., Mascot.	45550	Area Match	27m
AIR CARGO AGENTS.	Pan American World Airways, Sydney Airport, Mascot.	1876	Area Match	27m
AIR CARGO AGENTS.	TNT Air Cargo Systems, Pan Am Cargo Building, Mascot	1889	Area Match	27m
MOTOR CAR &/OR TRUCK DEALERS-NEW &/OR USED.	Bosna Motors Pty. Ltd., 220 O'Riordan St., Mascot.	61969	Road Match	133m

Business Directory Content Derived from Universal Business Directories (UBD) - Licensed from Hardie Grant

1982 Historical Business Directory Records

297 King Street, Mascot, NSW 2020



Historical Business Directories

297 King Street, Mascot, NSW 2020

1982 Business Directory Records
Premise or Road Intersection Matches

Records from the 1982 UBD Business Directory, mapped to a premise or road intersection, within the dataset buffer:

Business Activity	Premise	Ref No.	Location Confidence	Distance to Feature Point	Direction
RADIO - TWO-WAY SALES &/OR SERVICE. (R1435)	Mobile Two-Way Radio (NSW) Pty. Ltd., 295 King St, Mascot 2020.	68407	Premise Match	6m	South East
HOTEL &/OR MOTEL EQUIPMENT SUPPLIES. (H7100)	Industrial Sugar Mills Pty. Ltd. 289 King St., Mascot. 2020.	40521	Premise Match	21m	South East
HOSPITAL SUPPLIES &EQUIPMENT MFRS. &/OR DISTS.(H6110)	Industrial Sugar Mills Pty. Ltd., 289 King St, Mascot 2020.	40377	Premise Match	21m	South East
FOOD PROCESSORS &/OR PACKERS. (F4925)	Industrial Sugar Mills Pty. Ltd., 289 King St., Mascot 2020.	32010	Premise Match	21m	South East
ENGINEERS - REPETITION. (E8100)	Wise Eric E. (Sales) Pty. Ltd., 9 Chalmers Cr., Mascot. 2020.	29230	Premise Match	52m	North
SCREW MFRS. &/OR W/SALERS.(S1680)	Wise Eric E.(Sales) Pty. Ltd, 9 Chalmers Cr., Mascot. 2020.	73846	Premise Match	52m	North
BOLT &/OR NUT MFRS.&/OR DISTS. (B4200)	Wise Eric E.(Sales) Pty. Ltd., 9 Chalmers Cr., Mascot. 2020.	7597	Premise Match	52m	North
MOTOR PANEL BEATERS &/OR SPRAY PAINTERS. (M7360)	Ison's, B. J. Smash Repairs. 287 King St., Mascot. 2020.	58394	Premise Match	64m	South East
MOTOR TRIMMERS. (M8260)	Truscot, P Rear 287 King St., Mascot. 2020.	59839	Premise Match	64m	South East
FOOD PROCESSORS &/OR PACKERS. (F4925)	Brookes Foods Pty. Ltd., 5 Chalmers Cr., Mascot 2020.	31995	Premise Match	89m	North
BAKERS & PASTRYCOOKS SUPPLIES. (B0580)	Brookes Foods Pty. Ltd., 5 Chalmers Cr., Mascot. 2020.	4659	Premise Match	89m	North
PIPE &/OR PIPE FITTINGS MFRS.&/OR DISTS. (P4846)	Murray-More, J. (N.S.W.) Pty. Ltd., 364 King St, Mascot 2020.	64320	Premise Match	92m	South
HYDRAULIC JACK MFRS. &/OR DISTS. (H7650)	Murray-More, J. (N.S.W.) Pty. Ltd., 364 King St, Mascot. 2020.	41307	Premise Match	92m	South
ROOFING MATERIAL MFRS. &/OR DISTS. (R6580)	Murray-More, J. (N.S.W.) Pty. Ltd., 364 King St., Mascot 2020.	72408	Premise Match	92m	South
STEEL MERCHANTS-GENERAL(S6420)	Murray-More, J. (N.S.W.) Pty. Ltd., 364 King St., Mascot 2020.	77135	Premise Match	92m	South
STEEL REINFORCEMENT DISTS.(S6540)	Murray-More, J. (N.S.W.) Pty. Ltd., 364 King St., Mascot 2020.	77169	Premise Match	92m	South
STEEL MERCHANTS - BLACK SHEETS &/OR STRIP. (S6405)	Murray-More, J. (N.S.W.) Pty. Ltd., 364 King St., Mascot. 2020.	77096	Premise Match	92m	South
POLISH MFRS. &/OR DISTS. (P6980)	Bostik Australia Pty. Ltd., 191 O'Riordan St., Mascot. 2020.	65528	Premise Match	98m	East
INSULATING MATERIALS MFRS.&/OR DISTS. &/OR SUPPLIERS.(I3660)	Bostik Australia Pty. Ltd., 191 O'Riordan St., Mascot. 2020.	42448	Premise Match	98m	East
ADHESIVES MFRS. &/OR DISTS.(A1110)	Bostik Australia Pty. Ltd., 191 O'Riordan St., Mascot. 2020.	1203	Premise Match	98m	East
WAX MFRS. &/OR IMPORTERS.(W2360)	Bostik Australia Pty. Ltd., 191 O'Riordan St., Mascot. 2020.	83994	Premise Match	98m	East

Business Activity	Premise	Ref No.	Location Confidence	Distance to Feature Point	Direction
ENGINEERS-GENERAL &/OR MANUFACTURING &/OR MECHANICAL. (E7140)	R.H. Engineering Pty. Ltd., 3 Chalmers Cr., Mascot. 2020.	28313	Premise Match	109m	North
GALVANISING &/OR TINNING.(G0200)	Mascot Galvanising Works Pty. Ltd., 342 King St., Mascot. 2020.	35590	Premise Match	112m	South East
IRRIGATION SYSTEMS &/OR EQUIPMENT.MFRS. &/OR DISTS.(I5950)	McCarey Irrigation Pty. Ltd, 11 Ewan St., Mascot. 2020.	43142	Premise Match	112m	South East
AIR EQUIPMENT MFRS. &/OR DISTS. (A3870)	A.E.P. Engineering Sales Pty, Ltd., 209 O'Riordan St, Mascot 2020.	2188	Premise Match	113m	South East
CHAIN - HEAVY - MFRS. &/OR IMPS. &/OR DISTS. (C3435)	A.E.P. Engineering Sales Pty. Ltd., 209 O'Riordan St., Mascot 2020.	14206	Premise Match	113m	South East
PNEUMATIC TOOLS MFRS. &/OR DISTS. (P6920)	A.E.P. Engineering Sales Pty. Ltd., 209 O'Riordan St., Mascot 2020.	65495	Premise Match	113m	South East
CHAIN DRIVE SPECIALISTS. (C3420)	A.E.P. Engineering Sales Ry. Ltd., 209 O'Riordan St., Mascot 2020.	14189	Premise Match	113m	South East
ENGINEERS - FABRICATING (E6870)	A.E.P. Sheet Metal Pty. Ltd., 205 O'Riordan St, Mascot 2020.	27450	Premise Match	113m	South East
SHEET METAL WORKERS. (S2595)	A.E.P. Sheet Metal Pty. Ltd., 205 O'Riordan St, Mascot. 2020.	74213	Premise Match	113m	South East
STEEL FABRICATORS, (S6105)	A.E.P. Sheet Metal Pty. Ltd., 205 O'Riordan St., Mascot 2020.	76815	Premise Match	113m	South East
CHAIN SPROCKETS MFRS. &/OR DISTS. (C3585)	Austral Engineering Products Pty. Ltd., 209 O'Riordan St,Mascot. 2020.	14250	Premise Match	113m	South East
GEAR CUTTERS &/OR MFRS.(G2250)	Austral Engineering Products Pty. Ltd., 209 O'Riordan St,Mascot. 2020.	35934	Premise Match	113m	South East
ENGINEERS-GENERAL &/OR MANUFACTURING &/OR MECHANICAL. (E7140)	Austral Engineering Products Pty. Ltd., 209 O'Riordan St,Mascot. 2020.	27817	Premise Match	113m	South East
FAN &/OR BLOWER MFRS. &/OR DISTS. (F0225)	Industrial Air Handling Equipment Pty. Ltd., 205 O'Riordan St.,Mascot. 2020.	29941	Premise Match	113m	South East
CUSTOMS AGENTS. (C9165)	Brambles-Ruys Pty. Ltd., 18 Chalmers Cr., Mascot. 2020.	18621	Premise Match	120m	North
AIR CARGO AGENTS. (A3240)	Brambles-Ruys Pty. Ltd., 18 Chalmers Cr., Mascot. 2020.	1692	Premise Match	120m	North
AIR CARGO AGENTS. (A3240)	Tradex Transport Pty. Ltd., 185 O'Riordan St., Mascot. 2020.	1753	Premise Match	122m	East
CUSTOMS AGENTS. (C9165)	Tradex Transport Pty. Ltd., 185 O'Riordan St., Mascot. 2020.	18720	Premise Match	122m	East
FREIGHT FORWARDERS. (F6185)	Tradex Transport Pty. Ltd., 185 O'Riordan St., Mascot. 2020.	33061	Premise Match	122m	East
SPORTS GOODS MFRS. (S4815)	Blue Dot Targets, 12 Chalmers Cr., Mascot. 2020.	75353	Premise Match	122m	North
SAW BLADES-BAND, CIRCULAR,- MFRS. &/OR IMPS. &/OR DISTS. (S0885)	National Saw Works Pty. Ltd., 14 Chalmers Cr., Mascot. 2020.	73145	Premise Match	122m	North
SAW KNIFE &/OR TOOL SHARPENERS. (S0930)	National Saw Works Pty. Ltd., 14 Chalmers Cr., Mascot. 2020.	73181	Premise Match	122m	North
PRINTERS SUPPLIES. (P8660)	National Saw Works Pty. Ltd., 14 Chalmers Cr., Mascot. 2020.	66946	Premise Match	122m	North
KNIFE MFRS. - TRADESMENS.(K0700)	National Saw Works Pty. Ltd., 14 Chalmers Cr., Mascot. 2020.	44368	Premise Match	122m	North
GRINDERS PRECISION. (G7550)	National Saw Works Pty. Ltd., 14 Chalmers Cr., Mascot. 2020.	37290	Premise Match	122m	North
MACHINE KNIFE MFRS. (M0060)	National Saw Works Pty. Ltd., 14 Chalmers Cr., Mascot. 2020i	45659	Premise Match	122m	North
WASTE PRODUCT MERCHANTS.(W1040)	Trans-Asia Trading Co. Pty. Ltd., 16 Chalmers Cr., Mascot. 2020.	83870	Premise Match	122m	North
HANDBAG FRAME MFRS. (H1260)	Perry & Schapira Pty. Ltd., 10 Chalmers Cr., Mascot. 2020.	38921	Premise Match	123m	North
AUTOMATIC SLOT MACHINES MFRS. &/OR DISTS. (A8610)	Taito Australia Pty. Ltd., 1 Chalmers Cr.(Mascot. 2020.	4204	Premise Match	126m	North West

Business Activity	Premise	Ref No.	Location Confidence	Distance to Feature Point	Direction
TEXTURE COATERS&/OR TREATERS. (T3427)	Ingster, J. & I. Pty. Ltd., 4 Chalmers Cr., Mascot. 2020	79870	Premise Match	137m	North
HABERDASHERY-WHOLESALE.(H0100)	Ingster, J. & I. Pty. Ltd., 4 Chalmers Cr., Mascot. 2020.	38360	Premise Match	137m	North
HARDWARE MFRS. &/OR DISTS.(H2000)	Ingster, J. &, I. Pty. Ltd, 4 Chalmers Cr., Mascot. 2020.	38983	Premise Match	137m	North
BUILDERS &/OR BUILDING CONTRACTORS. (B6920)	South Sydney Building Service, 217 O'Riordan St., Mascot. 2020.	9423	Premise Match	146m	South East
BUILDERS SUPPLIERS. (B7060)	South Sydney Building Service, 217 O'Riordan St., Mascot. 2020.	9927	Premise Match	146m	South East
TIMBER MERCHANTS. (T4625)	South Sydney Building Service, 217 O'Riordan St., Mascot. 2020.	80398	Premise Match	146m	South East
TENTS &/OR TARPAULINS. (T2775)	Goodearl & Bailey Pty. Ltd , 219 O'Riordan St., Mascot. 2020.	79578	Premise Match	150m	South East
CANVAS GOODS MFRS. &/OR W/SALERS. (C0990)	Goodearl & Bailey Pty. Ltd., 219 O Riordan St Mascot. 2020.	13039	Premise Match	150m	South East
BLIND MFRS SUPPLIES. (B3100)	Goodearl & Bailey Pty. Ltd., 219 O'Riordan St., Mascot. 2020.	7028	Premise Match	150m	South East
BLIND MFRS. &/OR DISTS.-CANVAS - HOLLAND - VENETIAN. (B3030)	Goodearl & Bailey Pty. Ltd., 219 O'Riordan St., Mascot. 2020.	6973	Premise Match	150m	South East
CAMPING EQUIPMENT MFRS.(C0585)	Goodearl & Bailey Pty. Ltd., 219 O'Riordan St., Mascot. 2020.	12911	Premise Match	150m	South East
HORSE &/OR CATTLE RUG MFRS.(H5450)	Goodearl & Bailey Pty. Ltd., 219 O'Riordan St., Mascot. 2020.	40295	Premise Match	150m	South East

Business Directory Content Derived from Universal Business Directories (UBD) - Licensed from Hardie Grant

1982 Business Directory Records Road or Area Matches

Records from the 1982 UBD Business Directory, mapped to a road or an area, within the dataset buffer. Records are mapped to the road when a building number is not supplied, cannot be found, or the road has been renumbered since the directory was published:

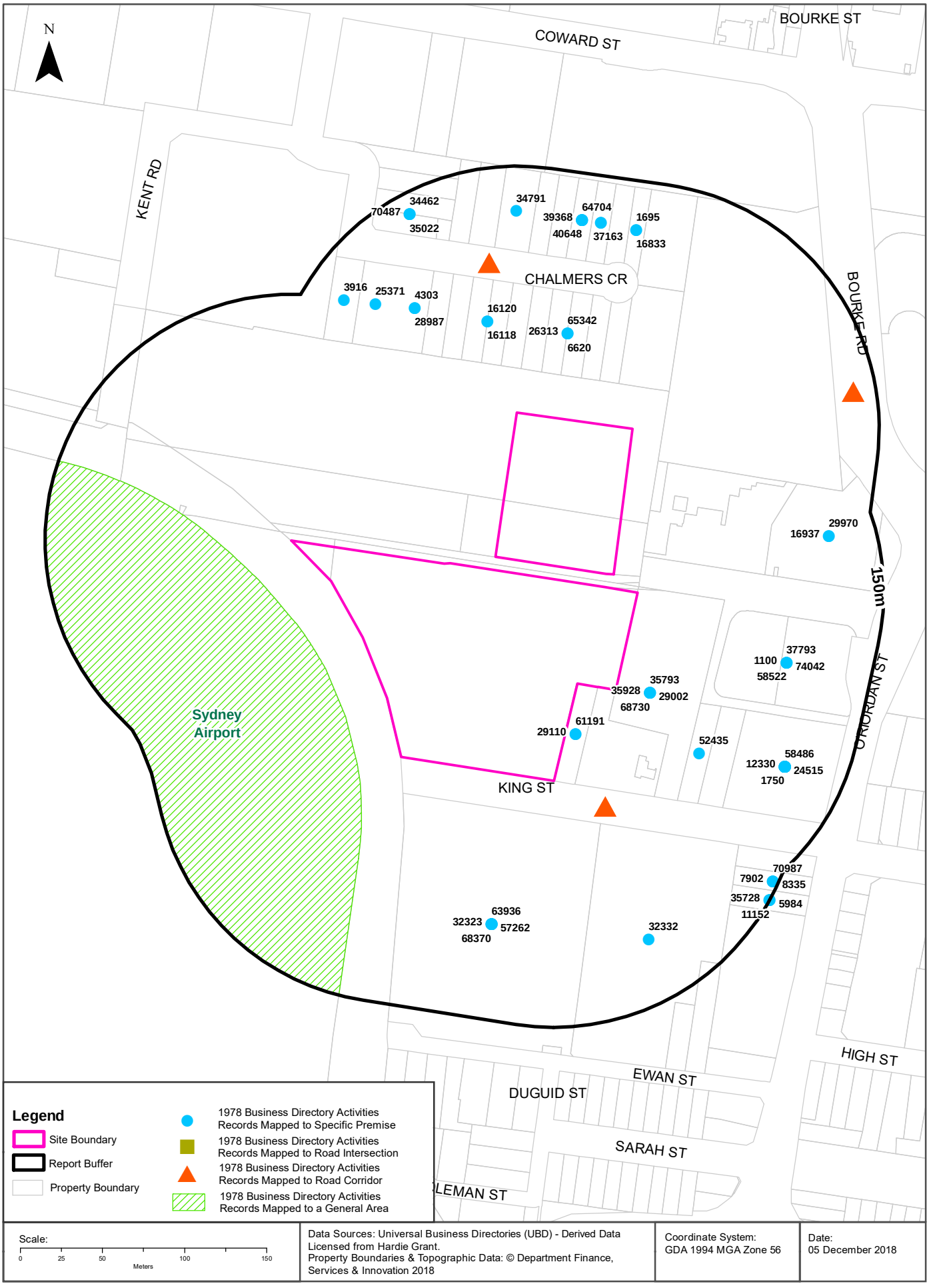
Business Activity	Premise	Ref No.	Location Confidence	Distance to Road Corridor or Area
ARTISTS - COMMERCIAL &INDUSTRIAL. (A7385)	A.S, Promotion, King St., Mascot. 2020,	3415	Road Match	0m
ENGINEERS-GENERAL &/OR MANUFACTURING &/OR MECHANICAL. (E7140)	Sweetings Service Station, King St., Mascot. 2020.	28403	Road Match	0m
MOTOR ACCESSORIES DEALERS.(M4690)	Sweetings Service Station, King St., Mascot. 2020.	53981	Road Match	0m
MOTOR BODY REPAIRS &/OR CONVERTERS. (M5140)	Sweetings Service Station, King St., Mascot. 2020.	54329	Road Match	0m
MOTOR GARAGES &/OR ENGINEERS &/OR SERVICE STATIONS. (M6860)	Sweetings Service Station, King St., Mascot. 2020.	57664	Road Match	0m
MOTOR PANEL BEATERS &/OR SPRAY PAINTERS. (M7360)	Sweetings Service Station, King St., Mascot. 2020.	58766	Road Match	0m
AIR SERVICE OPERATORS. (A4080)	Australian Aircraft Sales Pty. Ltd., Hanger 2, Mascot. 2020.	2214	Area Match	27m
AIRCRAFT MFRS. &/OR DISTS.(A4590)	Australian Aircraft Sales Pty. Ltd., Hanger 2, Mascot. 2020.	2310	Area Match	27m
GOVERNMENT DEPARTMENTS - COMMONWEALTH. (G6050)	Civil Aviation Dept., Kingsford Smith Aerodrome, Mascot. 2020.	37087	Area Match	27m
AIR CARGO AGENTS. (A3240)	Continental Airlines Inc., Hanger 85 Sydney Airport, Mascot. 2020.	1703	Area Match	27m

Business Activity	Premise	Ref No.	Location Confidence	Distance to Road Corridor or Area
AIR CARGO AGENTS. (A3240)	Emery Air Freight Corporation, Airport, Mascot. 2020.	1707	Area Match	27m
FREIGHT FORWARDERS. (F6185)	Emery Air Freight Corporation, Airport, Mascot. 2020.	33000	Area Match	27m
AIR SERVICE OPERATORS. (A4080)	General Aviation Air Freighters Pty. Ltd., Hanger 1, Mascot Airport,Mascot. 2020.	2223	Area Match	27m
AIR SERVICE OPERATORS. (A4080)	Masling Air Commuter Services Pty. Ltd., TAA Terminal, Mascot 2020	2232	Area Match	27m
AIR CARGO AGENTS. (A3240)	Masling Air Commuter Services Pty. Ltd., TAA Terminal, Mascot 2020.	1730	Area Match	27m
AIR CARGO AGENTS. (A3240)	Pan American World Airways, Sydney Airport, Mascot. 2020.	1737	Area Match	27m
AIR CHARTER SERVICES. (A3270)	Scruse-Air Helicopters, Heliport PI., Mascot. 2020.	1786	Area Match	27m
AIR CARGO AGENTS. (A3240)	TNT Air Cargo System, Pan Am Cargo Building, Sydney Airport, Mascot 2020.	1752	Area Match	27m
MOTOR CAR &/OR TRUCK DEALERS - NEW &/OR USED. (M5840)	Bosnia Motors Pty. Ltd., 220 O'Riordan St., Mascot. 2020.	54692	Road Match	133m

Business Directory Content Derived from Universal Business Directories (UBD) - Licensed from Hardie Grant

1978 Historical Business Directory Records

297 King Street, Mascot, NSW 2020



Historical Business Directories

297 King Street, Mascot, NSW 2020

1978 Business Directory Records
Premise or Road Intersection Matches

Records from the 1978 UBD Business Directory, mapped to a premise or road intersection, within the dataset buffer:

Business Activity	Premise	Ref No.	Location Confidence	Distance to Feature Point	Direction
FOOD WRAPPING &/OR PACKING MACHINERY IMPS. &/OR DISTS.	Ross Industries Aust. Pty. Ltd., 295 King St., Mascot.	29110	Premise Match	6m	South East
RADIO TWO-WAY SALES &/OR SERVICE.	Willis Two-Way Radio Pty. Ltd., 295 King St., Mascot.	61191	Premise Match	6m	South East
ICING SUGAR.MFRS.	Industrial Sugar Mills Pty. Ltd 289 King St, Mascot	36679	Premise Match	21m	South East
STROLLER MFRS. &/OR DISTS. - BABIES, GOLF, LAUNDRY, SHOPPING.	Industrial Sugar Mills Pty. Ltd. 289 King Street, Mascot	68730	Premise Match	21m	South East
HOSPITAL SUPPLIES & EQUIPMENT MFRS. &/OR DISTS.	Industrial Sugar Mills Pty. Ltd., 289 King St, Mascot	35793	Premise Match	21m	South East
FOOD. PROCESSORS &/OR PACKERS.	Industrial Sugar Mills Pty. Ltd., 289 King St, Mascot	29002	Premise Match	21m	South East
HOTEL &/OR MOTEL EQUIPMENT SUPPLIES.	Industrial Sugar Mills Pty.Ltd., 289 King St, Mascot	35928	Premise Match	21m	South East
ENGINEERS-REPETITION.	Wise Eric E.(Sales) Pty. Ltd., 9 Chalmers Cr., Mascot.	26313	Premise Match	52m	North
BOLT &/OR NUT MFRS.&/OR DISTS.	Wise Eric E.(Sales) Pty. Ltd., 9 Chalmers Cr., Mascot.	6620	Premise Match	52m	North
SCFREW MFRS. &/OR W/SALERS	Wise Eric E.(Sales) Pty. Ltd., 9 Chalmers Cr.-, Mascot.	65342	Premise Match	52m	North
CONFECTIONERY MFRS. &/OR W/SALERS.	Exquisite Chocolate Products Pty. Ltd., 7 Chalmers Cr., Mascot.	16118	Premise Match	58m	North
CONFECTIONERY MFRS. &/OR W/SALERS.	Red Tulip (N.S.W.) Pty. Ltd., 7 Chalmers Cr., Mascot.	16120	Premise Match	58m	North
MOTOR PANEL BEATERS	Universal Smash Repairs. 287 King St., Mascot.	52435	Premise Match	64m	South East
FOOD. PROCESSORS &/OR PACKERS.	Brookes Foods Pty. Ltd., 5 Chalmers Cr., Mascot	28987	Premise Match	89m	North
BAKERS & PASTRYCOOKS SUPPLIES.	Brookes Foods Pty. Ltd., 5 Chalmers Cr., Mascot	4303	Premise Match	89m	North
STEEL MERCHANTS-GENERAL.	Murray-More J (NSW) Pty. Ltd. 364 King St. Mascot	68301	Premise Match	92m	South
STEEL MERCHANTS-BLACK SHEETS &/OR STRIP.	Murray-More, J. (N.S.W.) Pty. Ltd, 364 King St, Mascot	68286	Premise Match	92m	South
STEEL REINFORCEMENT DISTS.	Murray-More, J. (N.S.W.) Pty. Ltd, 364 King St, Mascot	68370	Premise Match	92m	South
STEEL MERCHANTS-GENERAL.	Murray-More, J. (N.S.W.) Pty. Ltd., 364 King St, Mascot	68329	Premise Match	92m	South
ROOFING MATERIAL MFRS.&/OR DISTS.	Murray-More, J. (N.S.W.) Pty. Ltd., 364 King St, Mascot	63936	Premise Match	92m	South
PIPE &/OR PIPE FITTINGS MFRS. &/OR DISTS.	Murray-More, J. (N.S.W.) Pty. Ltd., 364 King St, Mascot	57262	Premise Match	92m	South
GALVANISED IRON MERCHANTS.	Murray-More, J. (N.S.W.) Pty. Ltd., 364 King St, Mascot	32323	Premise Match	92m	South
POLISH MFRS. &/OR DISTS	Bostik Australia Pty. Ltd., 191 O'Riordan St., Mascot.	58522	Premise Match	98m	East
ADHESIVES MFRS. &/OR DISTS.	Bostik Australia Pty. Ltd., 191 O'Riordan St., Mascot.	1100	Premise Match	98m	East
WAX MFRS. &/OR IMPORTERS.	Bostik Australia Pty. Ltd., 191 O'Riordan St., Mascot.	74042	Premise Match	98m	East

Business Activity	Premise	Ref No.	Location Confidence	Distance to Feature Point	Direction
INSULATING MATERIALS MFRS. &/OR DISTS. &/OR SUPPLIERS.	Bostik Australia Pty. Ltd.. 191 O'Riordan St., Mascot.	37793	Premise Match	98m	East
ENGINEERS- GENERAL &/OR MANUFACTURING &/OR MECHANICAL	R.H. Engineering Pty. Ltd., 3 Chalmers Cr., Mascot. .	25371	Premise Match	109m	North
GALVANISING &/OR TINNING.	Mascot Galvanising Works Pty. Ltd., 342 King St., Mascot.	32332	Premise Match	112m	South East
CHAIN DRIVE SPECIALISTS.	A E.P. Engineering Sales Pty. Ltd. 205-213 O'Riordan St., Mascot	12328	Premise Match	113m	South East
CHAIN DRIVE SPECIALISTS.	A.E.P. Engineering Sales Pty. Ltd, 209 O'Riordan St, Mascot	12330	Premise Match	113m	South East
AIR EQUIPMENT MFRS. &/OR DISTS.	A.E.P. Engineering Sales Pty. Ltd. 205-213 O'Riordan St., Mascot	2092	Premise Match	113m	South East
PNEUMATIC TOOLS MFRS. &/OR DISTS.	A.E.P. Engineering Sales Pty. Ltd. 205-213 O'Riordan St., Mascot,	58482	Premise Match	113m	South East
PNEUMATIC TOOLS MFRS. &/OR DISTS.	A.E.P. Engineering Sales Pty. Ltd., 209 O'Riordan St, Mascot	58486	Premise Match	113m	South East
SHEET METAL WORKERS.	A.E.P. Sheet Metal Pty. Ltd, 205 O'Riordan St, Mascot	65678	Premise Match	113m	South East
SHEET METAL WORKERS.	A.E.P. Sheet Metal Pty. Ltd. 205 O'Riordan St. Mascot	65667	Premise Match	113m	South East
STEEL FABRICATORS.	A.E.P. Sheet Metal Pty. Ltd., 205 O'Riordan St, Mascot	68037	Premise Match	113m	South East
ENGINEERS-FABRICATING.	A.E.P. Sheet Metal Pty. Ltd., 205 O'Riordan St, Mascot	24515	Premise Match	113m	South East
ENGINEERS-HOT WATER HEATING &/OR VENTILATING.	A.E.P. Sheet Metal Pty. Ltd., 205 O'Riordan St, Mascot	25575	Premise Match	113m	South East
ELECTRICAL METER BOX &/OR SURROUNDS MFRS.	A.E.P. Sheet Metal Pty. Ltd., 205 O'Riordan St, Mascot	22599	Premise Match	113m	South East
ELECTRICAL SWITCHBOARD MFRS. &/OR DISTS. SWITCHBOARD	A.E.P. Sheet Metal Pty. Ltd.. 205 O'Riordan St, Mascot	23008	Premise Match	113m	South East
AIR EQUIPMENT MFRS. &/OR DISTS.	A.EP. Engineering Sales Pty. Ltd., 209 O'Riordan St, Mascot	2094	Premise Match	113m	South East
CHAIN-HEAVY-MFRS. &/OR IMPS. &/OR DISTS.	A.EP. Engineering Sales Pty. Ltd., 209 O'Riordan St, Mascot	12342	Premise Match	113m	South East
CHAIN SPROCKET MFRS.	Austral Engineering Products Pty. Ltd, 209 O'Riordan St, Mascot	12377	Premise Match	113m	South East
ENGINEERS- GENERAL &/OR MANUFACTURING &/OR MECHANICAL	Austral Engineering Products Pty. Ltd. 205-213 O.'Riordan St., Mascot	24820	Premise Match	113m	South East
CHAIN SPROCKET MFRS.	Austral Engineering Products Pty. Ltd. 205-213 O'Riordan St., Mascot	12376	Premise Match	113m	South East
GEAR CUTTERS &/OR MFRS.	Austral Engineering Products Pty. Ltd. 205-213 O'Riordan St., Mascot	32580	Premise Match	113m	South East
GEAR CUTTERS &/OR MFRS.	Austral Engineering Products Pty. Ltd., 209 O'Riordan St, Mascot	32586	Premise Match	113m	South East
ENGINEERS- GENERAL &/OR MANUFACTURING &/OR MECHANICAL	Austral Engineering Products Pty. Ltd., 209 O'Riordan St, Mascot	24893	Premise Match	113m	South East
AIR CARGO AGENTS.	Wathen Curnow & Cocks (Sydney) Pty. Ltd., 209 O'Riordan St., Mascot.	1750	Premise Match	113m	South East
AIR CARGO AGENTS.	Brambles-Ruys Pty. Ltd, 18 Chalmers Cr., Mascot	1695	Premise Match	120m	North
CUSTOMS AGENTS.	Brambles-Ruys Pty. Ltd., 18 Chalmers Cr., Mascot	16833	Premise Match	120m	North
CUSTOMS AGENTS.	Tradex Transport Pty. Ltd., 185 O'Riordan St., Mascot.	16937	Premise Match	122m	East
FREIGHT FORWARDERS.	Tradex Transport Pty. Ltd., 185 O'Riordan St., Mascot.	29970	Premise Match	122m	East
PRINTERS SUPPLIES.	National Saw Works Pty. Ltd., 14 Chalmers Cr., Mascot	59855	Premise Match	122m	North
SAW &/OR TOOL SHARPENERS.	National Saw Works Pty. Ltd., 14 Chalmers Cr., Mascot.	64729	Premise Match	122m	North
SAW MFRS. &/OR IMPS. &/OR DISTS.	National Saw Works Pty. Ltd., 14 Chalmers Cr., Mascot.	64704	Premise Match	122m	North
GRINDERS PRECISION.	National Saw Works Pty. Ltd., 14 Chalmers Cr., Mascot.	33589	Premise Match	122m	North
KNIFE MFRS.-TRADESMENS.	National Saw Works Pty. Ltd., 14 Chalmers Cr., Mascot.	39368	Premise Match	122m	North

Business Activity	Premise	Ref No.	Location Confidence	Distance to Feature Point	Direction
MACHINE KNIFE MFRS.	National Saw Works Pty. Ltd., 14 Chalmers Cr.. Mascot.	40648	Premise Match	122m	North
EXPORTERS.	Trans Asia Trading Co. Pty. Ltd., 16 Chalmers Cr., Mascot	27007	Premise Match	122m	North
IMPORTERS.	Trans Asia Trading Co. Pty. Ltd., 16 Chalmers Cr., Mascot.	37163	Premise Match	122m	North
HANDBAG FRAME MFRS.	Perry & Schapira Pty. Ltd., 10 Chalmers Cr„ Mascot.	34791	Premise Match	123m	North
AUTOMATIC SLOT MACHINES MFRS. &/OR DISTS.	Taito (Aust.) Pty. Ltd., 1 Chalmers Cr., Mascot.	3916	Premise Match	126m	North West
HABERDASHERY-WHOLESALE.	Ingster, J. & I. Pty. Ltd., 4 Chalmers Cr., Mascot.	34462	Premise Match	137m	North
TEXTURE COATERS &/OR TREATERS.	Ingster, J. & I. Pty. Ltd., 4 Chalmers Cr., Mascot.	70487	Premise Match	137m	North
HARDWARE MFRS.	Ingster, J. L J. Pty. Ltd., 4 Chalmers Cr., Mascot.	35022	Premise Match	137m	North
TIMBER MERCHANTS.	South Sydney Building Service, 217 O'Riordan St., Mascot.	70987	Premise Match	146m	South East
BUILDERS SUPPLIERS.	South Sydney Building Service, 217 O'Riordan St., Mascot.	8335	Premise Match	146m	South East
BUILDERS &/OR BUILDING CONTRACTORS.	South Sydney Building Service. 217 O'Riordan St., Mascot.	7902	Premise Match	146m	South East
BLIND MFRS. &/OR DISTS, - CANVAS - HOLLAND - VENETIAN.	Goodearl & Bailey Pty. Ltd., 219 O'Riordan St., Mascot.	5984	Premise Match	150m	South East
CANVAS GOODS MFRS. &/OR W/SALERS.	Goodearl & Bailey Pty. Ltd., 219 O'Riordan St., Mascot.	11152	Premise Match	150m	South East
HORSE &/OR CATTLE RUG MFRS.	Goodearl & Bailey Pty. Ltd., 219 O'Riordan St., Mascot.	35728	Premise Match	150m	South East

Business Directory Content Derived from Universal Business Directories (UBD) - Licensed from Hardie Grant

1978 Business Directory Records Road or Area Matches

Records from the 1978 UBD Business Directory, mapped to a road or an area, within the dataset buffer. Records are mapped to the road when a building number is not supplied, cannot be found, or the road has been renumbered since the directory was published:

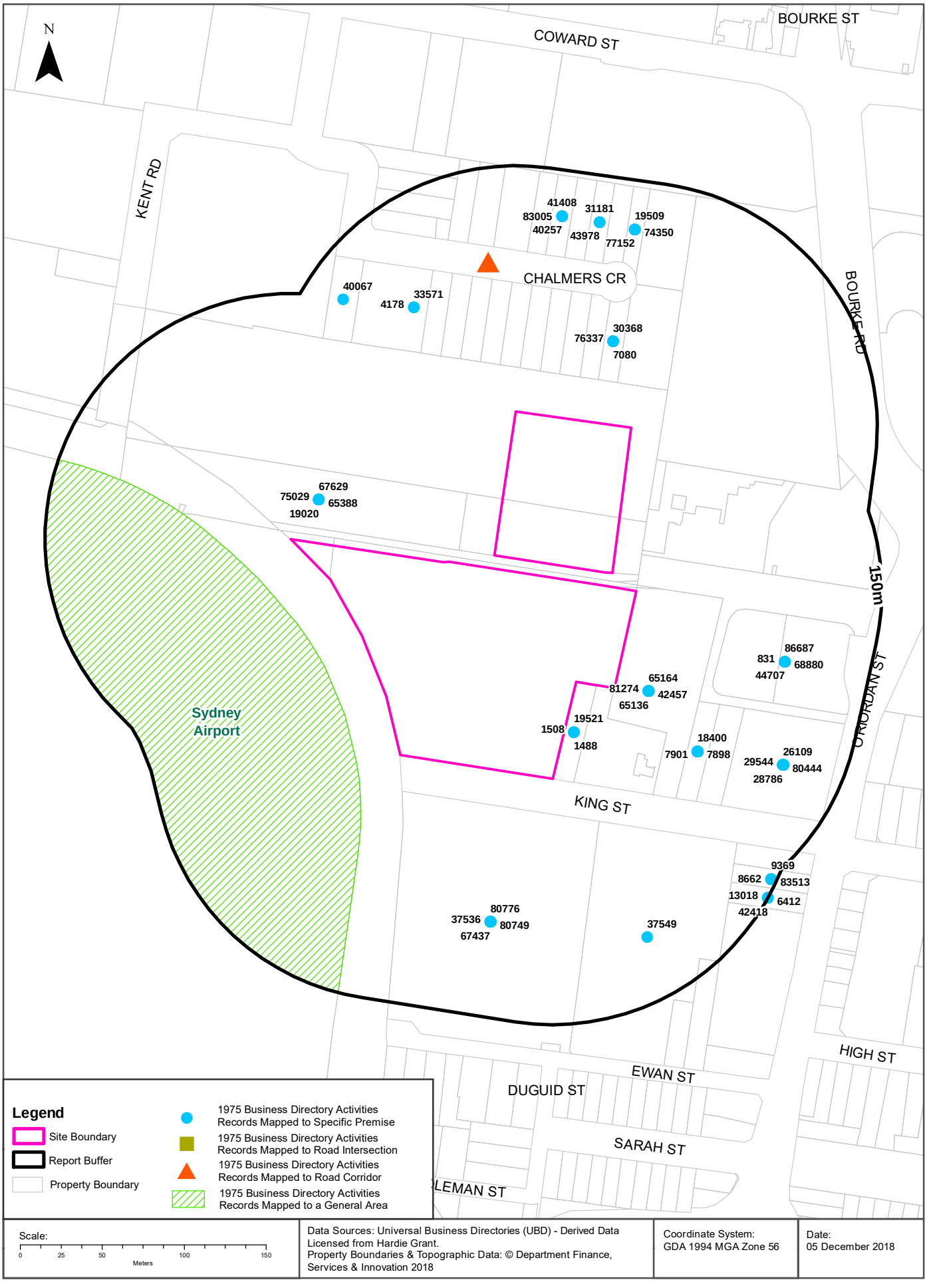
Business Activity	Premise	Ref No.	Location Confidence	Distance to Road Corridor or Area
ARTISTS-COMMERCIAL & INDUSTRIAL.	A.S. Promotion, King St., Mascot.	3251	Road Match	0m
DENTISTS.	McKaig.J., 203 King St., Mascot.	18321	Road Match	0m
MOTOR PAINTERS.	Sweetings Service Station, King St- Mascot.	51712	Road Match	0m
ENGINEERS GENERAL &/OR MANUFACTURING &/OR MECHANICAL	Sweetings Service Station, King St., Mascot.	25448	Road Match	0m
MOTOR BODY REPAIRS &/OR CONVERTERS.	Sweetings Service Station, King St., Mascot.	47873	Road Match	0m
MOTOR GARAGES &/OR ENGINEERS &/OR SERVICE STATIONS.	Sweetings Service Station, King St., Mascot.	50915	Road Match	0m
MOTOR PANEL BEATERS	Sweetings Service Station, King St., Mascot.	52406	Road Match	0m
MOTOR ACCESSORIES DEALERS.	Sweetings Service Station, King St.. Mascot.	47516	Road Match	0m
AIRCRAFT MFRS.&/ORDISTS.	Air Sales (Asia), Hanger 2, Mascot Airport, Mascot.	2193	Area Match	27m
GOVERNMENT DEPARTMENTS - COMMONWEALTH.	Civil Aviation Dept., Kingsford Smith Aerodrome, Mascot.	33406	Area Match	27m
AIR CHARTER SERVICES.	Far Eastern Air Transport, Hanger 2, Mascot Airport, Mascot.	1761	Area Match	27m

Business Activity	Premise	Ref No.	Location Confidence	Distance to Road Corridor or Area
FURNITURE-LOUNGE SUITES MFRS. &/OR W/SALERS.	Arpa Pty. Ltd., Chalmers Cres., Mascot.	31934	Road Match	75m
CARRIERS &/OR CARTAGE CONTRACTORS - MASTER.	Ferns R.S..Pty. Ltd., Bourke Rd., Mascot.	11995	Road Match	124m
MOTORCAR &/ORTRUCK DEALERS-NEW &/OR USED.	Bosna Motors, 220 O'Riordan St., Mascot.	48180	Road Match	133m

Business Directory Content Derived from Universal Business Directories (UBD) - Licensed from Hardie Grant

1975 Historical Business Directory Records

297 King Street, Mascot, NSW 2020



Historical Business Directories

297 King Street, Mascot, NSW 2020

1975 Business Directory Records
Premise or Road Intersection Matches

Records from the 1975 UBD Business Directory, mapped to a premise or road intersection, within the dataset buffer:

Business Activity	Premise	Ref No.	Location Confidence	Distance to Feature Point	Direction
AIR CARGO AGENTS.	Maynair International. 295 King St., Mascot.	1488	Premise Match	6m	South East
CUSTOMS AGENTS.	Maynalr International, 295 King St., Mascot.	19521	Premise Match	6m	South East
AIR CARGO AGENTS.	Stephens, F, H. Services, (Air Freight), 295 King St., Mascot.	1508	Premise Match	6m	South East
HOSPITAL SUPPLIES & EQUIPMENT MFRS. &/OR DISTS.	Accommodation Accessories Pty. Ltd., 209 King St., Mascot	42457	Premise Match	21m	South East
FOOD PROCESSORS &/OR PACKERS.	Industrial Sugar Mills Pty. Ltd 289 King St, Mascot	33589	Premise Match	21m	South East
HOSPITAL SUPPLIES & EQUIPMENT MFRS. &/OR DISTS.	Industrial Sugar Mills Pty. Ltd, 289 King St, Mascot	42490	Premise Match	21m	South East
HOTEL &/OR MOTEL EQUIPMENT SUPPLIES.	Industrial Sugar Mills Pty. Ltd, 289 King St, Mascot	42649	Premise Match	21m	South East
PACKAGING &/OR PACKING SPECIALISTS	Industrial Sugar Mills Pty. Ltd, 289 King St. Mascot.	65136	Premise Match	21m	South East
SUGAR REFINERS.	Industrial Sugar Mills Pty. Ltd., 289 King St, Mascot.	81276	Premise Match	21m	South East
SUGAR REFINERS.	Industrial Sugar Mills Pty. Ltd.,289 King St., Mascot.	81274	Premise Match	21m	South East
PACKAGING &/OR PACKING SPECIALISTS	Packaging & Manufacturing Services Pty. Ltd., 289 King St., Mascot	65164	Premise Match	21m	South East
RUST PROOFING MATERIALS.	Brolite (N.S.W) Pty. Ltd, 65 Kent Rd, Mascot	75029	Premise Match	27m	North West
PAINT-LACQUER MFRS.	Brolite (N.S.W) Pty. Ltd, 65 Kent Rd., Mascot	65388	Premise Match	27m	North West
CORROSION PREVENTION &/OR CONTROL SPECIALISTS	Samper-Seal Chemical Company, 65 Kent Rd, Mascot.	19020	Premise Match	27m	North West
PLASTIC COATING SPECIALISTS MATERIAL	Samper-Seal Chemical Company, 85 Kent Rd, Mascot	67629	Premise Match	27m	North West
ENGINEERS-REPETITION.	Wise Eric E. Sales Pty. Ltd, 17 Chalmers Cr., Mascot	30368	Premise Match	51m	North East
BOLT &/OR NUT MFRS. &/OR DISTS.	Wise Eric E. Sales Pty. Ltd., 17 Chalmers Cr., Mascot.	7080	Premise Match	51m	North East
SCREW MFRS. &/OR W/SALERS	Wise Eric E. Sales Pty. Ltd., 17 Chalmers Cr., Mascot.	76337	Premise Match	51m	North East
CONCRETE CORING & SAWING CONTRACTORS.	Ardec (A Division Of Dickson Primer Industries) 287 King St., Mascot.	18400	Premise Match	64m	South East
SITE INVESTIGATIONS.	Ardec (A Division of Dickson Primer Industries) 287 King St., Mascot,	77727	Premise Match	64m	South East
BORING CONTRACTORS.	Ardec 287 King St., Mascot,	7898	Premise Match	64m	South East
BORING CONTRACTORS.	Ardec, 287 King St, Mascot	7901	Premise Match	64m	South East
IRRIGATION SYSTEMS &/OR EQUIPMENT MFRS. &/OR DISTS.	Ardec, 287 King St, Mascot	45496	Premise Match	64m	South East
WELL., DRILLING CONTRACTORS.	Ardec, 287 King St, Mascot.	87247	Premise Match	64m	South East
WELL., DRILLING EQUIPMENT MFRS.	Ardec, 287 King St, Mascot.	87249	Premise Match	64m	South East

Business Activity	Premise	Ref No.	Location Confidence	Distance to Feature Point	Direction
WELL., DRILLING CONTRACTORS.	ARDEC, 287 King St., Mascot.	87246	Premise Match	64m	South East
BAKERS & PASTRYCOOKS SUPPLIES.	Brookes Foods Pty. Ltd., 5 Chalmers Cr., Mascot.	4178	Premise Match	89m	North
FOOD PROCESSORS &/OR PACKERS.	Brookes Foods Pty. Ltd., 5 Chalmers Cr., Mascot.	33571	Premise Match	89m	North
STEEL MERCHANTS., GENERAL.	Murray., More J (NSW) Pty Ltd .364 King St., Mascot.	80749	Premise Match	92m	South
STEEL REINFORCEMENT DISTS.	Murray., More, J. (N.S.W.) Pty. Ltd, 364 King St, Mascot.	80813	Premise Match	92m	South
STEEL MERCHANTS	Murray., More, J. (N.S.W.) Pty. Ltd., 364 King St, Mascot	80776	Premise Match	92m	South
STEEL MERCHANTS., BLACK SHEETS &/OR STRIP.	Murray., More, J. (N.S.W.) Pty. Ltd., 364 King St, Mascot	80737	Premise Match	92m	South
PIPE &/OR PIPE FITTINGS MFRS. &/OR DISTS.	Murray-More, J. (N.S.W.) Pty. Ltd, 364 King St. Mascot	67437	Premise Match	92m	South
ROOFING MATERIAL MFRS: &/OR DISTS.	Murray-More, J. (N.S.W.) Pty. Ltd, 364 King St. Mascot	74661	Premise Match	92m	South
GALVANISED IRON MERCHANTS.	Murray-More, J. (N.S.W.) Pty. Ltd., 364 King St, Mascot	37536	Premise Match	92m	South
WAX MFRS. &/OR IMPORTERS.	Bostik Australia Pty, Ltd., 191 O'Riordan St. Mascot.	86687	Premise Match	98m	East
POLISH MFRS. &/OR DISTS.	Bostik Australia Pty. Ltd., 191 O'Riordan St., Mascot	68880	Premise Match	98m	East
INSULATING MATERIALS MFRS. &/OR DISTS. &/OR SUPPLIERS.	Bostik Australia Pty. Ltd., 191 O'Riordan St., Mascot	44707	Premise Match	98m	East
ADHESIVES MFRS. &/OR DISTS.	Bostik Australia Pty. Ltd., 191 O'Riordan St., Mascot.	831	Premise Match	98m	East
GALVANISING &/OR TINNING.	Mascot Galvanising Works Pty. Ltd., 342 King St., Mascot.	37549	Premise Match	112m	South East
CHAIN DRIVE SPECIALISTS.	A. E. P. Engineering Sales Pty. Ltd. 205-213 O'Riordan St., Mascot	14257	Premise Match	113m	South East
CHAIN-HEAVY-MFRS. &/OR IMPS. &/OR DISTS.	A. E. P. Engineering Sales Pty. Ltd. 205-213 O'Riordan St., Mascot	14274	Premise Match	113m	South East
CHAIN-HEAVY-MFRS. &/OR IMPS. &/OR DISTS.	A.E.P. Engineering Sales Pty. Ltd, 209 O'Riordan St, Mascot	14275	Premise Match	113m	South East
CHAIN DRIVE SPECIALISTS.	A.E.P. Engineering Sales Pty. Ltd, 209 O'Riordan St, Mascot	14259	Premise Match	113m	South East
AIR EQUIPMENT MFRS. &/OR DISTS.	A.E.P. Engineering Sales Pty. Ltd. 205-213 O'Riordan St.,	1808	Premise Match	113m	South East
PNEUMATIC TOOLS MFRS. &/OR DISTS,.	A.E.P. Engineering Sales Pty. Ltd., 209 O'Riordan St, Mascot	68850	Premise Match	113m	South East
PNEUMATIC TOOLS MFRS. &/OR DISTS,.	A.E.P. Engineering Sales. Pty. Ltd. 205-213 O'Riordan St. Mascot	68846	Premise Match	113m	South East
SHEET METAL WORKERS.	A.E.P. Sheet Metal Pty. Ltd, 205 O'Riordan St, Mascot	76746	Premise Match	113m	South East
ENGINEERS-HOT WATER “HEATING &/OR VENTILATING.	A.E.P. Sheet Metal Pty. Ltd, 205 O'Riordan St, Mascot	29544	Premise Match	113m	South East
ELECTRICAL SWITCHBOARD MFRS. &/OR DISTS	A.E.P. Sheet Metal Pty. Ltd. 205 O'Riordan St, Mascot	26652	Premise Match	113m	South East
SHEET METAL WORKERS.	A.E.P. Sheet Metal Pty. Ltd. 205 O'Riordan St., Mascot,	76730	Premise Match	113m	South East
STEEL FABRICATORS.	A.E.P. Sheet Metal Pty. Ltd., 205 O'Riordan St, Mascot	80444	Premise Match	113m	South East
WELDERS., Electric &/OR OXY.	A.E.P. Sheet Metal Pty. Ltd., 205 O'Riordan St, Mascot	86755	Premise Match	113m	South East
ELECTRICAL METER BOX &/OR SURROUNDS MFRS.	A.E.P. Sheet Metal Pty. Ltd., 205 O'Riordan St, Mascot	26109	Premise Match	113m	South East
ENGNEERS-FABRICATING	A.E.P. Sheet Metal Pty. Ltd., 205 O'Riordan St, Mascot	28366	Premise Match	113m	South East
ENGINEERS - GENERAL &/OR MANUFACTURING &/OR MECHANICAL	Austral Engineering Products Pty. Ltd. 205-213 O'Riordan St., Mascot	28707	Premise Match	113m	South East
CHAIN SPROCKET MFRS.	Austral Engineering Products Pty. Ltd. 205-213 O'Riordan St., Mascot,	14303	Premise Match	113m	South East
GEAR CUTTERS &/OR MFRS.	Austral Engineering Products Pty. Ltd., 205-213 O'Riordan St., Mascot	37841	Premise Match	113m	South East

Business Activity	Premise	Ref No.	Location Confidence	Distance to Feature Point	Direction
GEAR CUTTERS &/OR MFRS.	Austral Engineering Products Pty. Ltd., 209 O'Riordan St, Mascot	37849	Premise Match	113m	South East
ENGINEERS - GENERAL &/OR MANUFACTURING &/OR MECHANICAL	Austral Engineering Products Pty. Ltd., 209 O'Riordan St, Mascot	28786	Premise Match	113m	South East
ROAD TRANSPORT SERVICES., INTERSTATE	Jackson & Spring (Sydney) Pty. Ltd., 18 Chalmers Cr., Mascot	74350	Premise Match	120m	North
SHIPPING &/OR FORWARDING AGENTS.	Jackson & Spring (Sydney) Pty. Ltd., 18 Chalmers Cr., Mascot.	77152	Premise Match	120m	North
CUSTOMS AGENTS.	Jackson & Spring (Sydney) Pty. Ltd., 18 Chalmers Cr., Mascot.	19509	Premise Match	120m	North
AIR CARGO AGENTS.	Jackson & Spring (Sydney) Pty. Ltd., 18 Chalmers Cr., Mascot.	1478	Premise Match	120m	North
CARRIERS &/OR CARTAGE CONTRACTORS - MASTER.	Jackson &Spring (Sydney) Pty. Ltd., 18 Chalmers Cr., Mascot.	13857	Premise Match	120m	North
TEXTURE COATERS &/OR TREATERS.	Ingster Holdings Pty. Ltd., 12 Chalmers Cr., Mascot.	83005	Premise Match	122m	North
HABERDASHERY-W/SALE	Ingster Holdings Pty. Ltd., 12 Chalmers Cr„ Mascot.	40257	Premise Match	122m	North
HARDWARE MFRS.	Ingster Holdings Pty. Ltd., 12 Chalmers Cr., Mascot.	41408	Premise Match	122m	North
IMPORTERS.	Trans Asia Trading Co. Pty, Ltd., 16 Chalmers Cr., Mascot.	43978	Premise Match	122m	North
EXPORTERS.	Trans Asia Trading Co. Pty. Ltd., 16 Chalmers Cr., Mascot.	31181	Premise Match	122m	North
GROCERS-WHOLESALE	Worsley Foods Pty. Ltd., 1 Chalmers Cr„ Mascot.	40067	Premise Match	126m	North West
BUILDERS SUPPLIERS.	South Hurstville South Sydney Building Service, 217 O'Riordan St,. Mascot.	9369	Premise Match	146m	South East
BUILDERS &/OR BUILDING CONTRACTORS.	South Sydney Building Service, 217 O'Riordan St., Mascot.	8662	Premise Match	146m	South East
TIMBER MERCHANTS.	South Sydney Building Service, 217 O'Riordan St., Mascot.	83513	Premise Match	146m	South East
BUILDINGS-PRE-FABRICATED MFRS &/OR DISTS	U-Do-It Prefabrications, 217 O'Riordan St., Mascot.	9616	Premise Match	146m	South East
BLIND MFRS. &/OR DISTS. - CANVAS - HOLLAND-VENETIAN.	Goodearl & Bailey Pty. Ltd., 219 O'Riordan St , Mascot.	6412	Premise Match	150m	South East
HORSE &/OR CATTLE RUG MFRS.	Goodearl & Bailey Pty. Ltd. 219 O'Riordan St. Mascot	42418	Premise Match	150m	South East
CANVAS GOODS MFRS. &/OR W/SALERS.	Goodearl & Bailey Pty. Ltd., 219 O'Riordan St., Mascot.	13018	Premise Match	150m	South East

Business Directory Content Derived from Universal Business Directories (UBD) - Licensed from Hardie Grant

1975 Business Directory Records Road or Area Matches

Records from the 1975 UBD Business Directory, mapped to a road or an area, within the dataset buffer. Records are mapped to the road when a building number is not supplied, cannot be found, or the road has been renumbered since the directory was published:

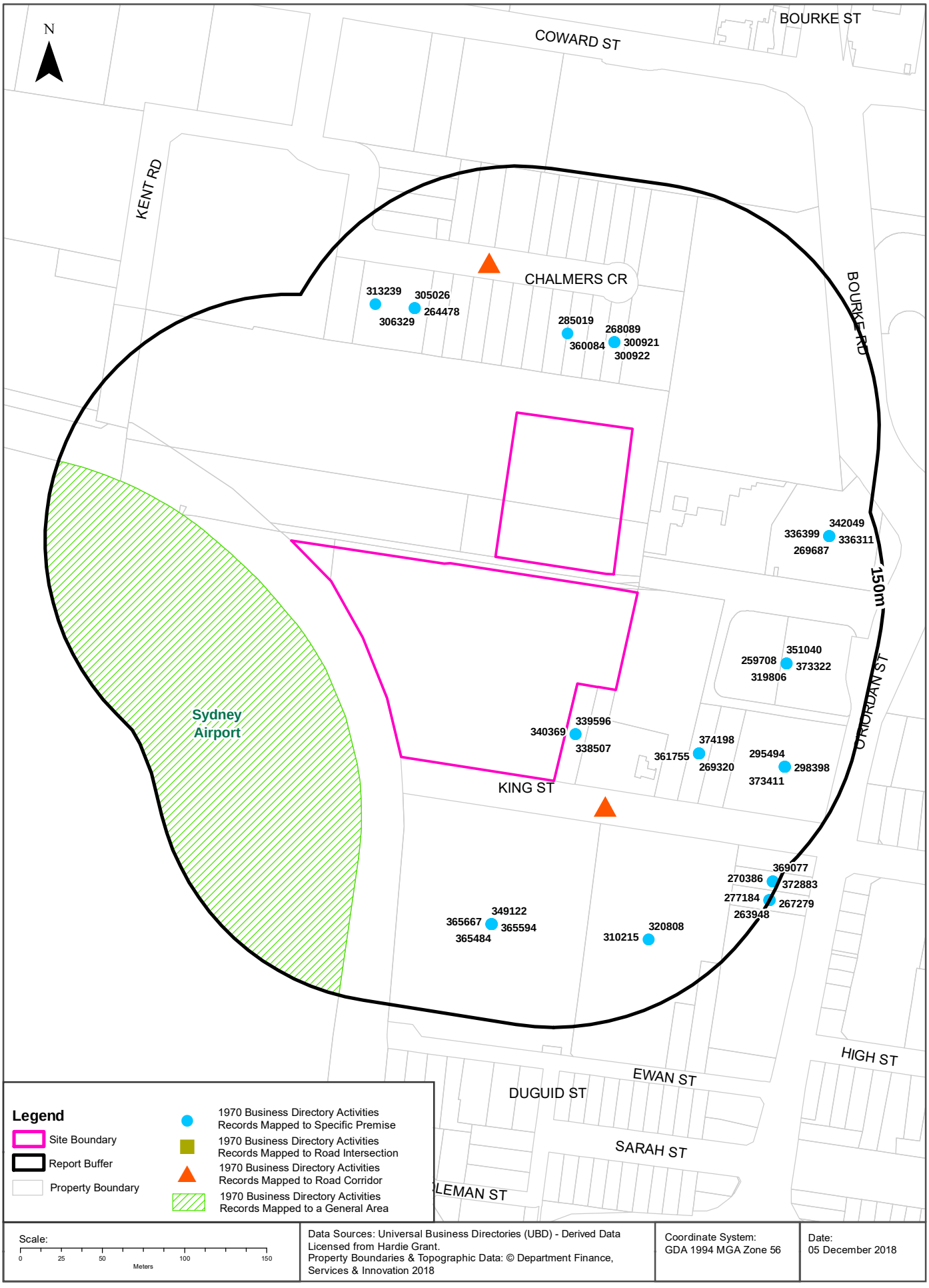
Business Activity	Premise	Ref No.	Location Confidence	Distance to Road Corridor or Area
AIRCRAFT MFRS. &/OR DISTS.	Air Sales (Asia), Hanger 2, Mascot Airport, Mascot.	1998	Area Match	27m
GOVERNMENT DEPARTMENTS - AUSTRALIAN.	Civil Aviation Dept., Kingsford Smith Aerodrome, Mascot.	38840	Area Match	27m
AIR CARGO AGENTS.	Emery Air Freight Corporation, Airport, Mascot.	1473	Area Match	27m
SHIPPING &/OR FORWARDING AGENTS.	Emery Air Freight Corporation, Airport, Mascot.	77133	Area Match	27m
AIR CHARTER SERVICES.	Far Eastern Air Transport, Hanger 2, Mascot Airport, Mascot.	1527	Area Match	27m
AIR SERVICE OPERATORS.	Nav Inc. Airlines Services, International Airport, Mascot.	1905	Area Match	27m

Business Activity	Premise	Ref No.	Location Confidence	Distance to Road Corridor or Area
AIR CARGO AGENTS.	Rudders Ltd.,Airport Cargo Terminal, Mascot.	1497	Area Match	27m
AIR CARGO AGENTS.	McGrath, Alexander Agency Pty. Ltd., Chalmers Cr., Mascot.	1489	Road Match	75m
CARRIERS &/OR CARTAGE CONTRACTORS - MASTER.	McGrath, Alexander Agency Pty. Ltd., Chalmers Cr., Mascot.	13872	Road Match	75m
SAW &/OR TOOL SHARPENERS.	National Saw Works Pty, Ltd., Chalmers Cr., Mascot.	75729	Road Match	75m
KNIFE MFRS.-TRADESMENS.	National Saw Works Pty. Ltd., Chalmers Cr., Mascot.	46480	Road Match	75m
MACHINE KNIFE MFRS.	National Saw Works Pty. Ltd., Chalmers Cr., Mascot.	47982	Road Match	75m
PRINTERS SUPPLIES.	National Saw Works Pty. Ltd., Chalmers Cr., Mascot.	70311	Road Match	75m
SAW MFRS. &/OR IMPS. &/OR DISTS.	National Saw Works Pty. Ltd., Chalmers Cr., Mascot.	75698	Road Match	75m
GRINDERS PRECISION.	Natlonal Saw Works Pty. Ltd, Chalmers Cr, Mascot.	39064	Road Match	75m
CARRIERS &/OR CARTAGE CONTRACTORS - MASTER.	Pine, N. & Co., Chalmers Cr., Mascot	13885	Road Match	75m
CARRIERS &/OR CARTAGE CONTRACTORS - MASTER.	Pine, N., Chalmers Cr., Mascot.	13886	Road Match	75m

Business Directory Content Derived from Universal Business Directories (UBD) - Licensed from Hardie Grant

1970 Historical Business Directory Records

297 King Street, Mascot, NSW 2020



Historical Business Directories

297 King Street, Mascot, NSW 2020

1970 Business Directory Records
Premise or Road Intersection Matches

Records from the 1970 UBD Business Directory, mapped to a premise or road intersection, within the dataset buffer:

Business Activity	Premise	Ref No.	Location Confidence	Distance to Feature Point	Direction
MOTOR GARAGES & ENGINEERS(M6S6)	Rex-Press, 295 King St. MASCOT, 2020	338507	Premise Match	6m	South East
MOTOR PAINTERS (M672)	Rex-press, 295 King St., Mascot	339596	Premise Match	6m	South East
MOTOR PANEL BEATERS (M680)	Rex-Press, 295 King St., Mascot	340369	Premise Match	6m	South East
ENGINEERS-REPETITION (E735)	Wise, E.E.Sales Pty. Ltd., 19 Chalmers Cres., Mascot, 2020	300921	Premise Match	51m	North East
BOLT & NUT MFRS. &/OR DISTS. (B520)	Wise, Eric E. Sales Pty. Ltd., 17 Chalmers Cr., Mascot	268089	Premise Match	51m	North East
SCREW MFRS. &/OR DISTS. (S173)	Wise,Eric E. Sales Pty. Ltd., 17 Chalmers Cr., Mascot	360084	Premise Match	51m	North East
ENGINEERS-REPETITION (E735)	Wise,Eric E.Sales Pty. Ltd., 17 Chalmers Cres., Mascot	300922	Premise Match	51m	North East
CONCRETE CONTRACTORS' EQUIPMENT & MACHINERY MFRS.	Bennett Engineering Pty. Ltd., 9 Chalmers Cres., Mascot, 2020	285019	Premise Match	52m	North
PUMP MANUFACTURERS &/OR DISTRIBUTORS (P906)	Allan Royle Drilling Engineering Co., 287 King St., Mascot	353729	Premise Match	64m	South East
WELL-DRILLING CONTRACTORS(W163)	Allan Royle Drilling Engineering Co., 287 King St., Mascot	374191	Premise Match	64m	South East
PUMP EQUIPMENT MANUFACTURERS &/OR DISTRIBUTORS (P902)	Allan Royle Drilling Engineering Co., 287 King St., Mascot.	353675	Premise Match	64m	South East
BORING CONTRACTORS (B590)	Allan Royle Drilling Engineering Co., 287 King St., Mascot.	269320	Premise Match	64m	South East
IRRIGATION SYSTEMS & EQUIPMENT MFRS. &/OR DISTS. (I720)	Allan Royle Drilling Engineering Co., 287 King St., Mascot.	320789	Premise Match	64m	South East
CONCRETE CORING & SAWING CONTRACTORS	ALLAN ROYLE DRILLING ENGINEERING COMPANY, (A Division of Dickson Primer Industries), 287 KING ST., MASCOT, 2020	285119	Premise Match	64m	South East
SITE INVESTIGATIONS	ALLAN ROYLE DRILLING ENGINEERINGCOMPANY (A Division of Dickson Primer Industries), 287 KING St., MASCOT, 2020	361755	Premise Match	64m	South East
WELL-DRILLING EQUIP.MFRS. (W165)	Allan Royle Engineering Co., 287 King St., Mascot.	374198	Premise Match	64m	South East
FOOD PRODUCTS MFRS. &/OR DISTS.(F432)	Brookes Foods Pty. Ltd., 5 Chalmers Cres., Mascot	305026	Premise Match	89m	North
FRUIT JUICE EXTRACT MFRS./MERCHANTS IF630l	Brookes Foods Pty. Ltd., 5 Chalmers Cres., Mascot	306329	Premise Match	89m	North
FOOD PROCESSORS/PACKERS (F430)	Brookes Foods Pty. Ltd., 5 Chalmers Cres., Mascot.	304944	Premise Match	89m	North
BAKERS' & PASTRYCOOKS' SUPPLIES (B075)	Brookes Foods- Pty. Ltd., 5 Chalmers Cres., Mascot.	264478	Premise Match	89m	North
STEEL MERCHANTS-BLACK SHEETS/STRIP (S688)	Murray-More, J. (N.S.W.) Pty. Ltd, 350 King St, Mascot	365534	Premise Match	92m	South
MOTOR PANEL BEATERS' SUPPLIES(M684)	Murray-More, J. (N.S.W.) Pty. Ltd., 350 King St., Mascot, 2020	340564	Premise Match	92m	South
STEEL MERCHANTS &/OR MFRS.-BRIGHT BARS & SECTIONS (S691)	Murray-More,J. (N.S.W.) Pty. Ltd., 350 King St., Mascot	365484	Premise Match	92m	South
IRON MERCHANTS (I680)	Murray-More,J. (N.S.W.) Pty. Ltd., 350 King St., Mascot	320771	Premise Match	92m	South

Business Activity	Premise	Ref No.	Location Confidence	Distance to Feature Point	Direction
ROOFING MATERIAL MFRS. &/OR DISTRIBUTORS (R415)	Murray-More,J. (N.S.W.) Pty. Ltd., 350-364 King St., Mascot	357875	Premise Match	92m	South
PIPES/PIPE FITTINGS MFRS. &/OR DISTRIBUTORS (P508)	Murray-More,J. (N.S.W.) Pty. Ltd., 350-364 King St., Mascot	349122	Premise Match	92m	South
STEEL IMPORTERS (S679)	Murray-More,J. (N.S.W.) Pty. Ltd., 350-364 King St., Mascot	365457	Premise Match	92m	South
STEEL MERCHANTS-STRUCTURAL (S696)	Murray-More,J.(N.S.W.) Pty. Ltd., 350 King St., Mascot	365626	Premise Match	92m	South
STEEL MERCHANTS-GENERAL (S694)	Murray-More,J.(N.S.W.) Pty. Ltd., 350 King St., Mascot.	365594	Premise Match	92m	South
WELDING EQUIPMENT & SUPPLIES MFRS.&/OR DISTS (W155)	Murray-More,J.(N.S.W.) Pty. Ltd., 350-364 King St,-Mascot	374139	Premise Match	92m	South
STEEL REINFORCEMENT DIST. (S709)	Murray-More,J.(N.S.W.) Pty. Ltd., 350-364 King St., Mascot	365667	Premise Match	92m	South
GALVANISED IRON MERCH. (G010)	Murray-More,J.(N.S.W.) Pty. Ltd., 350-364 King St., Mascot	310197	Premise Match	92m	South
ELECTRODES (WELDERS')-MANUFACTURERS (E340)	Murray-More,J.(N.S.W.) Pty. Ltd., 350-364 King St., Mascot	296297	Premise Match	92m	South
ADHESIVE MFRS &/OR DISTS (A120)	Bostik Aust Pty. Ltd., 191-203 O'Riordan St, Mascot	259708	Premise Match	98m	East
POLISH MFRS./DISTRIBUTORS (P638)	Bostik Aust. Pty. Ltd.,191-203 O'Riordan St.,Mascot	351040	Premise Match	98m	East
WAX MANUFACTURERS &/OR IMPORTERS (W115)	Bostik Aust.Pty. Ltd.,191-203 O'Riordan St.,Mascot	373322	Premise Match	98m	East
INSULATING MATERIAL MFRS. (I470)	Bostik Australia Pty. Ltd.,191-203 O'Riordan St.,Mascot	319806	Premise Match	98m	East
GROCERS-WHOLESALE (G660)	Worsley,E. J. Pty. Ltd., 3 Chalmers Cres., Mascot	313239	Premise Match	109m	North
GALVANISING & TINNING (G030)	Mascot Galvanising Works Pty. Ltd., 342 King St., Mascot	310215	Premise Match	112m	South East
IRRIGATION SYSTEMS & EQUIPMENT MFRS. &/OR DISTS. (I720)	McCarey Irrigation Pty. Ltd, 11 Ewan St, Mascot	320808	Premise Match	112m	South East
ENGINEERS-HOT WATER,VENTILATING (E640)	A. E. P. Sheet Metal Pty. Ltd., 205 O'Riordan St., Mascot, 2020	299841	Premise Match	113m	South East
SHEET METAL WORKERS (S230)	A. E. P. Sheet Metal Pty. Ltd., 205 O'Riordan St., Mascot, 2020	360516	Premise Match	113m	South East
AIR CONDITIONING UNITS &MACHINERY MFRS(A250)	A.E.P. Air Conditioning Pty. Ltd., 205 O'Riordan St., Mascot	260779	Premise Match	113m	South East
ENGINEERS-FABRICATING (E580)	A.E.P. Sheet Metal Pty. Ltd., 205 O'Riordan St., Mascot, 2020	298398	Premise Match	113m	South East
STEEL FABRICATORS (S673)	A.E.P. Sheet Metal Pty. Ltd., 205 O'Riordan St., Mascot, 2020	365148	Premise Match	113m	South East
ENGINEERS-AIR CONDITIONING (E490)	A.E.P.Air Conditioning Pty. Ltd., 205 O'Riordan St., Mascot	297316	Premise Match	113m	South East
ELECTRICAL METER BOX & SURROUNDS-MFRS.(E318)	A.E.P.Sheet Metal Pty. Ltd., 205 O'Riordan St., Mascot, 2020	295494	Premise Match	113m	South East
WELDERS-ELECTRIC &/OR OXY (W145)	A.E.P.Sheet Metal Pty. Ltd., 205 O'Riordan St., Mascot, 2020	373411	Premise Match	113m	South East
VENTILATING EQUIPMENT MFRS.&/OR DISTRIBUTORS (V120)	A.E.P.Sheet Metal Pty. Ltd., 205 O'Riordan St., Mascot, 2020	372516	Premise Match	113m	South East
ELECTRICAL SWITCHBOARD MANUFACTURERS (E335)	A.E.P.Sheet Metal Pty. Ltd., 205 O'Riordan St., Mascot, 2020.	296188	Premise Match	113m	South East
EARTH MOVING EQUIP.MFRS.,IMPORTERS &/OR DISTS.(E020)	American Heavy Equipment Co. Pty. Ltd., 185 O'Riordan St., Mascot	292922	Premise Match	122m	East
MOTOR CAR/TRUCK DEALERS-NEW/USED (M520)	Thiess (Sales) Pty. Ltd., 185 O'Riordan St., Alexandria, 2015	336311	Premise Match	122m	East
MOTOR CAR/TRUCK IMPORTERS/DISTRIBUTORS (M524)	Thiess (Sales) Pty. Ltd., 185 O'Riordan St., Alexandria, 2015	336399	Premise Match	122m	East
MOTOR SPARE PARTS DEALERS-RETAIL (M728)	Thiess (Sales) Pty. Ltd., 185 O'Riordan St., Alexandria, 2015	342049	Premise Match	122m	East
MOTOR SPARE PARTS MFRS. &/OR WHOLESALERS (M732)	Thiess (Sales) Pty. Ltd., 185 O'Riordan St., Alexandria, 2015	342225	Premise Match	122m	East
COAL MINING CONTRACTORS-OPEN CUT (C500)	Thiess Bros Pty. Ltd., 185-189 O'Riordan St., Mascot	284805	Premise Match	122m	East

Business Activity	Premise	Ref No.	Location Confidence	Distance to Feature Point	Direction
BRIDGE BUILDERS & CONTRACTORS (B728)	Thiess Bros Pty. Ltd., 185-189 O'Riordan St., Mascot	269687	Premise Match	122m	East
BUILDERS & CONTRACTORS (B800)	South Sydney Building Service, 217 O'Riordan St., Mascot, 2020	270386	Premise Match	146m	South East
BUILDERS' SUPPLIERS (B814)	South Sydney Building Service, 217 O'Riordan St., Mascot, 2020	271578	Premise Match	146m	South East
BUILDINGS-PREFABRICATED-MFRS.&/OR DISTS. (B836)	U-Do-It Prefabrications, 217 O'Riordan St., Mascot	272554	Premise Match	146m	South East
WALLBOARD MERCHANTS (W025)	U-Do-It Prefabrications, 217 O'Riordan St., Mascot	372883	Premise Match	146m	South East
TIMBER MERCHANTS (T385)	U-Do-It Prefabrications, 217 O'Rtordan St., Mascot	369077	Premise Match	146m	South East
TENTS/TARPAULINS (T205)	Goodearls Pty. Ltd., 219 O'Riordan St., Mascot	367815	Premise Match	150m	South East
CANVAS GOODS MFRS&/OR W'SALERS(C079)	Goodearls Pty. Ltd., 219 O'Riordan St., Mascot	277184	Premise Match	150m	South East
AWNINGS-ALUMINIUM-MFRS.&/OR DISTS. (A654)	Goodearls Pty. Ltd., 219 O'Riordan St., Mascot	263948	Premise Match	150m	South East
BLIND MFRS.-CANVAS & AWNING (B400)	Goodearls Pty. Ltd., 219 O'Riordan St., Mascot	267241	Premise Match	150m	South East
BLIND MFRS.-HOLLAND (B405)	Goodearls Pty. Ltd., 219 O'Riordan St., Mascot	267279	Premise Match	150m	South East
HORSE/COW RUG MFRS. (H520)	Goodearls Pty. Ltd., 219 O'Riordan St., Mascot	316690	Premise Match	150m	South East
FLY SCREENS, DOORS/WINDOW-MFRS.&/OR DISTS.(F385)	Goodearls Pty. Ltd., 219 O'Riordan St., Mascot	304698	Premise Match	150m	South East

Business Directory Content Derived from Universal Business Directories (UBD) - Licensed from Hardie Grant

1970 Business Directory Records Road or Area Matches

Records from the 1970 UBD Business Directory, mapped to a road or an area, within the dataset buffer. Records are mapped to the road when a building number is not supplied, cannot be found, or the road has been renumbered since the directory was published:

Business Activity	Premise	Ref No.	Location Confidence	Distance to Road Corridor or Area
BUSINESS AGENTS &/OR BROKERS(B852)	Elphick, J. S., 203 King St., Mascot.	272699	Road Match	0m
AIR SERVICES OPERATORS (A265)	Air Express International Corp Airport, Mascot	260980	Area Match	27m
AIR SERVICES OPERATORS (A265)	Australian Aircraft Sales Pty. Ltd., Hangar 2, Mascot Airport	260989	Area Match	27m
AIRCRAFT MFRS. &/OR DISTS.(A290)	Australian Aircraft Sales Pty. Ltd., Hangar 2, Mascot Airport	261126	Area Match	27m
GOVERNMENT DEPTS.-C'WEALTH (G490)	Civil Aviation Dept.,Kingsford Smith Aerodrome,Mascot	311559	Area Match	27m
SHIPPING & FORWARDING AGENTS(S264)	E. M. G. Air Services Ltd., Airport, Mascot, 2020	361005	Area Match	27m
AIR CARGO AGENTS (A237)	E.M.G. Air Services Ltd., Airport, Mascot, 2020	260684	Area Match	27m
HABERDASHERY-WHOLESALE (H020)	Bel-Bac Pty. Ltd.,Chalmers Cres.,Mascot	313518	Road Match	75m
HARDWARE MANUFACTURERS (H240)	Bel-Bac Pty. Ltd.,Chalmers Cres.,Mascot	315393	Road Match	75m
TEXTILE COATERS &/OR TREATERS(T238)	Bel-Bac Pty.Limited,Chalmers Cres.,Mascot	367975	Road Match	75m
MATERIAL HANDLING EQUIPMENT IMPORTS. &/OR DISTS. (M160)	Jacks, William & Co. (Aust.) Pty. Ltd., Chalmers Cres., Mascot, 2020	325746	Road Match	75m
FORK LIFT TRUCK IMPORTERS &/OR DISTRIBUTORS (F510)	Jack's, William & Co.(Aust.) Pty. Ltd., Chalmers Cr., Mascot, 2020	305921	Road Match	75m
MOTOR PAINTERS (M672)	May & Blake Pty. Ltd.,Chalmers Cres.,Mascot	339472	Road Match	75m

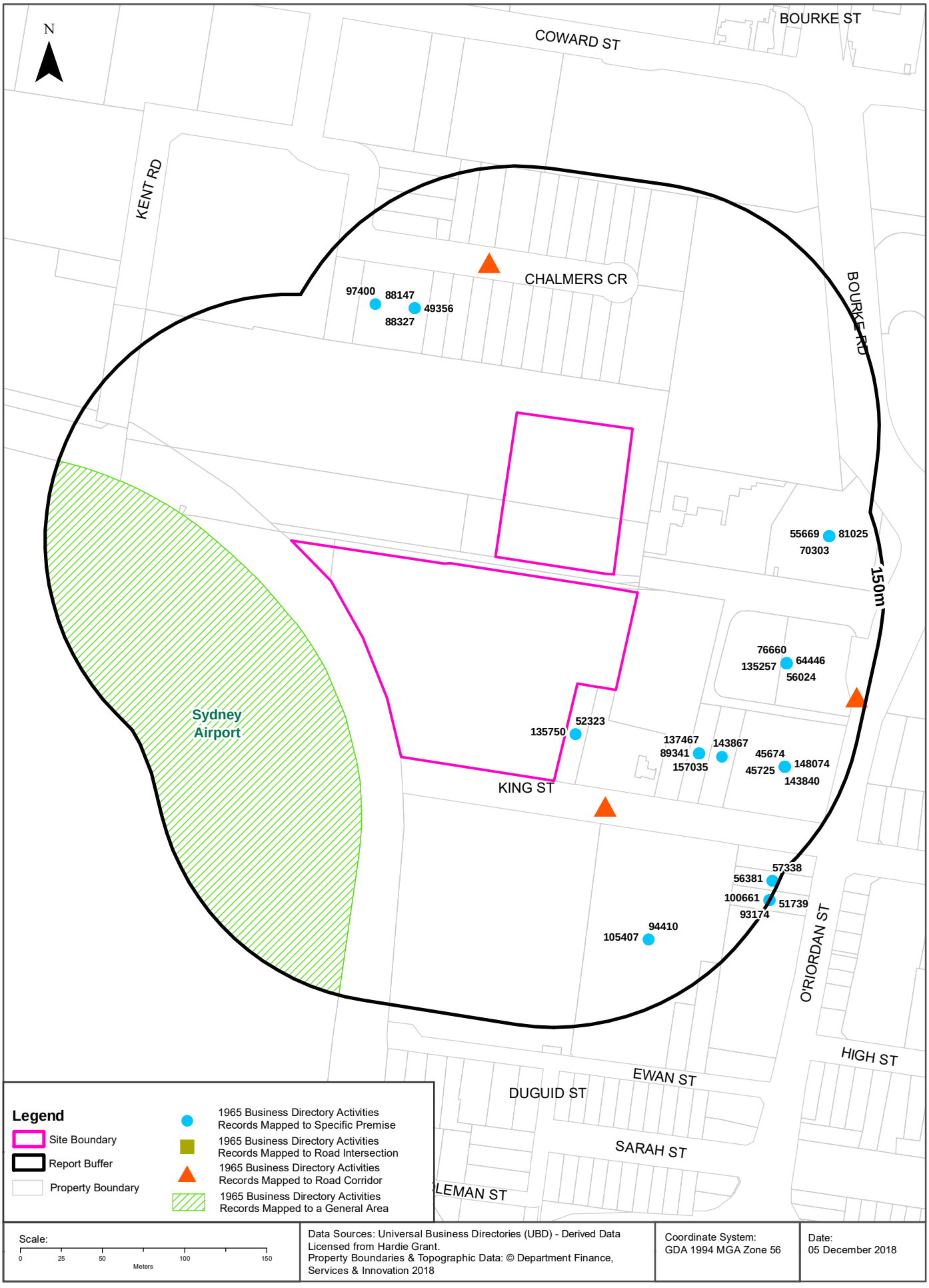
Business Activity	Premise	Ref No.	Location Confidence	Distance to Road Corridor or Area
MOTOR WHEEL REPAIRERS/SPECIALISTS (M756)	May & Blake Pty. Ltd.,Chalmers Cres.,Mascot	342763	Road Match	75m
MOTOR CHASSIS STRAIGHTENERS &/OR REPAIRERS/SPECIALISTS (M574)	May & Blake Pty. Ltd.,Chalmers Cres.,Mascot.	336483	Road Match	75m
MOTOR PANEL BEATERS (M680)	May & Blake Pty. Ltd.,Chalmers Cres.,Mascot.	340233	Road Match	75m
MOTOR GARAGES & ENGINEERS(M6S6)	May & Blake Pty. Ltd.,Chalmers Cres.MASCOT	338225	Road Match	75m
ENGINEERS-DIESEL (E565)	May & Blake Pty. Ltd.,Chalmers Cres.,Mascot	298042	Road Match	75m
MATERIAL HANDLING EQUIPMENT IMPORTS. &/OR DISTS. (M160)	Mechanical Handling (N.S.W.) Pty. Ltd.,Chalmers Cres.,Mascot	325760	Road Match	75m
HOIST MFRS. &/OR DISTS. (H460)	Mechanical Handling Ltd., Chalmbers Cr., Mascot, 2020	316370	Road Match	75m
BOILERMAKERS (B510)	Mechanical Handling Ltd., Chalmers Cr, Mascot, 2020	267949	Road Match	75m
CHAIN BLOCK IMPS. &/OR DISTS.(C228)	Mechanical Handling Ltd., Chalmers Cr., Mascot, 2020	279019	Road Match	75m
CONVEYORS & CONVEYING EQUIP.MANUFACTURERS (C639)	Mechanical Handling Ltd., Chalmers Cr., Mascot, 2020	285711	Road Match	75m
PUMP MANUFACTURERS &/OR DISTRIBUTORS (P906)	Mechanical Handling Ltd., Chalmers Cr., Mascot, 2020	353802	Road Match	75m
SPRAY BOOTHS-PAINTERS'-MFRS.(S452)	Mechanical Handling Ltd., Chalmers Cr., Mascot, 2020	363744	Road Match	75m
GAS BURNERS-INDUSTRIAL-MFRS./DISTS.(G086)	Mechanical Handling Ltd.,Chalmers Cres.,Mascot	310419	Road Match	75m
PRINTERS' SUPPLIES (P836)	NATIONAL SAW WORKS PTY. LTD, CHALMERS CRES., MASCOT, 2020	351815	Road Match	75m
MACHINE KNIFE MFRS. (M010)	National Saw Works Pty. Ltd., Chalmers Cres., Mascot, 2020.	323948	Road Match	75m
SAW/TOOL SHARPENERS (S095)	National Saw Works Pty. Ltd.,Chalmers Cr.,Mascot	359280	Road Match	75m
GRINDERS-PRECISION (G630)	National Saw Works Pty. Ltd.,Chalmers Cr.,Mascot.	312065	Road Match	75m
SAW MFRS. &/OR REPAIRERS (S104)	National Saw Works Pty. Ltd.,Chalmers Cr.,Mascot.	359249	Road Match	75m
KNIFE MFRS.-TRADESMEN'S (K080)	National Saw Works Pty. Ltd.,Chalmers Cr.,Mascot. Phone	322132	Road Match	75m
PRINTERS' SUPPLIES (P836)	National Saw Works Pty. Ltd.,Chalmers Cres.,Mascot	351816	Road Match	75m
CARRIERS & CARTAGE CONTRACTORS-MASTER (C147)	Pine, N. & Co., Chalmers Cres., Mascot	278538	Road Match	75m
CARRIERS & CARTAGE CONTRACTORS-MASTER (C147)	Pine, N., Chalmers Cr., Mascot	278539	Road Match	75m
FIRE FIGHTING EQUIPMENT MFRS.&/OR DISTS.(F195)	Riley Dodds Aust. Pty. Ltd.,Chalmers Cres.,Mascot	303132	Road Match	75m
GENERATOR MFRS. &/OR DISTS.(G175)	Riley Dodds Aust. Pty. Ltd.,Chalmers Cres.,Mascot	310632	Road Match	75m
BOILERMAKERS (B510)	Riley Dodds Aust Pty. Ltd., Chalmers Cres., Mascot	267970	Road Match	75m
STEAM PLANT EQUIPMENT MFRS. &/OR DISTS. (S542)	Riley Dodds Aust. Pty. Ltd.,Chalmers Cres.,Mascot	365038	Road Match	75m
MACHINERY MERCH./IMPORTERS(M045)	Seeds (Certified) Pty. Limited,Chalmers Cres.,Mascot	324226	Road Match	75m
AGRICULTURAL MACHINERY MFRS &/OR DISTS(A220)	Seeds (Certified) Pty. Ltd., Chalmers Cr., Mascot	260598	Road Match	75m
SEED MERCHANTS (S182)	Seeds (Certified) Pty. Ltd.,Chalmers Cres.,Mascot	360329	Road Match	75m
SEPARATOR MFRS./IMPORTERS (S185)	Seeds (Certified) Pty. Ltd.,Chalmers Cres.,Mascot	360340	Road Match	75m

Business Activity	Premise	Ref No.	Location Confidence	Distance to Road Corridor or Area
MINING MACHINERY & EQUIPMENT IMPORTERS,DISTRIBUTORS &/OR MANUFACTURERS (M396)	Seeds (Certified) Pty. Ltd.,Chalmers Cres.,Mascot.	331808	Road Match	75m
CURTAIN RAILS, RODS & RINGS MANUFACTURERS (C774)	Sylon Ltd., Chalmers Cr., Mascot, 2020	286480	Road Match	75m
CONFECTIONERSS-MANUFACTURING & /OR WHOLESALE (C617)	Worsley, E.J. Pty. Ltd., Chalmers Cres., Mascot	285474	Road Match	75m
CONFECTIONERY MFRS.' SUPPLIES (C626)	Worsley, E.J. Pty. Ltd., Chalmers Cres., Mascot	285506	Road Match	75m
FOOD MFRS.-CEREAL (F410)	Worsley,E.J.Pty. Ltd,Chalmers Cres,Mascot	304899	Road Match	75m

Business Directory Content Derived from Universal Business Directories (UBD) - Licensed from Hardie Grant

1965 Historical Business Directory Records

297 King Street, Mascot, NSW 2020



Historical Business Directories

297 King Street, Mascot, NSW 2020

1965 Business Directory Records
Premise or Road Intersection Matches

Records from the 1965 UBD Business Directory, mapped to a premise or road intersection, within the dataset buffer:

Business Activity	Premise	Ref No.	Location Confidence	Distance to Feature Point	Direction
BOILERMAKERS	Byrne & Thomas Pty, Ltd., 295 King St., Mascot	52323	Premise Match	6m	South East
Pressure Vessel Mfrs.	Byrne & Thomas Pty. Ltd., 295 King St., Mascot	135750	Premise Match	6m	South East
Well - Drilling Contractors	Allan Royle Pty. Ltd., 287 King St., Mascot	157035	Premise Match	64m	South East
Foundation testing	Allan Royle Pty. Ltd., 287 King St., Mascot	89341	Premise Match	64m	South East
Boring Contractors	Architects Boring & Foundation Testing Co. , 287 King St., Mascot	53827	Premise Match	64m	South East
Well - Drilling Contractors	Architects, Boring & Foundation Testing Ltd.Co. , 287 King St., Mascot	157036	Premise Match	64m	South East
Boring Contractors	Royle, A, Pty. Ltd., 287 King St., Mascot	53836	Premise Match	64m	South East
Pump Equipment Manufacturers &/Or Distributors	Royle, Allan Pty. Ltd., 287 King St., Mascot	137467	Premise Match	64m	South East
Sheet Metal Workers	Byrne & Thomas Pty. Ltd., 285 King St., Mascot	143867	Premise Match	76m	South East
Bakers' & Pastrycooks' Supplies	Brookes Foods Pty. Ltd., 5 Chalmers Cres., Mascot	49356	Premise Match	89m	North
Fruit Juice Extract Mfrs./Merchants	Brookes Foods Pty. Ltd., 5 Chalmers Cres., Mascot	90432	Premise Match	89m	North
Food Exporters	Brookes Foods Pty. Ltd., 5 Chalmers Cres., Mascot	88147	Premise Match	89m	North
Food Processors/Packers	Brookes Foods Pty. Ltd., 5 Chalmers Cres., Mascot	88327	Premise Match	89m	North
Food Products Mfrs.	Brookes Foods Pty. Ltd., 5 Chalmers Cres., Mascot	88407	Premise Match	89m	North
Chemists - Manufacturing &/or Wholesale	B. B. Chemical of Aust. Pty. Ltd., 191 O'Riordan St., Alexandria	64446	Premise Match	98m	East
Dye & Bleach Manufacturers Imports. &/or Dists.	B.B. Chemical Co. of Aust. Pty. Ltd., 191 O'Riordan St., Alexandria	76660	Premise Match	98m	East
Adhesive Mfrs. &/or Dists.	Bostik Aust. Pty. Ltd., 191-203 O'Riordan St., Mascot	44588	Premise Match	98m	East
Polish Manufacturers/Distributors	Bostik Aust. Pty. Ltd., 191-203 O'Riordan St., Mascot	135257	Premise Match	98m	East
Wax Mfrs. &/or Importers	Bostik Aust. Pty. Ltd., 191-203 O'Riordan St., Mascot	156078	Premise Match	98m	East
Builders' Suppliers	Bostik Australia Pty. Limited , 191-203 O'Riordan St., Mascot	56024	Premise Match	98m	East
Sealing Compounds	Bostik Australia Pty. Ltd., 191-203 O'Riordan St., Mascot	143423	Premise Match	98m	East
Insulating Material Mfrs.	Bostik Australia Pty. Ltd., 191-203 O'Riordan St., Mascot	103950	Premise Match	98m	East
Motor Trimmers	Hyde, Frank, 191 O'Riordan St., Mascot	127233	Premise Match	98m	East
Motor Painters	Kable & Abbey Ply. Ltd., 191 O'Riordan St., Mascot	124001	Premise Match	98m	East
Motor Body Repairs/Converters	Kable & Abbey Pty. Ltd., 191 O'Riordan St., Mascot	120171	Premise Match	98m	East
Milk Vendors	Taylor, J, W., 191 O'Riordan St., Mascot	115933	Premise Match	98m	East
Grocers - Wholesale	Worsley, E. J. Pty. Ltd., 3 Chalmers Cres., Mascot	97400	Premise Match	109m	North
Galvanising & Tining	Mascot Galvanising Works Pty. Ltd., 342 King St., Mascot	94410	Premise Match	112m	South East

Business Activity	Premise	Ref No.	Location Confidence	Distance to Feature Point	Direction
Irrigation Systems & Equipment Mfrs. &/or Dists.	McCarey Irrigation Pty. Ltd., 338a King St., Mascot	105407	Premise Match	112m	South East
Air Equipment Mfrs. &/or Dists.	A.E.P. Air Conditioning Pty. Ltd., 205 O'Riordan St., Mascot	45725	Premise Match	113m	South East
Air Conditioning Units & Machinery Mfrs.	A.E.P. Air Conditioning Pty. Ltd., 205 O'Riordan St., Mascot	45674	Premise Match	113m	South East
Air Conditioning Units & Machinery Mfrs.	Austral Engineering Products Pty. Ltd., 205 O'Riordan St., Mascot	45679	Premise Match	113m	South East
Engineers - Fabricating	Austral Engineering Products Pty. Ltd., 205 O'Riordan St., Mascot	81677	Premise Match	113m	South East
Engineers - Hot Water, Heating/Ventilating	Austral Engineering Products Pty. Ltd., 205 O'Riordan St., Mascot	83102	Premise Match	113m	South East
Electrical Meter Box & Surrounds - Mfrs.	Austral Engineering Products Pty. Ltd., 205 O'Riordan St., Mascot	79152	Premise Match	113m	South East
Electrical Switchboard Mfrs.	Austral Engineering Products Pty. Ltd., 205 O'Riordan St., Mascot	79868	Premise Match	113m	South East
Engineers - Air Conditioning	Austral Engineering Products Pty. Ltd., 205 O'Riordan St., Mascot	80658	Premise Match	113m	South East
Sheet Metal Workers	Austral Engineering Products Pty. Ltd., 205 O'Riordan St., Mascot	143840	Premise Match	113m	South East
STEEL FABRICATORS	Austral Engineering Products Pty. Ltd., 205 O'Riordan St., Mascot	148074	Premise Match	113m	South East
Welders - Electric &/or Oxy	Austral Engineering Products Pty. Ltd., 205 O'Riordan St., Mascot	156232	Premise Match	113m	South East
Ventilating Equipment Mfrs. &/or Distributors	Austral Engineering Products Pty. Ltd., 205 O'Riordan St., Mascot	155351	Premise Match	113m	South East
Earth Moving Equipment - Mfrs., Importers &/or Dists.	American Heavy Equipment Co. Pty. Ltd., 185 O'Riordan St., Mascot	76868	Premise Match	122m	East
Builders & Contractors	Thiess Bros. Pty. Limited , 185-189 O'Riordan St., Mascot	55669	Premise Match	122m	East
Road - Making Contractors	Thiess Bros. Pty. Limited , 185-189 O'Riordan St., Mascot	140749	Premise Match	122m	East
Earth-Moving Contractors	Thiess Bros. Pty. Limited, 185-189 O'Riordan St., Mascot	76818	Premise Match	122m	East
Contractors - General	Thiess Bros. Pty. Limited, 185-189 O'Riordan St., Mascot	70303	Premise Match	122m	East
Engineers - Civil	Thiess Bros. Pty. Limited., 185-189 O'Riordan St., Mascot	80895	Premise Match	122m	East
Engineers - Constructional	Thiess Bros. Pty. Ltd., 185-189 O'Riordan St., Mascot	81025	Premise Match	122m	East
Coal Mining Contractors - Open Cut	Thiess Bros. Pty. Ltd., 185-189 O'Riordan St., Mascot	69457	Premise Match	122m	East
Bride Builders & Contractors	Thiess Bros. Pty. Ltd., 185-189 O'Riordan St., Mascot	54242	Premise Match	122m	East
Buildings Refabricated - Mfrs. &/or Dists.	U-Do-It Prefabrications., 217 O'Riordan St., Mascot	57338	Premise Match	146m	South East
Builders' Suppliers	U-Do-It Prefabrications., 217 O'Riordan St., Mascot	56381	Premise Match	146m	South East
Canvas Goods Mfrs. &/or Wholesalers	Goodearls Pty. Ltd., 219 O'Riordan St., Mascot	61893	Premise Match	150m	South East
Blind Mfrs. - Canvas & Awning	Goodearls Pty. Ltd., 219 O'Riordan St., Mascot	51698	Premise Match	150m	South East
Blind Mfrs. - Holland	Goodearls Pty. Ltd., 219 O'Riordan St., Mascot	51739	Premise Match	150m	South East
Horse/Cow Rug Manufacturers	Goodearls Pty. Ltd., 219 O'Riordan St., Mascot	100661	Premise Match	150m	South East
Furniture - Garden & Ornamental - Mfrs. &/or Wholesalers	Goodearls Pty. Ltd., 219 O'Riordan St., Mascot	93174	Premise Match	150m	South East
TENTS/TARPAULINS	Goodearls Pty. Ltd., 219 O'Riordan St., Mascot	150650	Premise Match	150m	South East

Business Directory Content Derived from Universal Business Directories (UBD) - Licensed from Hardie Grant

1965 Business Directory Records
Road or Area Matches

Records from the 1965 UBD Business Directory, mapped to a road or an area, within the dataset buffer. Records are mapped to the road when a building number is not supplied, cannot be found, or the road has been renumbered since the directory was published:

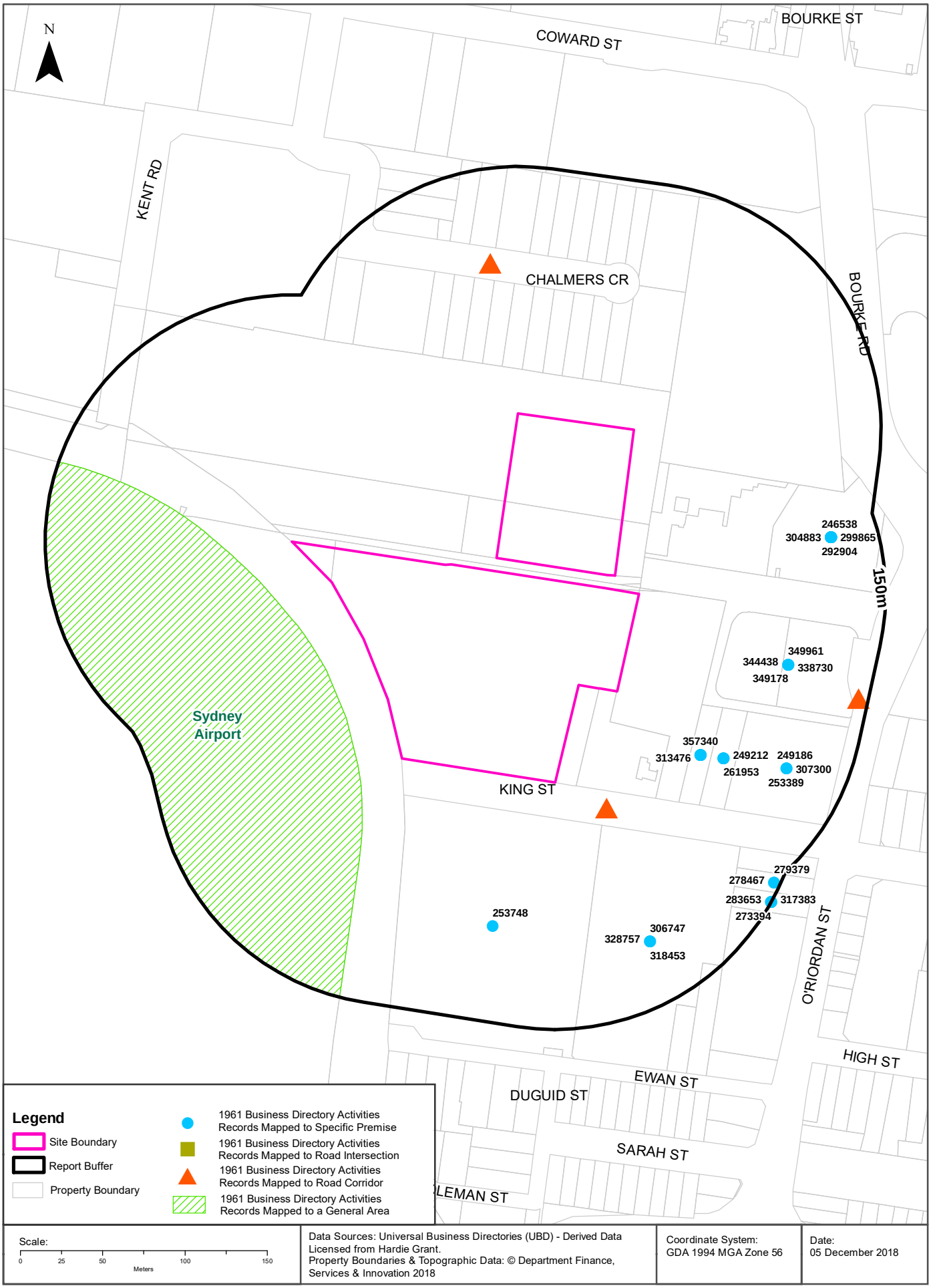
Business Activity	Premise	Ref No.	Location Confidence	Distance to Road Corridor or Area
Photographers - Potrait	Banyan Studios, 203 King St., Mascot	132423	Road Match	0m
Beauty Salons &/or Ladies Hairdressers	Becker, W. , 203 King St., Mascot	50370	Road Match	0m
Real Estate Agents/Valuers	Elphick, J. 5.., 203 King St. Mascot	139413	Road Match	0m
Business Agents &/or Brokers	Elphick, J. S. , 203 King St., Mascot	57488	Road Match	0m
Insurance Agents	Elphick, J. S., 203 King St., Mascot	104236	Road Match	0m
ACCOUNTANTS & AUDITORS	Low, R. L. , 203 King St., Mascot	43914	Road Match	0m
Dentists	McKaig, J., 203 King St., Mascot	73549	Road Match	0m
Engineers - Aeronautical	Aces., Kingsford Smith Airport., Mascot	80601	Area Match	27m
Air Services Operators	Australian Aircraft Sales Pty. Ltd., Hangar 2, Mascot	45808	Area Match	27m
Aircraft Mfrs. &/or Dists.	Australian Aircraft Sales Pty. Ltd., Hangar 2, Mascot Airport	45910	Area Match	27m
Fire Protection Appliance Mfrs. &/or Engineers	Rolfe Industries (Aust.) Pty. Ltd., Airport, Mascot	86530	Area Match	27m
TEXTILE COATERS &/OR TREATERS	Bel-Bac Pty. Limited, Chalmers Cres., Mascot	150807	Road Match	75m
Belt Accessories & Trimmings Mfrs. &/or Dists.	Bel-Bac Pty. Ltd., Chalmers Cres., Mascot	51404	Road Match	75m
Haberdashery - Wholesale	Bel-Bac Pty. Ltd., Chalmers Cres., Mascot	97643	Road Match	75m
Hardware Manufacturers	Bel-Bac Pty. Ltd., Chalmers Cres., Mascot	99530	Road Match	75m
Mop Mfrs./W'salers	Brooks Foods Pty. Ltd., Chambers Cres., Mascot	119182	Road Match	75m
Bag & Sack Merchants	Mascot Bags & Sacks Co. , Chalmers Cres., Mascot	49133	Road Match	75m
Motor Garages & Engineers	May & Blake, Chalmers Cres. Mascot	123011	Road Match	75m
Motor Painters	May & Blake, Chalmers Cres., Mascot	124088	Road Match	75m
Motor Panel Beaters	May & Blake, Chalmers Cres., Mascot	124847	Road Match	75m
Motor Wheel Repairers/Specialists	May & Blake, Chalmers Cres., Mascot	127371	Road Match	75m
Motor Chassis Straighteners &/or Repairers/Specialists	May & Blake, Chalmers Cres., Mascot.	121299	Road Match	75m
Engineers - Diesel	May & Blake., Chalmers Cres., Mascot	81333	Road Match	75m
Brushware Mfrs. - Industrial	Morris, B. O. (Aust.) Pty. Ltd., Chalmers Cres., Mascot	54387	Road Match	75m
Hardware Merchants - Wholesale	Morris, B. O. (Australia) Pty. Ltd., Chalmers Cres., Mascot	99657	Road Match	75m
ABRASIVE MANUFACTURERS	Morris, B. O. (Aust.) Pty. Ltd., Chalmers Cr., Mascot	43335	Road Match	75m
File & Twist Drill Importers, Dists. &/or Mfrs.	Morris, B. O. (Aust.) Pty. Ltd., Chalmers Cres., Mascot	85991	Road Match	75m
Flexible Shafting & Tubing Mfrs. &/or Dists.	Morris, B. O. (Aust.) Pty. Ltd., Chalmers Cres., Mascot	87350	Road Match	75m
Machinery Merch./Import.	Morris, B. O. (Aust.) Pty. Ltd., Chalmers Cres., Mascot	108883	Road Match	75m
Polishing Equipment Manufacturers	Morris, B. O. (Aust.) Pty. Ltd., Chalmers Cres., Mascot	135305	Road Match	75m
Electric Motors - Dealers &/or Wholesalers	Morris, B. O. (Australia) Pty. Ltd., Chalmers Cres., Mascot	78012	Road Match	75m
Electric Tools (Portable) Mfrs. &/or Dists.	Morris, B. O. (Australia) Pty. Ltd., Chalmers Cres., Mascot	78426	Road Match	75m
Electrical Insulation & Insulations Mfrs. &/or Imp. &/or Dists.	Morris, B. O. (Australia) Pty. Ltd., Chalmers Cres., Mascot	79131	Road Match	75m
Air Compressor Mfrs. &/or Dists.	Morris, B.O. (Australia) Pty. Ltd., Chalmers Cres., Mascot	45646	Road Match	75m

Business Activity	Premise	Ref No.	Location Confidence	Distance to Road Corridor or Area
Electrical Insulation & Insulations Mfrs. &/or Imp. &/or Dists.	Morris, B. O. (Australia) Pty. Ltd., Chalmers Cres., Mascot	79131	Road Match	75m
Air Compressor Mfrs. &/or Dists.	Morris, B.O. (Australia) Pty. Ltd., Chalmers Cres., Mascot	45646	Road Match	75m
Carriers & Cartage Contractors - Master	Pine, N. & Co. , Chalmers Cres., Mascot	62772	Road Match	75m
Agricultural Chemicals - Importers &/or Dists.	Seeds (Certified) Pty. Limited , Chalmers Cres., Mascot	45324	Road Match	75m
Agricultural Machinery - Mfrs. &/or Dists.	Seeds (Certified) Pty. Limited , Chalmers Cres., Mascot	45481	Road Match	75m
Seed Merchants	Seeds (Certified) Pty. Limited , Chalmers Cres., Mascot	143604	Road Match	75m
Machinery Merch./Import.	Seeds (Certified) Pty. Limited, Chalmers Cres., Mascot	108901	Road Match	75m
Agricultural Chemical Mfrs.	Seeds (Certified) Pty. Ltd., Chalmers Cres., Mascot	45355	Road Match	75m
Mining Machinery & Equipment Importers, Distributors &/or Manufacturers	Seeds (Certified) Pty. Ltd., Chalmers Cres., Mascot	116391	Road Match	75m
Separator Mfrs./Importers	Seeds (Certified) Pty. Ltd., Chalmers Cres., Mascot	143617	Road Match	75m
Confectioners - Manufacturing &/or Wholesale	Worsley, E. J. Pty. Ltd., Chalmers Cres., Mascot	70101	Road Match	75m
Confectionery Mfrs.' Supplies	Worsley, E. J. Pty. Ltd., Chalmers Cres., Mascot	70193	Road Match	75m
Food Mfrs. - Cereal	Worsley, E. J. Pty. Ltd., Chalmers Cres., Mascot	88277	Road Match	75m
Motor Car Spring Mfrs.	Lewis, A. H. Pty. Ltd., O'Riordan St., Mascot	121212	Road Match	133m
Coach & Horse-Drawn Vehicle Builders	Smith & Bassett Pty. Ltd., 94 Old Botany Rd., Mascot	69414	Road Match	133m

Business Directory Content Derived from Universal Business Directories (UBD) - Licensed from Hardie Grant

1961 Historical Business Directory Records

297 King Street, Mascot, NSW 2020



Historical Business Directories

297 King Street, Mascot, NSW 2020

1961 Business Directory Records
Premise or Road Intersection Matches

Records from the 1961 UBD Business Directory, mapped to a premise or road intersection, within the dataset buffer:

Business Activity	Premise	Ref No.	Location Confidence	Distance to Feature Point	Direction
BORING CONTRACTORS	Allan Royle Pty Ltd 287 King St., Mascot	275365	Premise Match	64m	South East
FOUNDATION TESTING	Allan Royle Pty. Ltd, 287 King St., Mascot	313476	Premise Match	64m	South East
PERCUSSION DRILLING & PUMP INSTALLATION	Allan Royle Pty. Ltd., 287 King St., Mascot	357339	Premise Match	64m	South East
BORING CONTRACTORS	Allan Royle Pty. Ltd., 287 King St., Mascot.	275364	Premise Match	64m	South East
IRRIGATION SYSTEMS & EQUIPMENT MFRS. &/OR DISTS.	Allan, Royle Pty. Ltd., 287 King St., Mascot	328743	Premise Match	64m	South East
BORING CONTRACTORS	Architects Boring & Foundation Testing Co., 287 King St., Mascot	275366	Premise Match	64m	South East
PERCUSSION DRILLING & PUMP INSTALLATION	Architects, Boring & Foundation Testing Co., 287 King St., Mascot	357340	Premise Match	64m	South East
SHEET METAL WORKERS	Byrne & Thomas Pty Ltd 285 King St., Mascot	249212	Premise Match	76m	South East
WELDERS-ELECTRIC &/OR OXY	Byrne & Thomas Pty Ltd 285 King St., Mascot	261953	Premise Match	76m	South East
WELDERS-ELECTRIC &/OR OXY	Byrne & Thomas Pty. Ltd., 285 King St., Mascot	261954	Premise Match	76m	South East
SHEET METAL WORKERS	Byrne & Thomas Pty. Ltd., 285 King St., Mascot	249213	Premise Match	76m	South East
BOILERMAKERS	Byrne & Thomas Pty. Ltd., 285 King St., Mascot	273896	Premise Match	76m	South East
STEEL MERCHANTS-GENERAL	Murray-Moore, J. (N.S.W.) Pty. Ltd., 346 King St., Mascot	253748	Premise Match	92m	South
MOTOR TRIMMERS	Hyde, Frank, 191 O'Riordan St., Mascot	352284	Premise Match	98m	East
MOTOR PAINTERS	Smith & Bassett Pty. Ltd., 191 O'Riordan St., Mascot	349178	Premise Match	98m	East
MOTOR PANEL BEATERS	Smith & Bassett Pty. Ltd., 191 O'Riordan St., Mascot	349961	Premise Match	98m	East
MOTOR BODY REPAIRS/CONVERTERS	Smith & Bassett Pty. Ltd., 191 O'Riordan St., Mascot	344438	Premise Match	98m	East
MILK VENDORS	Taylor, J. W., 191 O'Riordan St., Mascot	338730	Premise Match	98m	East
GALVANISING & TINNING	Mascot Galvanising Works Pty. Ltd., 342 King St., Mascot	318453	Premise Match	112m	South East
ENGINEERS-GENERAL/MFRG./ MECHANICAL	McCarey Irigation & Engineering, King St., Mascot	306747	Premise Match	112m	South East
IRRIGATION SYSTEMS & EQUIPMENT MFRS. &/OR DISTS.	McCarey Irrigation & Engineering, King St., Mascot	328757	Premise Match	112m	South East
STEEL FABRICATORS	Austral Engineering Products Pty. Ltd., 205 O'Riordan St., Mascot	253389	Premise Match	113m	South East
SHEET METAL WORKERS	Austral Engineering Products Pty. Ltd., 205 O'Riordan St., Mascot	249186	Premise Match	113m	South East
ENGINEERS-HOT WATER, HEATING/VENTILATING	Austral Engrg. Products Pty. Ltd., 205 O'Riordan St., Mascot	307300	Premise Match	113m	South East
EARTH-MOVING EQUIPMENT MFRS., IMPORTERS	American Heavy Equipment Co. Pty. Ltd., 185 O'Riordan St., Mascot	299888	Premise Match	122m	East
MOTOR CAR/TRUCK DEALERS—NEW/USED	American Heavy Equipment Co. Pty. Ltd., 185 O'Riordan St., Mascot	344831	Premise Match	122m	East

Business Activity	Premise	Ref No.	Location Confidence	Distance to Feature Point	Direction
EARTH MOVING MACHINERY PARTS-MFRS. &/OR DISTS.	American Heavy Equipment Co. Pty. Ltd., 185 O'Riordan St., Mascot	299708	Premise Match	122m	East
CRUSHING MACHINE MFRS. &/OR DISTRIBUTORS	American Heavy Equipment Company Pty. Ltd., 185 O'Riordan St., Mascot	293836	Premise Match	122m	East
MOTOR CAR/TRUCK DEALERS—NEW/USED	Thiess (Sales) Pty. Ltd., 185 O'Riordan St., Mascot	345423	Premise Match	122m	East
MOTOR CAR/TRUCK IMPORTERS/DISTRIBUTORS	Thiess (Sales) Pty. Ltd., 185 O'Riordan St., Mascot	345552	Premise Match	122m	East
EARTH-MOVING CONTRACTORS	Thiess Bros Pty Limited 185-189 O'Riordan St., Mascot	299864	Premise Match	122m	East
CONTRACTORS-GENERAL	Thiess Bros Pty Limited 185-189 O'Riordan St., Mascot	292903	Premise Match	122m	East
BUILDERS & CONTRACTORS	Thiess Bros Pty Limited 185-189 O'Riordan St., Mascot	276677	Premise Match	122m	East
ROAD-MAKING CONTRACTORS	Thiess Bros Pty Limited 185-189 O'Riordan St., Mascot	246538	Premise Match	122m	East
ENGINEERS-CIVIL	Thiess Bros Pty Limited 185-189 O'Riordan St., Mascot P.O. Box 98-Mascot	304883	Premise Match	122m	East
ENGINEERS-CIVIL	Thiess Bros. Pty. Limited, 185-189 O'Riordan St., Mascot	304884	Premise Match	122m	East
BUILDERS & CONTRACTORS	Thiess Bros. Pty. Limited, 185-189 O'Riordan St., Mascot	276678	Premise Match	122m	East
CONTRACTORS-GENERAL	Thiess Bros. Pty. Limited, 185-189 O'Riordan St., Mascot	292904	Premise Match	122m	East
EARTH-MOVING CONTRACTORS	Thiess Bros. Pty. Limited, 185-189 O'Riordan St., Mascot	299865	Premise Match	122m	East
ROAD-MAKING CONTRACTORS	Thiess Bros. Pty. Limited, 185-189 O'Riordan St., Mascot	246539	Premise Match	122m	East
BUILDERS' SUPPLIERS	U-Do-It Prefabrications, 217 O'Riordan St., Mascot	278467	Premise Match	146m	South East
BUILDINGS-PREFABRICATED-MFRS. &/OR DISTS.	U-Do-It Prefabrications, 217 O'Riordan St., Mascot	279379	Premise Match	146m	South East
CANVAS GOODS MFRS. &/OR W'SALERS	Goodearls Pty. Ltd., 219 O'Riordan St., Mascot	283653	Premise Match	150m	South East
FURNITURE-GARDEN & ORNAMENTAL-MFRS. &/OR WHOLESALERS	Goodearls Pty. Ltd., 219 O'Riordan St., Mascot	317383	Premise Match	150m	South East
HORSE/COW RUG MFRS.	Goodearls Pty. Ltd., 219 O'Riordan St., Mascot	324581	Premise Match	150m	South East
BLIND MFRS.-CANVAS & AWNING	Goodearls Pty. Ltd., 219 O'Riordan St., Mascot	273364	Premise Match	150m	South East
BLIND MFRS.-HOLLAND	Goodearls Pty. Ltd., 219 O'Roordan St., Mascot	273394	Premise Match	150m	South East

Business Directory Content Derived from Universal Business Directories (UBD) - Licensed from Hardie Grant

1961 Business Directory Records Road or Area Matches

Records from the 1961 UBD Business Directory, mapped to a road or an area, within the dataset buffer. Records are mapped to the road when a building number is not supplied, cannot be found, or the road has been renumbered since the directory was published:

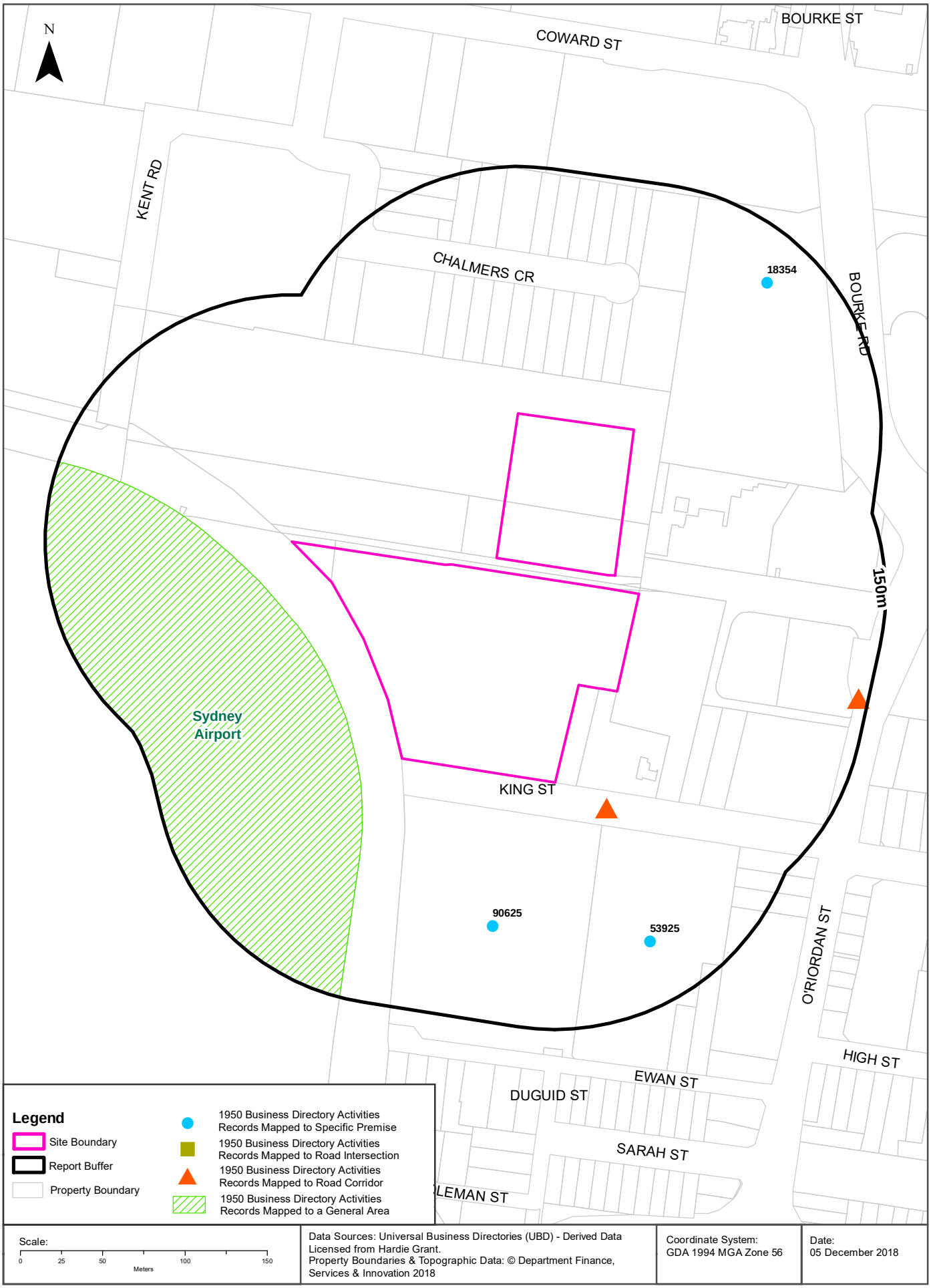
Business Activity	Premise	Ref No.	Location Confidence	Distance to Road Corridor or Area
BOND & FREE STORES	Cook, A. & Sons Pty. Ltd., 747-761 King St., Mascot.	274134	Road Match	0m
AIRCRAFT EQUIPMENT MFRS. &/OR DISTS	A.E.S. Trading Company Pty Ltd Mascot Airport.	267507	Area Match	27m
AIRCRAFT MFRS. &/OR DISTS.	A.E.S. Trading Company Pty Ltd Mascot Airport.	267550	Area Match	27m
AIR SERVICES OPERATORS	Airlines of N.S.W. Pty. Ltd., Kingsford Smith Airport, Mascot	267452	Area Match	27m
AIR SERVICES OPERATORS	Airlines of NSW Pty Ltd Kingsford Smith Airport, Mascot	267453	Area Match	27m
AIR SERVICES BOOKING AGENTS	Ansett-A.N.A. Mascot Airport	267324	Area Match	27m

Business Activity	Premise	Ref No.	Location Confidence	Distance to Road Corridor or Area
AIR SERVICES OPERATORS	Ansett-A.N.A.Mascot Airport	267459	Area Match	27m
ENGINEERS-AERONAUTICAL	Butler Air Transport Ltd., Kingsford Smith Airport, Mascot	304601	Area Match	27m
GOVT. DEPTS.-C'WEALTH	Civil Aviation Dept., Kingsford Smith Aerodrome, Mascot	319600	Area Match	27m
FOOD PROCESSING MACH. MFRS./DEALERS	Bingham D W & Co Pty Ltd Chalmers Cres., Mascot	312465	Road Match	75m
BAKERS' & PASTRYCOOKS' SUPPLIES	Brooks Foods Pty. Ltd., Chambers Cres., Mascot	270885	Road Match	75m
FOOD PROCESSORS/PACKERS	Brooks Foods Pty. Ltd., Chambers Cres., Mascot	312503	Road Match	75m
MOP MFRS./W'SALERS	Brooks Foods Pty. Ltd., Chambers Cres., Mascot	343277	Road Match	75m
TEXTILE COATERS &/OR TREATERS	Ingster, J. & I. Pty. Ltd., Chalmers Cr., Mascot	256239	Road Match	75m
BELT MANUFACTURERS-LADIES' GENT.'S	Ingster, J. & I. Pty. Ltd., Chalmers Cres., Mascot	272984	Road Match	75m
MOTOR GARAGES & ENGINEERS	May & Blake Chalmers Cres. MASCOT	347663	Road Match	75m
MOTOR GARAGES & ENGINEERS	May & Blake, Chalmers Cres. MASCOT	347664	Road Match	75m
BRUSHWARE MFRS.-INDUSTRIAL	Morris B O (Aust) Pty Ltd Chalmers Cres., Mascot	276092	Road Match	75m
FILE & TWIST DRILL IMPORTERS, DISTS. &/OR MFRS.	Morris B O (Aust) Pty Ltd Chalmers Cres., Mascot	310252	Road Match	75m
FLEXIBLE SHAFT MACHINERY	Morris B O (Aust) Pty Ltd Chalmers Cres., Mascot	311472	Road Match	75m
PNEUMATIC TOOL DISTRIBUTORS	Morris B O (Aust) Pty Ltd Chalmers Cres., Mascot	361210	Road Match	75m
SOLDERING & TINNING COMPOUNDS	Morris B O (Aust) Pty Ltd Chalmers Cres., Mascot	251091	Road Match	75m
ABRASIVE MANUFACTURERS	Morris B O (Aust) Pty Ltd Chalmers Crescent, Mascot	264536	Road Match	75m
ADHESIVE TAPE MFRS. & DISTS.	Morris B O (Aust) Pty Ltd Chalmers Crescent, Mascot	266255	Road Match	75m
ABRASIVE MANUFACTURERS	Morris, B. O. (Aust.) Pty. Ltd., Chalmers Cr., Mascot	264537	Road Match	75m
BRUSHWARE MFRS.-INDUSTRIAL	Morris, B. O. (Aust.) Pty. Ltd., Chalmers Cres., Mascot	276093	Road Match	75m
FILE & TWIST DRILL IMPORTERS, DISTS. &/OR MFRS.	Morris, B. O. (Aust.) Pty. Ltd., Chalmers Cres., Mascot	310253	Road Match	75m
FLEXIBLE SHAFTING & TUBING MFRS. &/OR DISTS.	Morris, B., O. (Aust.) Pty. Ltd., Chalmers Cres., Mascot	311481	Road Match	75m
AGRICULTURAL CHEMICALS-IMPS, &/OR DISTS.	Seed (Certified) Pty. Limited, Chalmers Cr., Mascot	266886	Road Match	75m
AGRICULTURAL MACHINERY-MFRS. &/OR DISTS.	Seeds (Certified) Pty Limited Chalmers Cres., Mascot	267057	Road Match	75m
SEED MERCHANTS	Seeds (Certified) Pty Limited Chalmers Cres., Mascot	248941	Road Match	75m
AGRICULTURAL MACHINERY-MFRS. &/OR DISTS.	Seeds (Certified) Pty. Limited, Chalmers Cres., Mascot	267058	Road Match	75m
MACHINERY MERCH./IMPORT.	Seeds (Certified) Pty. Limited, Chalmers Cres., Mascot	332579	Road Match	75m
SEED MERCHANTS	Seeds (Certified) Pty. Limited, Chalmers Cres., Mascot	248942	Road Match	75m
HEALTH FOOD RETAILERS	Worsley, F. J. Pty. Ltd., Chalmers Cres., Mascot	324143	Road Match	75m
COACH & HORSE-DRAWN VEHICLE BUILDERS	Smith & Bassett Pty. Ltd., 94 Old Botany Rd., Mascot	291866	Road Match	133m

Business Directory Content Derived from Universal Business Directories (UBD) - Licensed from Hardie Grant

1950 Historical Business Directory Records

297 King Street, Mascot, NSW 2020



Historical Business Directories

297 King Street, Mascot, NSW 2020

1950 Business Directory Records
Premise or Road Intersection Matches

Records from the 1950 UBD Business Directory, mapped to a premise or road intersection, within the dataset buffer:

Business Activity	Premise	Ref No.	Location Confidence	Distance to Feature Point	Direction
PAINT, VARNISH & STAIN MANUFACTURERS	Consolidated Paints and Products Co., 358 King St., Mascot	90625	Premise Match	92m	South
GALVANISING	Mascot Galvanising Works, 342 King St., Mascot	53925	Premise Match	112m	South East
CARRIERS & CARTAGE CONTRACTORS	Baker, J., 201 Bourke Rd., Alexandria	18354	Premise Match	121m	North East

Business Directory Content Derived from Universal Business Directories (UBD) - Licensed from Hardie Grant

1950 Business Directory Records
Road or Area Matches

Records from the 1950 UBD Business Directory, mapped to a road or an area, within the dataset buffer. Records are mapped to the road when a building number is not supplied, cannot be found, or the road has been renumbered since the directory was published:

Business Activity	Premise	Ref No.	Location Confidence	Distance to Road Corridor or Area
BUTCHERS-RETAIL	Ball, A., King St., Mascot	13093	Road Match	0m
GROCERS-RETAIL	Bastow, J. E., King St., Mascot	56393	Road Match	0m
BEAUTY SALONS &/OR LADIES' HAIRDRESSERS	Betty's Beauty Box, King St., Mascot	6890	Road Match	0m
GROCERS-RETAIL	Bray, W., King St. East, Mascot	56525	Road Match	0m
GROCERS-RETAIL	Jerome, B. W., King St., Mascot	57888	Road Match	0m
TAXIS	"Kingsford-Smith Airport Hire Car Service", Aerodrome, Mascot	107249	Area Match	27m
AIRCRAFT MANUFACTURERS & DISTRIBUTORS	Aeronautical Supply Co. Pty. Ltd., Mascot Aerodrome	1633	Area Match	27m
AIRCRAFT EQUIPMENT MANUFACTURERS &/OR DISTRIBUTORS	Aeronautical Supply Co. Pty. Ltd., No. 10 Hangar, Kingsford-Smith Aerodrome, Mascot	1612	Area Match	27m
AIR SERVICES OPERATORS	Air Taxi Services of Aust., Kingsford Smith Aerodrome, Mascot	1567	Area Match	27m
HIRE CAR SERVICES	Airport Hire Cars, Aerodrome, Mascot	62112	Area Match	27m
TAXIS	Aitkenhead, W. J., Kingsford Smith Airport, Mascot	107252	Area Match	27m
ENGINEERS-AERONAUTICAL	Butler Air Transport Co., Aerodrome, Mascot	39794	Area Match	27m
AIR SERVICES OPERATORS	Butler Air Transport Pty. Ltd. (Head Office), Kingsford Smith Airport, Mascot	1580	Area Match	27m
GOVERNMENT DEPTS.-COMMONWEALTH	Civil Aviation Dept., Kingsford Smith Aerodrome, Mascot	54842	Area Match	27m
AIRCRAFT MANUFACTURERS & DISTRIBUTORS	De Havilland Aircraft Pty. Ltd. Mascot Aerodrome	1640	Area Match	27m
AIR SERVICES OPERATORS	East-West Airlines Ltd., Kingsford Smith Aerodrome, Mascot	1585	Area Match	27m

Business Activity	Premise	Ref No.	Location Confidence	Distance to Road Corridor or Area
ENGINEERS-AERONAUTICAL	Fawcott Aviation Engineering Service (D R. and J. F. Fawcett), Aerodrome, Mascot	39803	Area Match	27m
AIR SERVICES OPERATORS	Interstate Air Services Pty. Ltd., Kingsford Smith Aerodrome, Mascot	1588	Area Match	27m
AIRCRAFT EQUIPMENT MANUFACTURERS &/OR DISTRIBUTORS	Kingsford Smith Aviation Service Ltd., Kingsford Smith Aerodrome, Mascot	1617	Area Match	27m
AIRCRAFT MANUFACTURERS & DISTRIBUTORS	Kingsford Smith Aviation Service Ltd., Kingsford Smith Aerodrome, Mascot P.O. Box 23, Mascot	114781	Area Match	27m
ENGINEERS-AERONAUTICAL	Kingsford Smith Aviation Service Ltd., Kingsford Smith Aerodrome, Mascot.	39809	Area Match	27m
AIR SERVICES OPERATORS	Kingsford Smith Aviation Service, Mascot Aerodrome	1589	Area Match	27m
HIRE CAR SERVICES	Kingsford-Smith Airport Hire Car Service, Aerodrome, Mascot	62215	Area Match	27m
AIRCRAFT EQUIPMENT MANUFACTURERS &/OR DISTRIBUTORS	Legget Products Pty. Ltd., Kingsford Smith Aerodrome, Mascot	1619	Area Match	27m
AIR SERVICES OPERATORS	Marshall Airways, Kingsford Smith Aerodrome, Mascot	1592	Area Match	27m
AIR FREIGHT AGENTS	Mascot Air Freight Delivery Service, Kingsford Smith Airport, Mascot	1523	Area Match	27m
AIRCRAFT MANUFACTURERS & DISTRIBUTORS	New England Airways, Bankstown Aerodrome and Mascot	1646	Area Match	27m
AIRCRAFT EQUIPMENT MANUFACTURERS &/OR DISTRIBUTORS	Paul and Gray Pty. Ltd., Kingsford Smith Aerodrome, Mascot	1622	Area Match	27m
CLUBS & SPORTS BODIES	Royal Aero Club of N.S.W., Kingsford Smith Aerodrome, Mascot	25426	Area Match	27m
FLYING SCHOOLS	Royal Aero Club of N.S.W., Kingsford Smith Aerodrome, Mascot	46436	Area Match	27m
MOTOR OIL & SPIRIT MERCHANTS	Shell Co. of Australia Ltd., Mascot Aerodrome	84658	Area Match	27m
MOTOR OIL & SPIRIT MERCHANTS	Vacuum Oil Co. Pty. Ltd., Margaret St.; Mascot Aerodrome	84664	Area Match	27m
AIRCRAFT EQUIPMENT MANUFACTURERS &/OR DISTRIBUTORS	W.H.K. Aero-Engineering Co., Kingsford Smith Aerodrome, Mascot	1626	Area Match	27m
AIRCRAFT MANUFACTURERS & DISTRIBUTORS	W.H.K. Aero-Engineering Co., Kingsford Smith Aerodrome, Mascot	1647	Area Match	27m
FOUNDERS-FERROUS	Cole Bros., 42 Old Botany Rd., Mascot	47651	Road Match	133m
CARRIERS & CARTAGE CONTRACTORS (MASTER)	Corfield, E. G. Estate of the Late, 'Aliceville,' Old Botany Rd., Mascot	20153	Road Match	133m
BUILDERS' SUPPLIERS	Corfield, E. G., 124 Old Botany Rd., Mascot	11741	Road Match	133m
GRAVEL, SAND & SOIL SUPPLIES	Corfield, E. G., 124 Old Botany Rd., Mascot	55127	Road Match	133m
FERTILIZER MANUFACTURERS & SUPPLIERS	Gearin, O'Riordan Ltd., Old Botany Rd., Mascot	43769	Road Match	133m
POULTRY FOOD MFRS. &/OR DISTRIBUTORS	Gearin, O'Riordan Ltd., Old Botany Rd., Mascot	94423	Road Match	133m
BISCUIT MFRS. &/OR DISTRIBUTORS	Hackshall's Ltd., 4-18 Old Botany Rd., Mascot	8222	Road Match	133m
CARRIERS & CARTAGE CONTRACTORS	Jarvie, A., 38 Old Botany Rd., Mascot	19097	Road Match	133m
HAULAGE CONTRACTORS-HEAVY	Jarvie, A., 38 Old Botany Rd., Mascot	61877	Road Match	133m
TRANSPORT SERVICES-INTERSTATE	Jarvie, A., 38 Old Botany Rd., Mascot	110248	Road Match	133m
AGRICULTURAL MACHINERY PARTS MFRS.	Paterson, J., 144 Old Botany Rd., Mascot	1419	Road Match	133m
ENGINEERS-GENERAL &/OR MANUFACTURING &/OR MECHANICAL	Paterson, J., 144 Old Botany Rd., Mascot	41096	Road Match	133m
ENGINEERS-STRUCTURAL	Paterson, J., 144 Old Botany Rd., Mascot	42484	Road Match	133m
SHEET METAL WORKERS	Paterson, J., 144 Old Botany Rd., Mascot	101795	Road Match	133m
WELDERS-ELECTRIC &/OR OXY	Paterson, J., 144 Old Botany Rd., Mascot	112989	Road Match	133m

Business Activity	Premise	Ref No.	Location Confidence	Distance to Road Corridor or Area
DISPLAY FITTINGS MFRS. &/OR SUPPLIERS	Salwey, G. H., 13 Old Botany Rd., Mascot	33065	Road Match	133m
WIREWORKERS-GENERAL	Salwey, G. H., 13 Old Botany Rd., Mascot	113959	Road Match	133m
MILK BARS & CONFECTIONERS	Shearer, A. A., 142 Old Botany Rd., Mascot	77348	Road Match	133m
ENGINEERS-GENERAL &/OR MANUFACTURING &/OR MECHANICAL	Stiff, C. J., 48 Old Botany Rd., Mascot	41291	Road Match	133m
MOTOR GARAGES &/OR ENGINEERS	Stiff, C. J., 48 Old Botany Rd., Mascot	84432	Road Match	133m
MILK VENDORS	Taylor, J. W., Old Botany Rd., Mascot	77946	Road Match	133m
LIVERY STABLES	Vallely, H., 104 Old Botany Rd., Mascot	69668	Road Match	133m
RIDING SCHOOLS	Vallely, H., 104 Old Botany Rd., Mascot	99545	Road Match	133m

Business Directory Content Derived from Universal Business Directories (UBD) - Licensed from Hardie Grant

Historical Business Directories

297 King Street, Mascot, NSW 2020

Dry Cleaners, Motor Garages & Service Stations Premise or Road Intersection Matches

Dry Cleaners, Motor Garages & Service Stations from UBD Business Directories, mapped to a premise or road intersection, within the dataset buffer:

Business Activity	Premise	Ref No.	Year	Location Confidence	Distance to Feature Point	Direction
MOTOR GARAGES & ENGINEERS(M6S6)	Rex-Press, 295 King St. MASCOT, 2020	338507	**1970**	Premise Match	6m	South East
MOTOR SERVICE STATIONS-PETROL, Etc.	Quartlys Garage, Cnr. King St. and Old Botany Rd., Mascot	86311	**1950**	Road Intersection	165m	South East
MOTOR GARAGES &/OR ENGINEERS &/OR SERVICE STATIONS.	Viscount Service Centre, 283 King St., Mascot.	51041	**1978**	Premise Match	173m	South East
MOTOR GARAGES &/OR ENGINEERS.	Viscount Service Station, 283 King St., Mascot.	59725	**1975**	Premise Match	173m	South East
MOTOR GARAGES & ENGINEERS(M6S6)	Viscount Service Station, 283 King St. MASCOT	338828	**1970**	Premise Match	173m	South East
Motor Garages & Engineers	Viscount Service Station, 283 King St. Mascot	123021	**1965**	Premise Match	173m	South East
MOTOR GARAGES &/OR ENGINEERS &/OR SERVICE STATIONS.	Quartly's Service Station, 322 King St., Mascot.	50702	**1978**	Premise Match	217m	South East
MOTOR GARAGES &/OR ENGINEERS.	Quartly's Service Station, 322 King St , Mascot.	59427	**1975**	Premise Match	217m	South East
Motor Garages & Engineers	Quartly's Service Station, 322 King St. Mascot	123014	**1965**	Premise Match	217m	South East
MOTOR GARAGES & ENGINEERS	Quartly's Service Station, 322 King St. Mascot	347961	**1961**	Premise Match	217m	South East
MOTOR GARAGES &/OR ENGINEERS	Quartly, A., 273 King St., Mascot	84245	**1950**	Premise Match	225m	East
MOTOR GARAGES & ENGINEERS(M6S6)	Quartly's Service Station, 322 King St. MASCOT	338461	**1970**	Premise Match	231m	South East
MOTOR SERVICE STATIONS—PETROL, OIL, Etc.	Airport Service Station, 239 O'Riordan St. MASCOT	350295	**1961**	Premise Match	236m	South East
Motor Garages & Service Stations	Ampol Mascot Self Serve, 239 O'Riordan St., Mascot 2020	53481	**1991**	Premise Match	239m	South East
MOTOR GARAGES & SERVICE STATIONS.	Airport Service Station, 239 O'Riordan St., Mascot.	63866	**1986**	Premise Match	239m	South East
MOTOR GARAGES &/OR ENGINEERS &/OR SERVICE STATIONS. (M6860)	Airport Service Station, 239 O'Riordan St., Mascot. 2020.	55937	**1982**	Premise Match	239m	South East
MOTOR GARAGES &/OR ENGINEERS &/OR SERVICE STATIONS.	Airport Service Station, 239 O'Riordan St., Mascot.	49216	**1978**	Premise Match	239m	South East
MOTOR SERVICE STATIONS - PETROL, OIL	Airport Service Station, 239 O'Riordan St., Mascot.	61362	**1975**	Premise Match	239m	South East
Motor Service Stations - Petrol, Oil, Etc.	Airport Service Station, 239 O'Riordan St. Mascot	125904	**1965**	Premise Match	239m	South East
MOTOR SERVICE STATIONS-PETROL,OIL,Etc. (M716)	Airport Service Station, 239 O'Riordan St. MASCOT	340739	**1970**	Premise Match	264m	South
MOTOR SERVICE STATIONS—PETROL, OIL, Etc.	Viscount Service Station, 273b King St. MASCOT	351248	**1961**	Premise Match	279m	East
MOTOR GARAGES &/OR ENGINEERS	Stevens, W. H., 265 King St., Mascot	84428	**1950**	Premise Match	279m	East
MOTOR GARAGES & ENGINEERS	Clayton Manufacturing Pty. Ltd., O'Riordan St. MASCOT	346898	**1961**	Premise Match	305m	East
Motor Garages & Engineers	Truck Sales & Service Pty. Ltd., 200 O'Riordan St. Mascot	123019	**1965**	Premise Match	308m	South East
Motor Service Stations - Petrol, Oil, Etc.	Lyndon, Peter & David, 243 O'Riordan St. Mascot	125909	**1965**	Premise Match	351m	South

Business Activity	Premise	Ref No.	Year	Location Confidence	Distance to Feature Point	Direction
Motor Garages & Engineers	Hambly, W., 127 Baxter Rd. Mascot	123006	1965	Premise Match	387m	South East
Motor Garages & Engineers	Haynes, L. G., 127 Baxter Rd. Mascot	123007	1965	Premise Match	387m	South East
MOTOR GARAGES & ENGINEERS	Haynes, L. G., 127 Baxter Rd. MASCOT	347348	1961	Premise Match	387m	South East
MOTOR GARAGES & ENGINEERS(M6S6)	Coggins,W. T. Pty. Ltd., 40-42 Kent Rd.MASCOT	337593	1970	Premise Match	402m	North
Motor Garages & Engineers	Coggins, W. T. Pty. Ltd., 40-42 Kent Rd. Mascot	123003	1965	Premise Match	402m	North
MOTOR GARAGES & ENGINEERS(M6S6)	Geary,K. R. (Mascot) Pty. Ltd., 149 O'Riordan St. MASCOT	337853	1970	Premise Match	435m	North East

Business Directory Content Derived from Universal Business Directories (UBD) - Licensed from Hardie Grant

Historical Business Directories

297 King Street, Mascot, NSW 2020

Dry Cleaners, Motor Garages & Service Stations Road or Area Matches

Dry Cleaners, Motor Garages & Service Stations from UBD Business Directories, mapped to a road or an area, within the dataset buffer. Records are mapped to the road when a building number is not supplied, cannot be found, or the road has been renumbered since the directory was published:

Business Activity	Premise	Ref No.	Year	Location Confidence	Distance to Road Corridor or Area
MOTOR GARAGES & SERVICE STATIONS.	Sweetings Service Station, King St., Mascot.	65543	1986	Road Match	0m
MOTOR GARAGES &/OR ENGINEERS &/OR SERVICE STATIONS.	Sweetings Service Station, King St., Mascot.	50915	1978	Road Match	0m
MOTOR GARAGES &/OR ENGINEERS &/OR SERVICE STATIONS. (M6860)	Sweetings Service Station, King St., Mascot. 2020.	57664	1982	Road Match	0m
MOTOR GARAGES & ENGINEERS	May & Blake Chalmers Cres. MASCOT	347663	1961	Road Match	75m
MOTOR GARAGES & ENGINEERS(M6S6)	May & Blake Pty. Ltd.,Chalmers Cres.MASCOT	338225	1970	Road Match	75m
Motor Garages & Engineers	May & Blake, Chalmers Cres. Mascot	123011	1965	Road Match	75m
MOTOR GARAGES & ENGINEERS	May & Blake, Chalmers Cres. MASCOT	347664	1961	Road Match	75m
MOTOR GARAGES &/OR ENGINEERS	Stiff, C. J., 48 Old Botany Rd., Mascot	84432	1950	Road Match	133m
MOTOR GARAGES & ENGINEERS	Coggins, W. T. Pty. Ltd., 210 Kent Rd. MASCOT	346911	1961	Road Match	167m
MOTOR SERVICE STATIONS—PETROL, OIL, Etc.	Coggins, W. T. Pty. Ltd., 210 Kent Rd. MASCOT	350481	1961	Road Match	167m
Motor Garages & Engineers	M.A.N. Automotive Pty. Ltd., 321 Ricketty St. Mascot	123009	1965	Road Match	492m
Motor Garages & Engineers	Midway Service Station, 11-17 Ricketty St. Mascot	123012	1965	Road Match	492m
MOTOR GARAGES & ENGINEERS	Sample Engineering Co. Pty. Ltd., Ricketty St. MASCOT	348092	1961	Road Match	492m
MOTOR GARAGES &/OR ENGINEERS	Sample Engineering Co. Pty. Ltd., Ricketty St., Mascot	84338	1950	Road Match	492m

Business Directory Content Derived from Universal Business Directories (UBD) - Licensed from Hardie Grant

Aerial Imagery 2009

297 King Street, Mascot, NSW 2020



Scale:
0 37.5 75 150
Meters

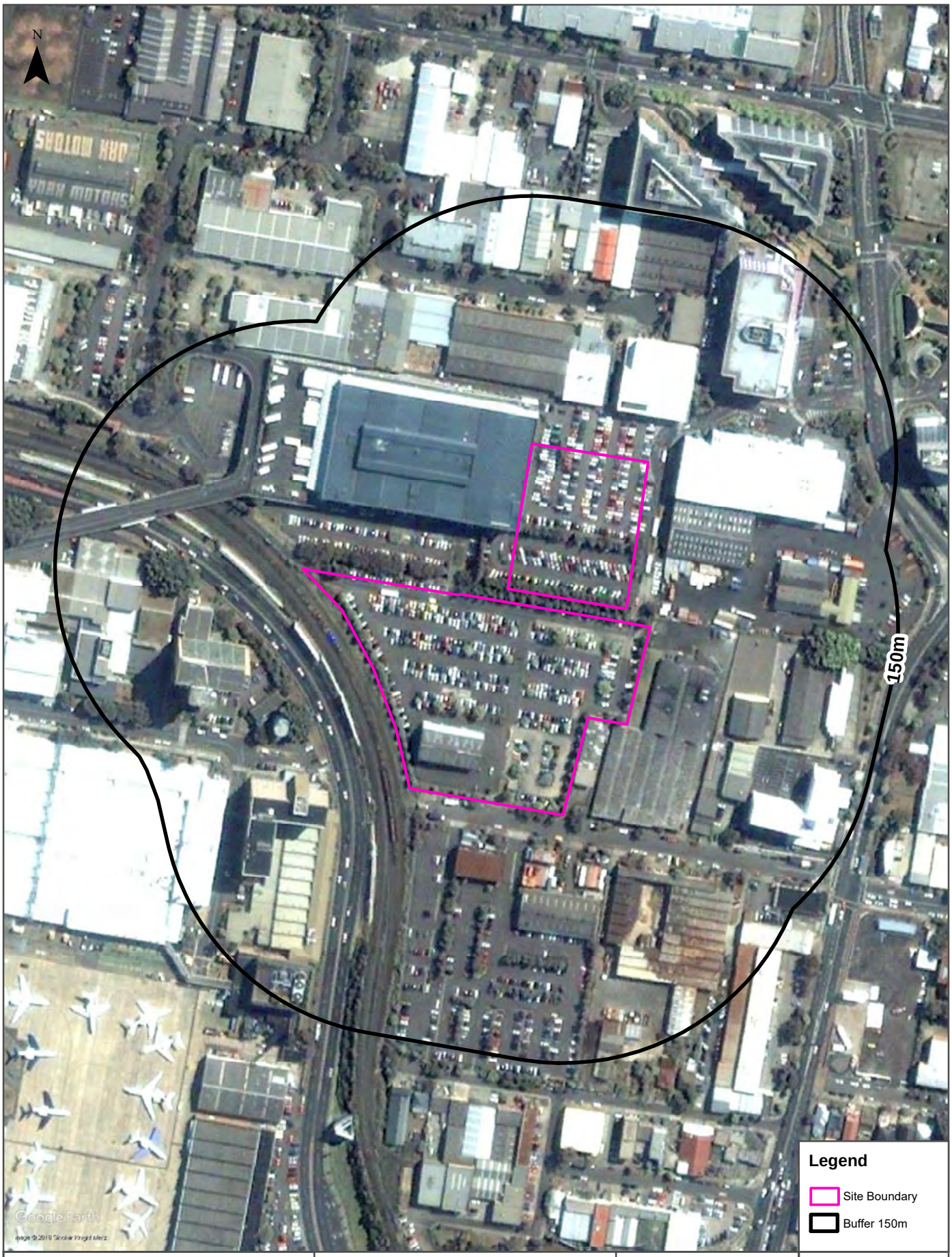
Data Source Aerial Imagery: © 2018 Google Inc, used with permission. Google and the Google logo are registered trademarks of Google Inc.

Coordinate System:
GDA 1994 MGA Zone 56

Date: 05 December 2018

Aerial Imagery 2000

297 King Street, Mascot, NSW 2020



Scale:
0 37.5 75 150
Meters

Data Source Aerial Imagery: © 2018 Google Inc, used with permission. Google and the Google logo are registered trademarks of Google Inc.

Coordinate System:
GDA 1994 MGA Zone 56

Date: 05 December 2018

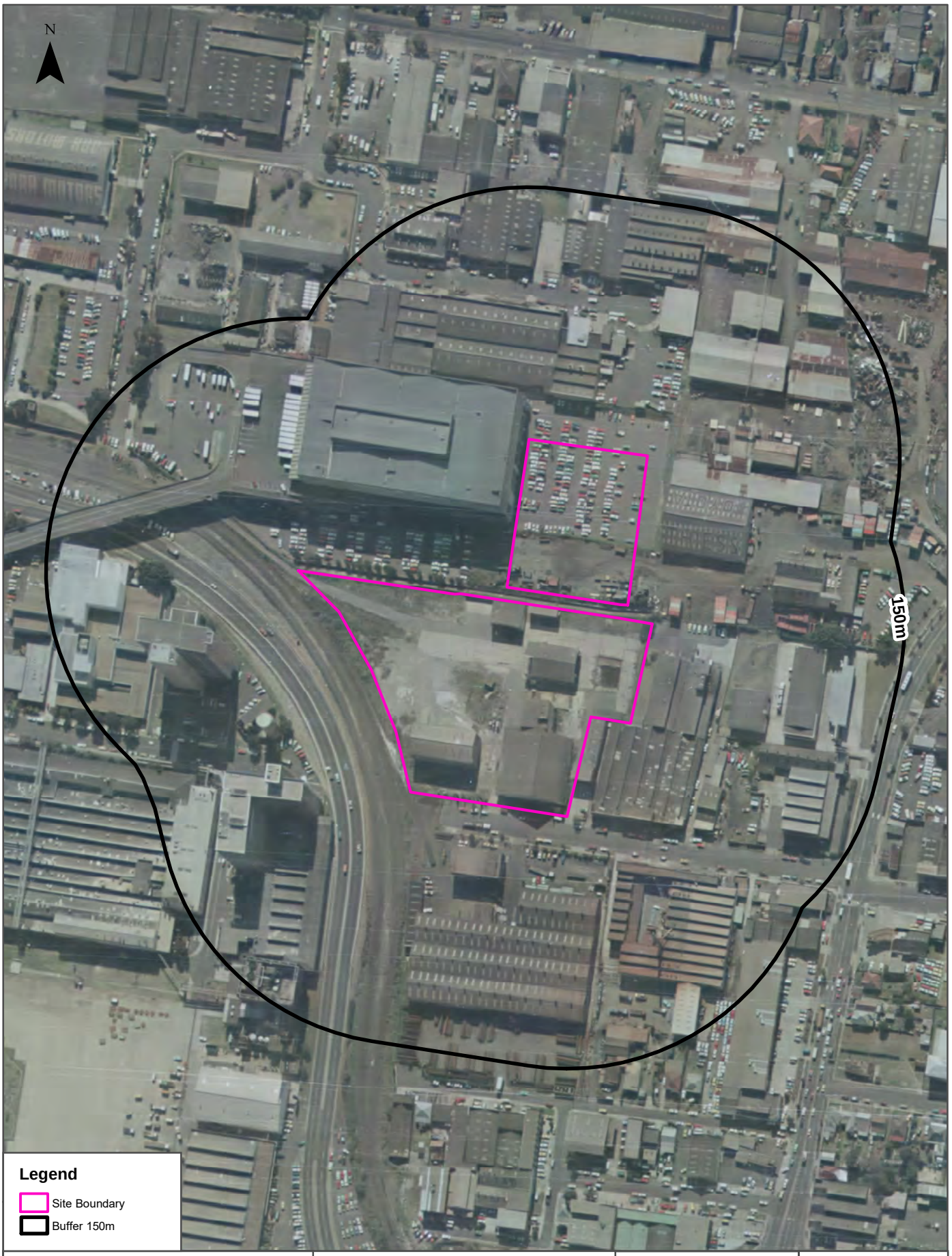
Aerial Imagery 1991

297 King Street, Mascot, NSW 2020



Aerial Imagery 1982

297 King Street, Mascot, NSW 2020



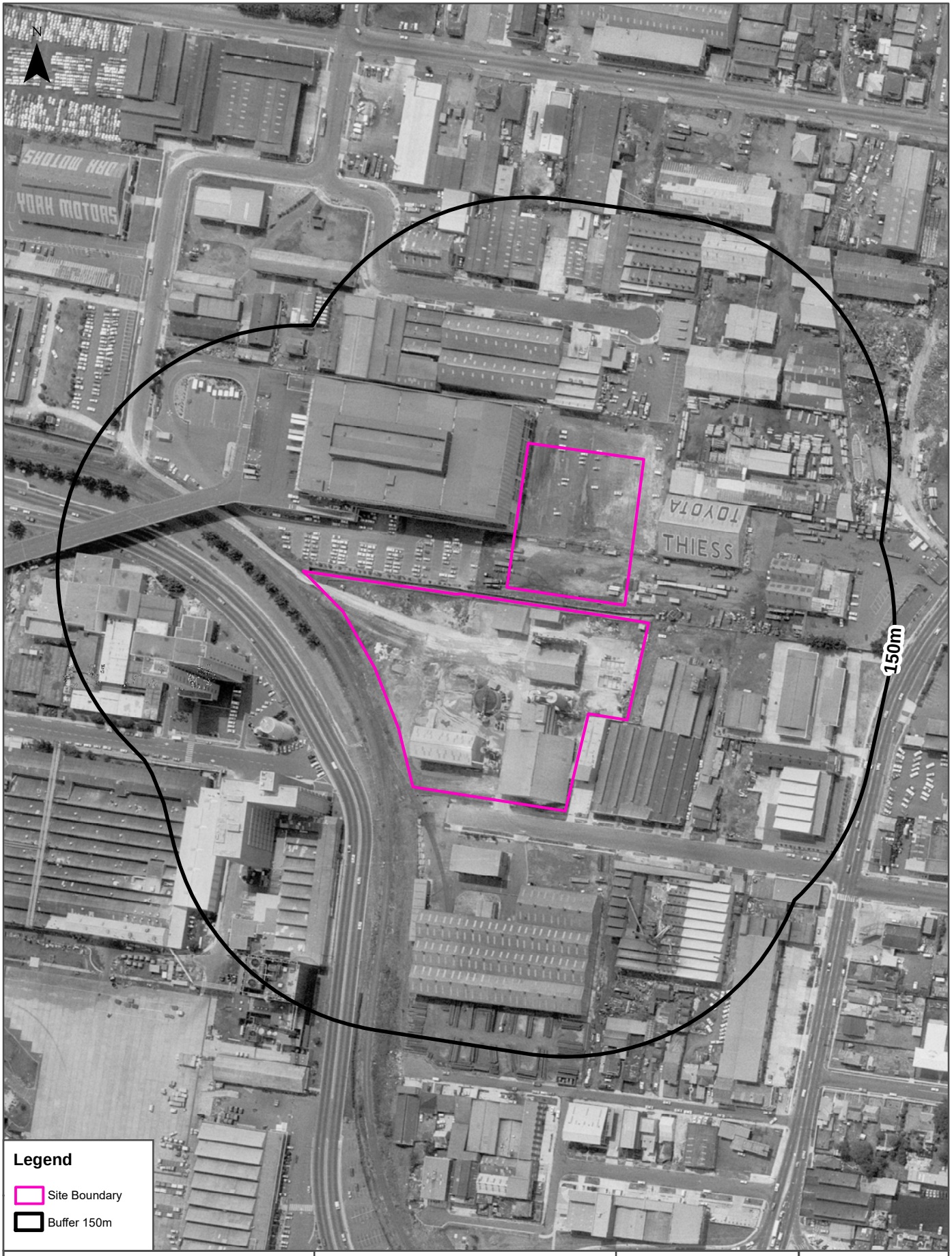
Data Sources: Aerial Imagery © Department of Finance, Services & Innovation

Coordinate System: GDA 1994 MGA Zone 56

Date: 05 December 2018

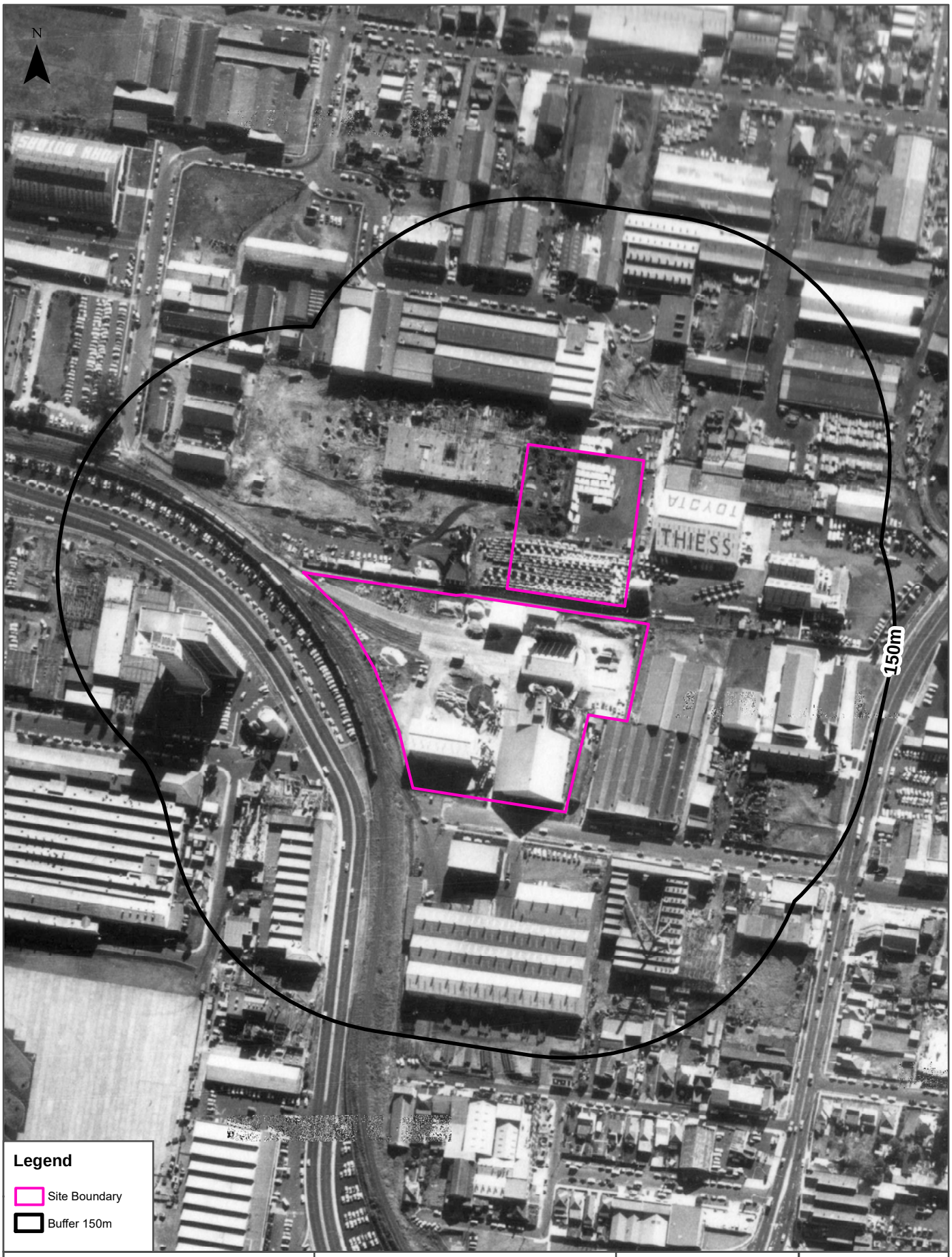
Aerial Imagery 1976

297 King Street, Mascot, NSW 2020



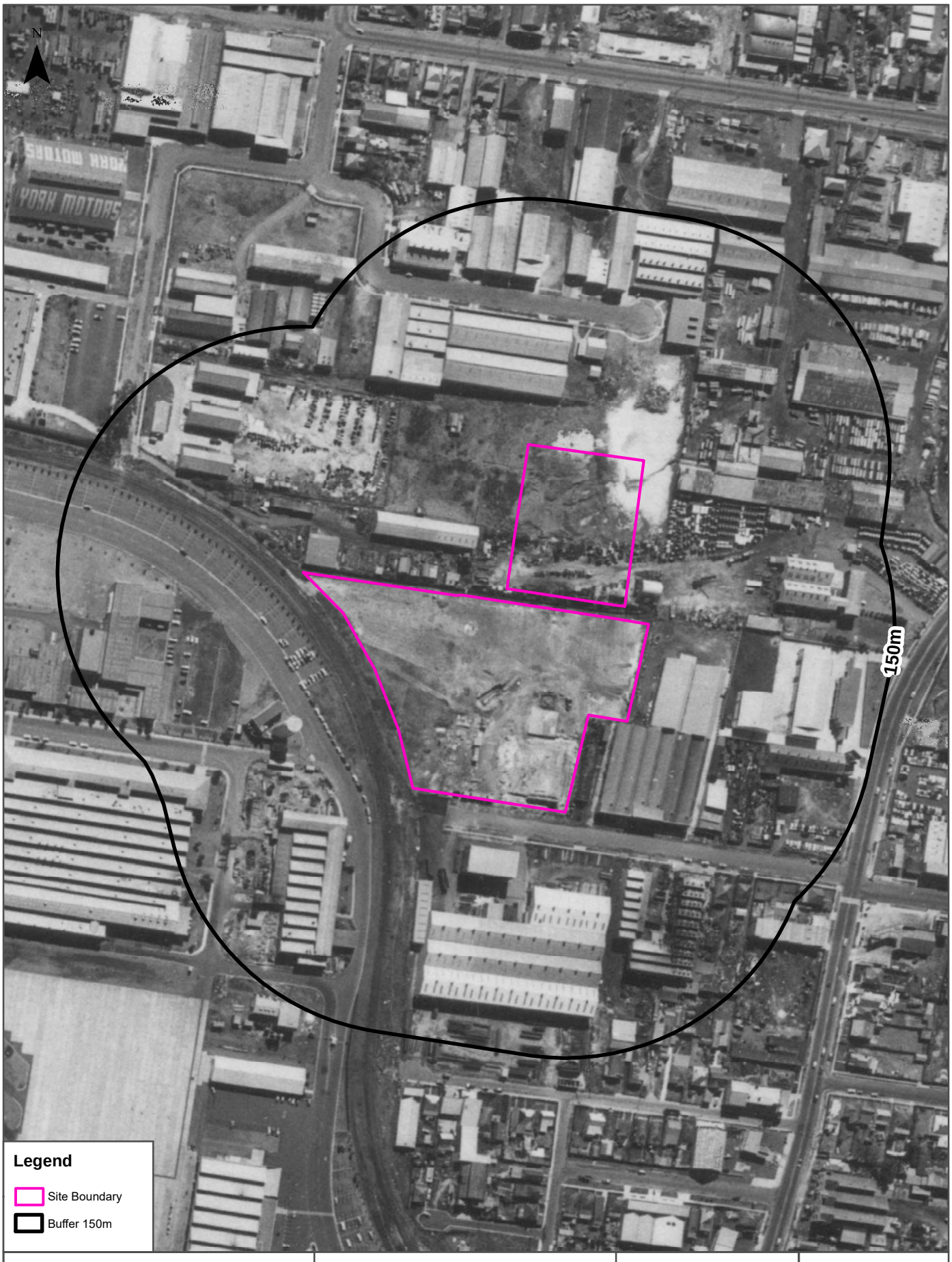
Aerial Imagery 1970

297 King Street, Mascot, NSW 2020



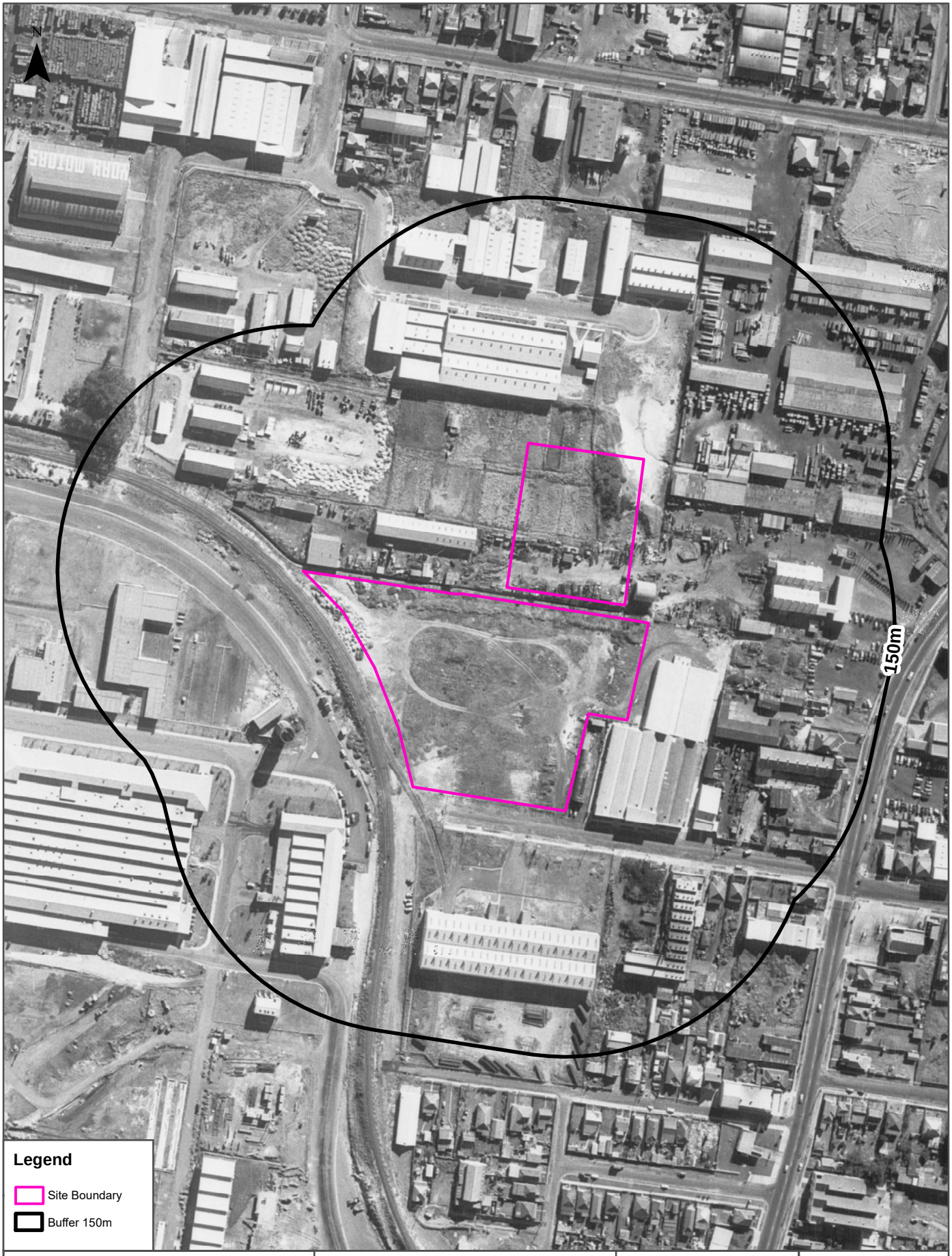
Aerial Imagery 1965

297 King Street, Mascot, NSW 2020



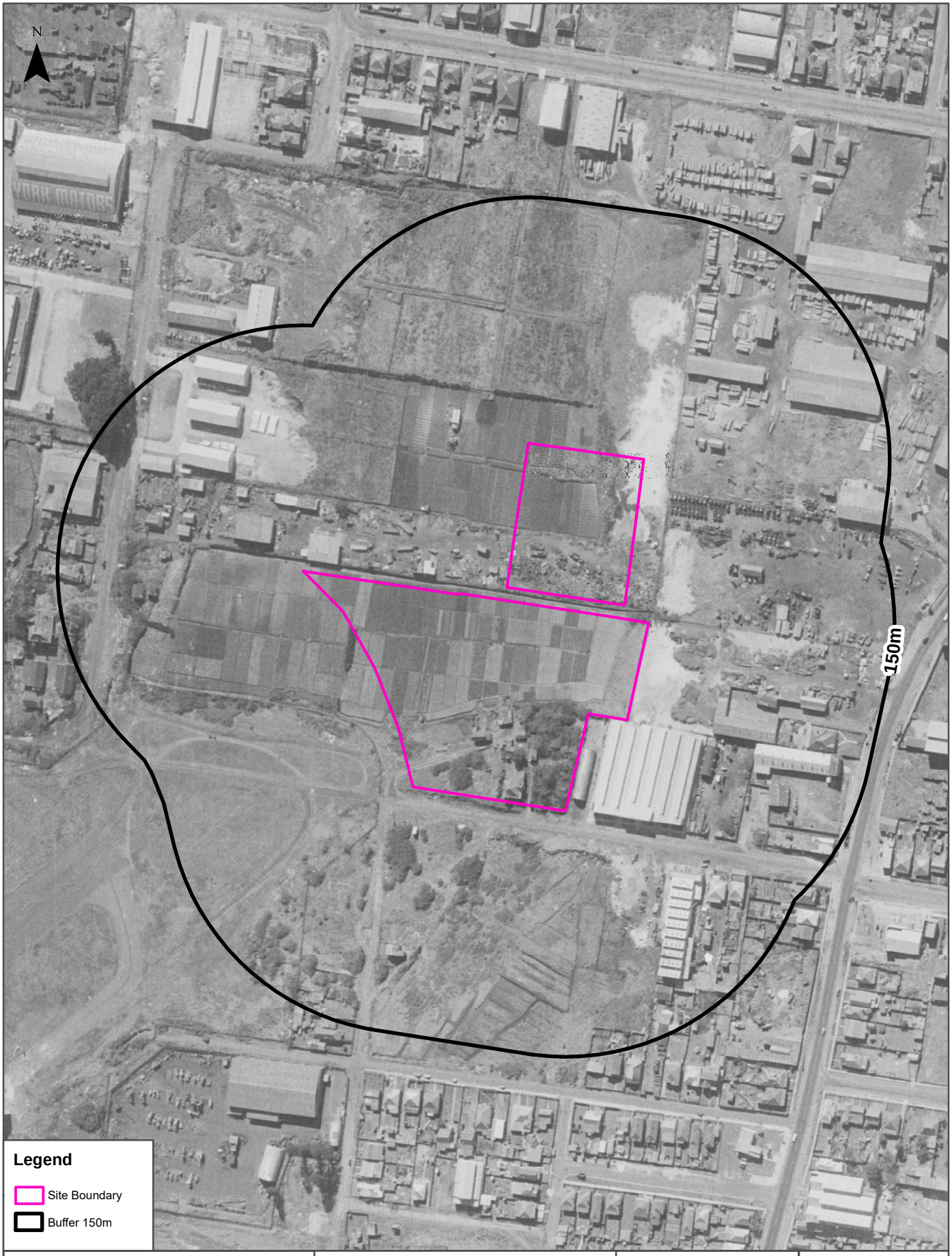
Aerial Imagery 1961

297 King Street, Mascot, NSW 2020



Aerial Imagery 1955

297 King Street, Mascot, NSW 2020



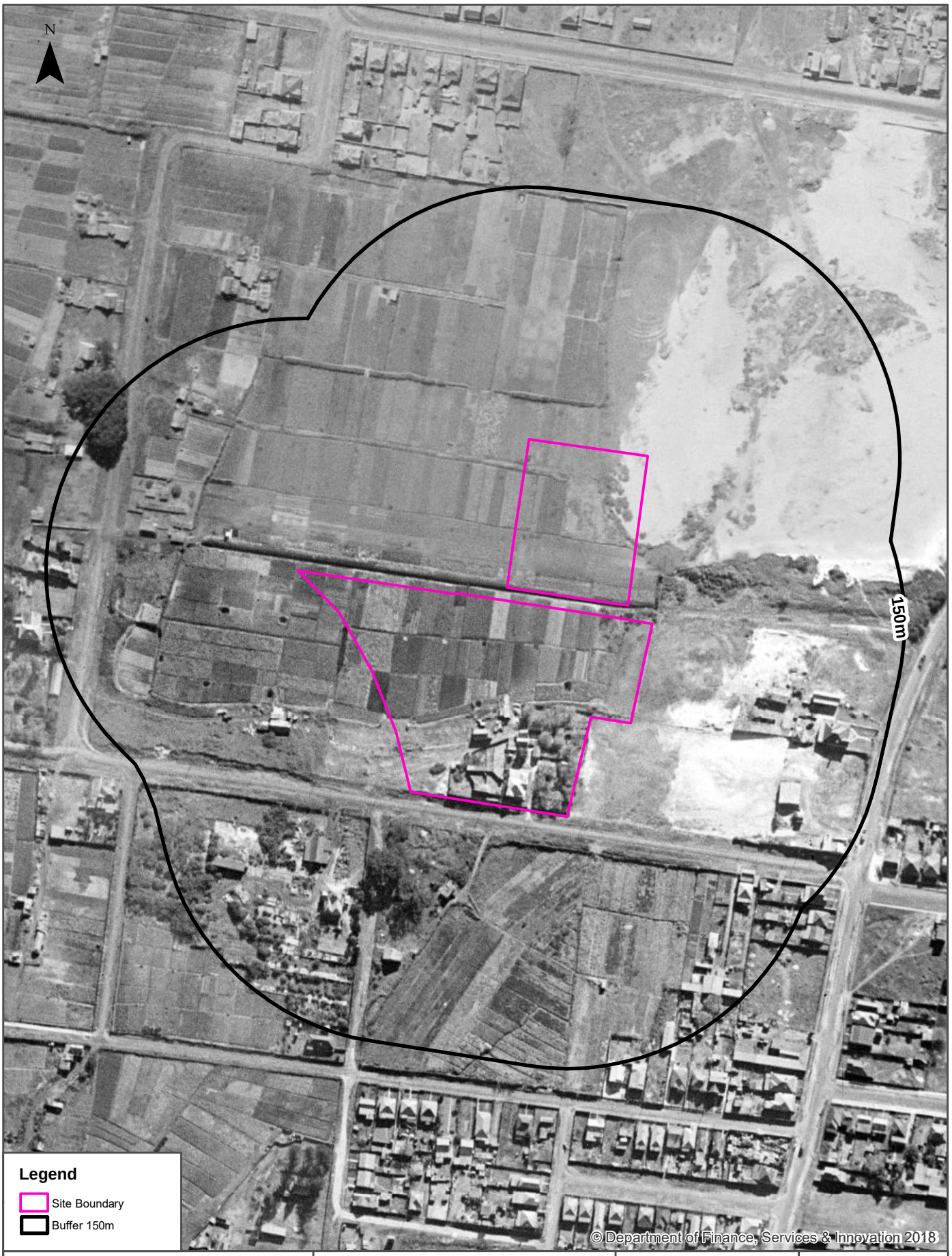
Data Source Aerial Imagery:
© NSW Department of Finance, Services & Innovation

Coordinate System:
GDA 1994 MGA Zone 56

Date: 05 December 2018

Aerial Imagery 1943

297 King Street, Mascot, NSW 2020

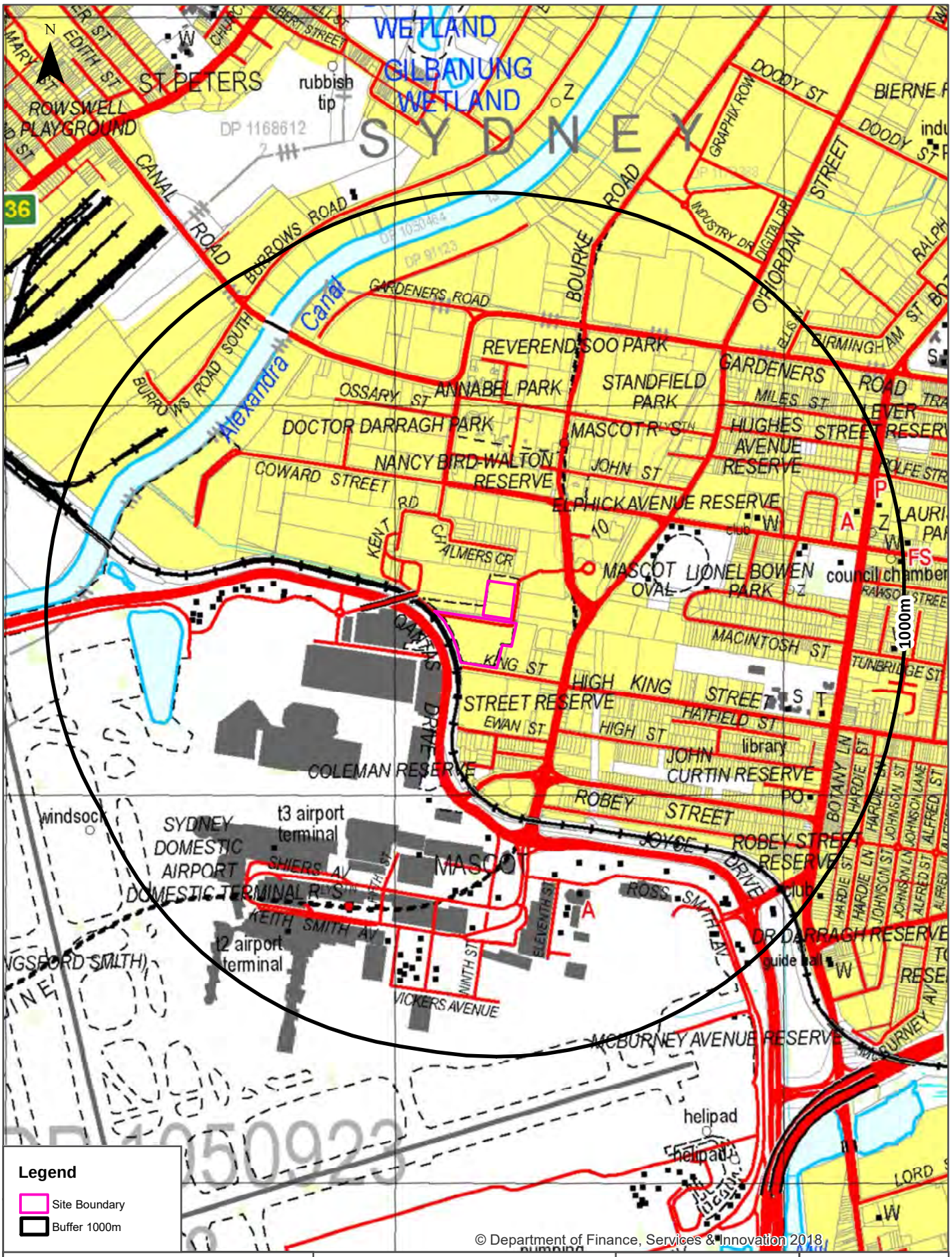


Scale:	Data Sources: Aerial Imagery © Department of Finance, Services & Innovation	Coordinate System: GDA 1994 MGA Zone 56	Date: 05 December 2018

0 25 50 100 150
Meters

Topographic Map 2015

297 King Street, Mascot, NSW 2020



Scale:	Data Sources: Topographic Map Data © NSW Land and Property Information	Coordinate System: GDA 1994 MGA Zone 56	Date: 05 December 2018

Historical Map 1975

297 King Street, Mascot, NSW 2020



Scale: 0 125 250 500 750 1,000 1,250 Meters

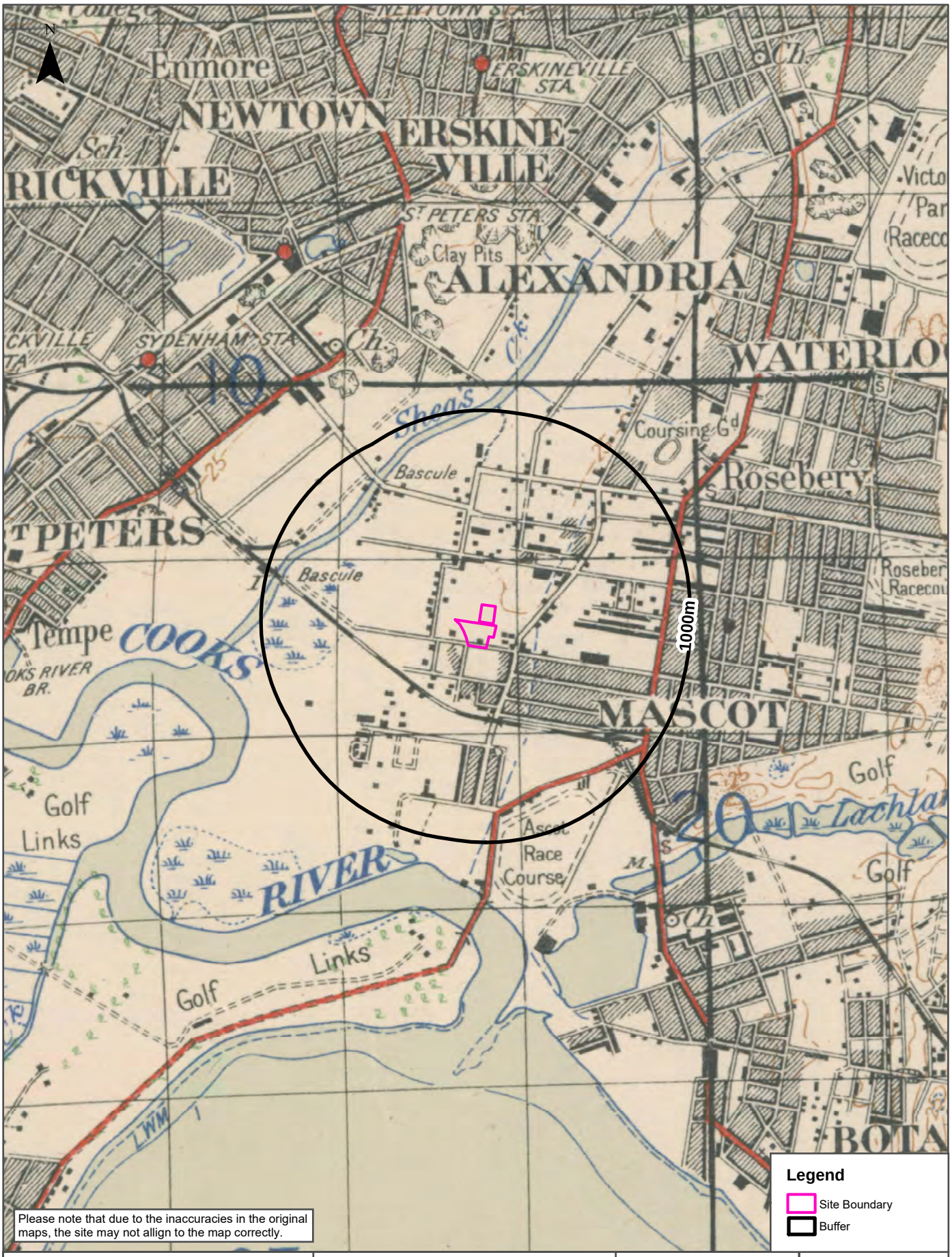
Data Sources: NATMAP 1:100,000
Topographic Maps Geoscience Australia

Coordinate System:
GDA 1994 MGA Zone 56

Date: 05 December 2018

Historical Map 1936

297 King Street, Mascot, NSW 2020

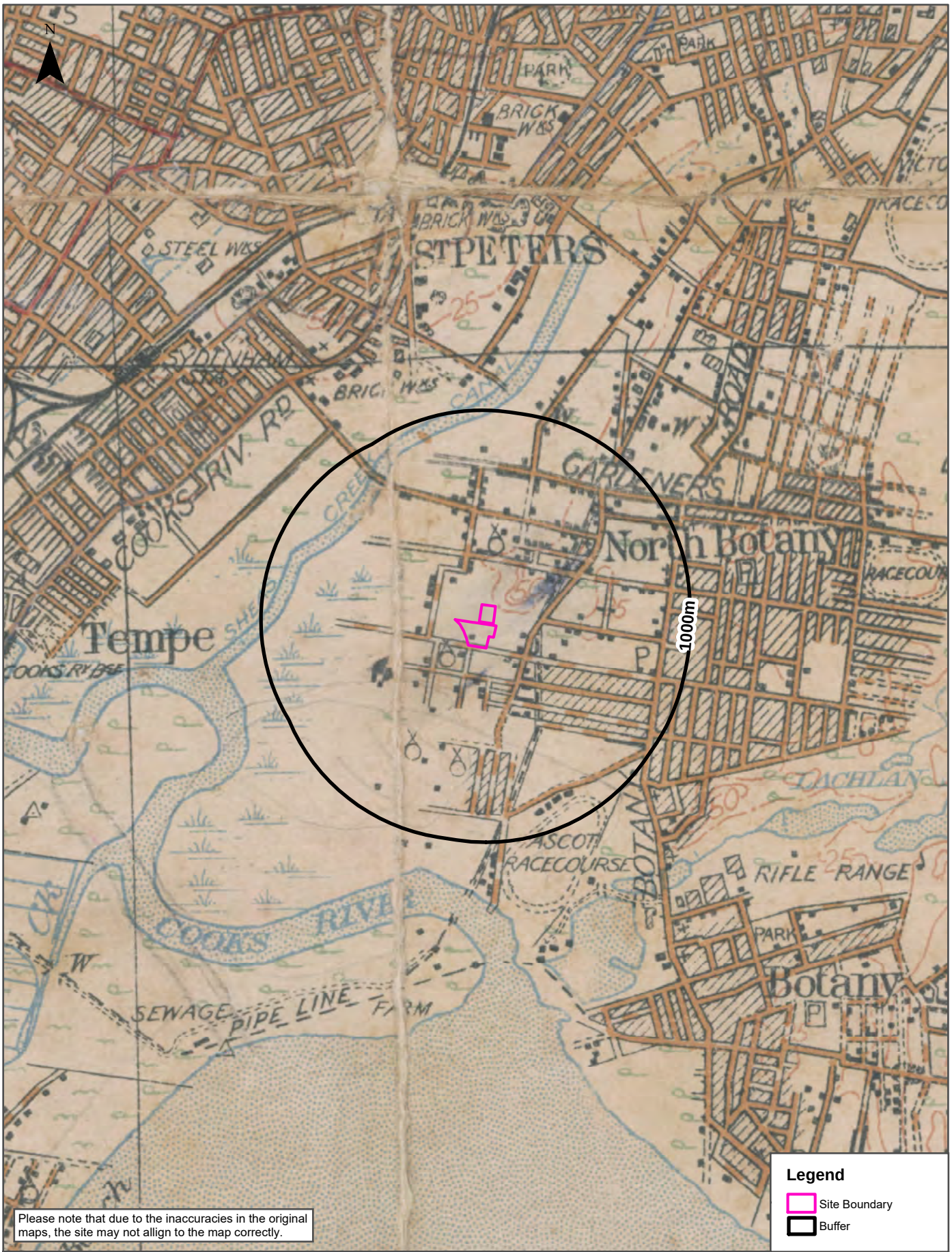


Scale:	Data Sources: Australia 1:63360, Produced by Australian Section Imperial General Staff	Coordinate System: GDA 1994 MGA Zone 56	Date: 05 December 2018

0 125 250 500 750 1,000 1,250 Meters

Historical Map 1917

297 King Street, Mascot, NSW 2020

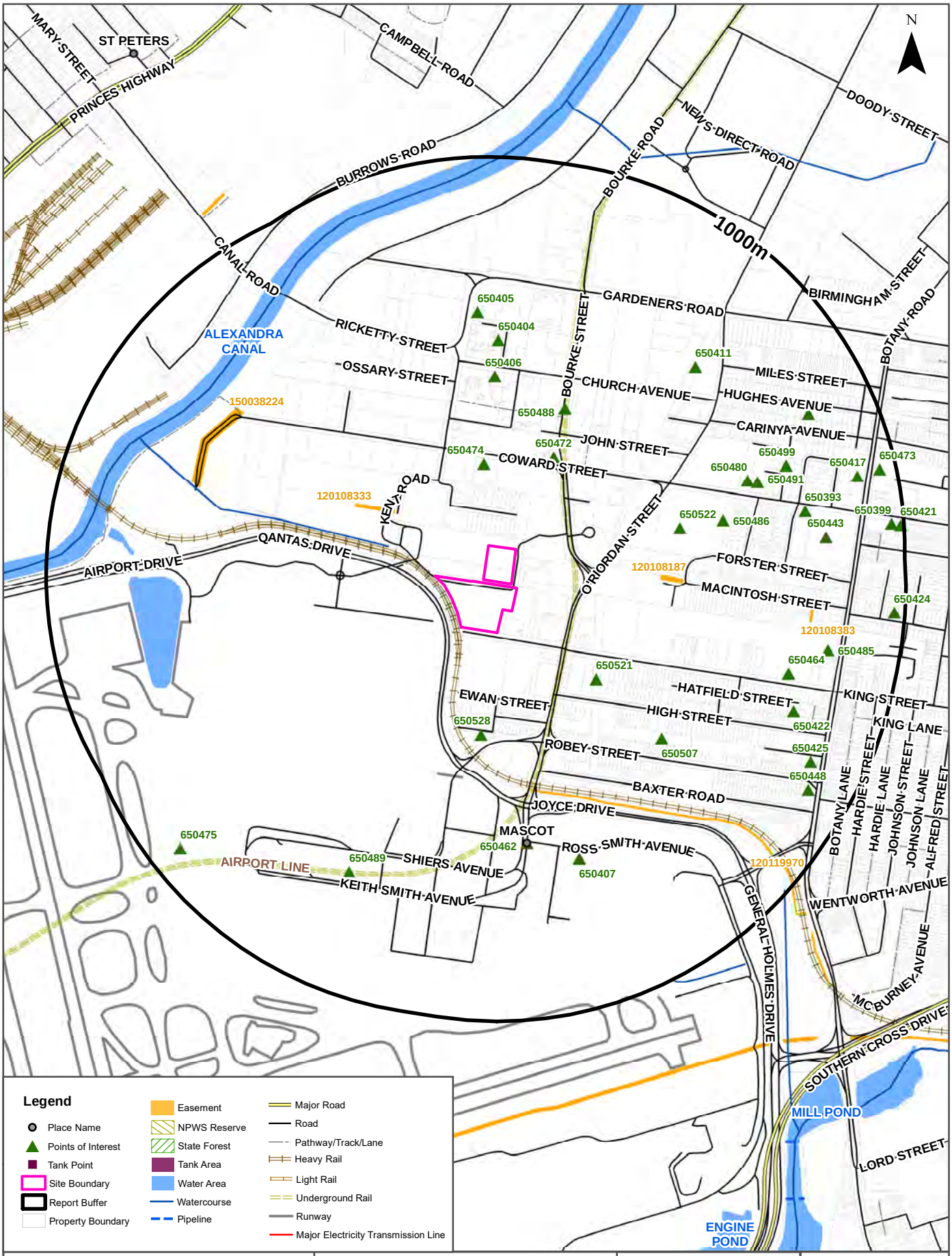


Scale:	Data Sources: Australia 1:63360, Produced by Australian Section Imperial General Staff	Coordinate System: GDA 1994 MGA Zone 56	Date: 05 December 2018

0 125 250 500 750 1,000 1,250 Meters

Topographic Features

297 King Street, Mascot, NSW 2020



Topographic Features

297 King Street, Mascot, NSW 2020

Points of Interest

What Points of Interest exist within the dataset buffer?

Map Id	Feature Type	Label	Distance	Direction
650474	Embassy	CONSULATE OF THE REPUBLIC MOZAMBIQUE	210m	North
650472	Park	NANCY BIRD-WALTON RESERVE	256m	North East
650528	Park	COLEMAN RESERVE	266m	South
650521	Park	HIGH STREET RESERVE	278m	South East
650488	Railway Station	MASCOT RAILWAY STATION	383m	North East
650522	Sports Field	MASCOT OVAL	424m	East
650406	Park	DOCTOR DARRAGH PARK	436m	North
650507	Park	JOHN CURTIN RESERVE	502m	South East
650404	Park	ANNABEL PARK	529m	North
650486	Park	LIONEL BOWEN PARK	537m	East
650462	Suburb	MASCOT	546m	South
650405	Park	REVEREND SOO PARK	600m	North
650407	Ambulance Station	MASCOT AIR AMBULANCE STATION	618m	South
650480	Club	GRAPHIC ARTS CLUB MASCOT	621m	North East
650491	Place Of Worship	GREEK ORTHODOX CHURCH OF ST CATHERINE	644m	East
650411	Park	STANDFIELD PARK	658m	North East
650489	Railway Station	DOMESTIC TERMINAL RAILWAY STATION	692m	South West
650499	Park	ELPHICK AVENUE RESERVE	727m	North East
650464	Primary School	MASCOT PUBLIC SCHOOL	728m	East
650393	Community Facility	MASCOT SENIOR CITIZENS CENTRE	750m	East
650422	Library	MASCOT LIBRARY	768m	East
650443	Park	MASCOT MEMORIAL PARK	797m	East
650485	Preschool	MASCOT PUBLIC SCHOOL PRESCHOOL	815m	East
650436	Park	HUGHES AVENUE RESERVE	828m	North East
650425	Post Office	MASCOT POST OFFICE	859m	South East
650448	Park	ROBEY STREET RESERVE	890m	South East
650417	Ambulance Station	MASCOT AMBULANCE STATION	897m	East
650475	Airport	SYDNEY DOMESTIC AIRPORT	919m	South West
650473	Police Station	MASCOT POLICE STATION	957m	East
650399	Local Government Chambers	THE COUNCIL OF THE CITY OF BOTANY BAY	967m	East

Map Id	Feature Type	Label	Distance	Direction
650424	Place Of Worship	ORTHODOX CHURCH	971m	East
650421	Fire Station	MASCOT FIRE STATION	991m	East

Topographic Data Source: © Land and Property Information (2015)
Creative Commons 3.0 © Commonwealth of Australia http://creativecommons.org/licenses/by/3.0/au/deed.en

Topographic Features

297 King Street, Mascot, NSW 2020

Tanks (Areas)

What are the Tank Areas located within the dataset buffer?
Note. The large majority of tank features provided by LPI are derived from aerial imagery & are therefore primarily above ground tanks.

Map Id	Tank Type	Status	Name	Feature Currency	Distance	Direction
	No records in buffer					

Tanks (Points)

What are the Tank Points located within the dataset buffer?
Note. The large majority of tank features provided by LPI are derived from aerial imagery & are therefore primarily above ground tanks.

Map Id	Tank Type	Status	Name	Feature Currency	Distance	Direction
	No records in buffer					

Tanks Data Source: © Land and Property Information (2015)
Creative Commons 3.0 © Commonwealth of Australia http://creativecommons.org/licenses/by/3.0/au/deed.en

Major Easements

What Major Easements exist within the dataset buffer?
Note. Easements provided by LPI are not at the detail of local governments. They are limited to major easements such as Right of Carriageway, Electrical Lines (66kVa etc.), Easement to drain water & Significant subterranean pipelines (gas, water etc.).

Map Id	Easement Class	Easement Type	Easement Width	Distance	Direction
120108333	Primary	Undefined		193m	North West
120108187	Primary	Undefined		371m	East
120119970	Primary	Undefined		414m	South East
150038224	Primary	Right of way		647m	North West
120108383	Primary	Undefined		757m	East

Easements Data Source: © Land and Property Information (2015)
Creative Commons 3.0 © Commonwealth of Australia http://creativecommons.org/licenses/by/3.0/au/deed.en

Topographic Features

297 King Street, Mascot, NSW 2020

State Forest

What State Forest exist within the dataset buffer?

State Forest Number	State Forest Name	Distance	Direction
N/A	No records in buffer		

State Forest Data Source: © NSW Department of Finance, Services & Innovation (2018)
Creative Commons 3.0 © Commonwealth of Australia http://creativecommons.org/licenses/by/3.0/au/deed.en

National Parks and Wildlife Service Reserves

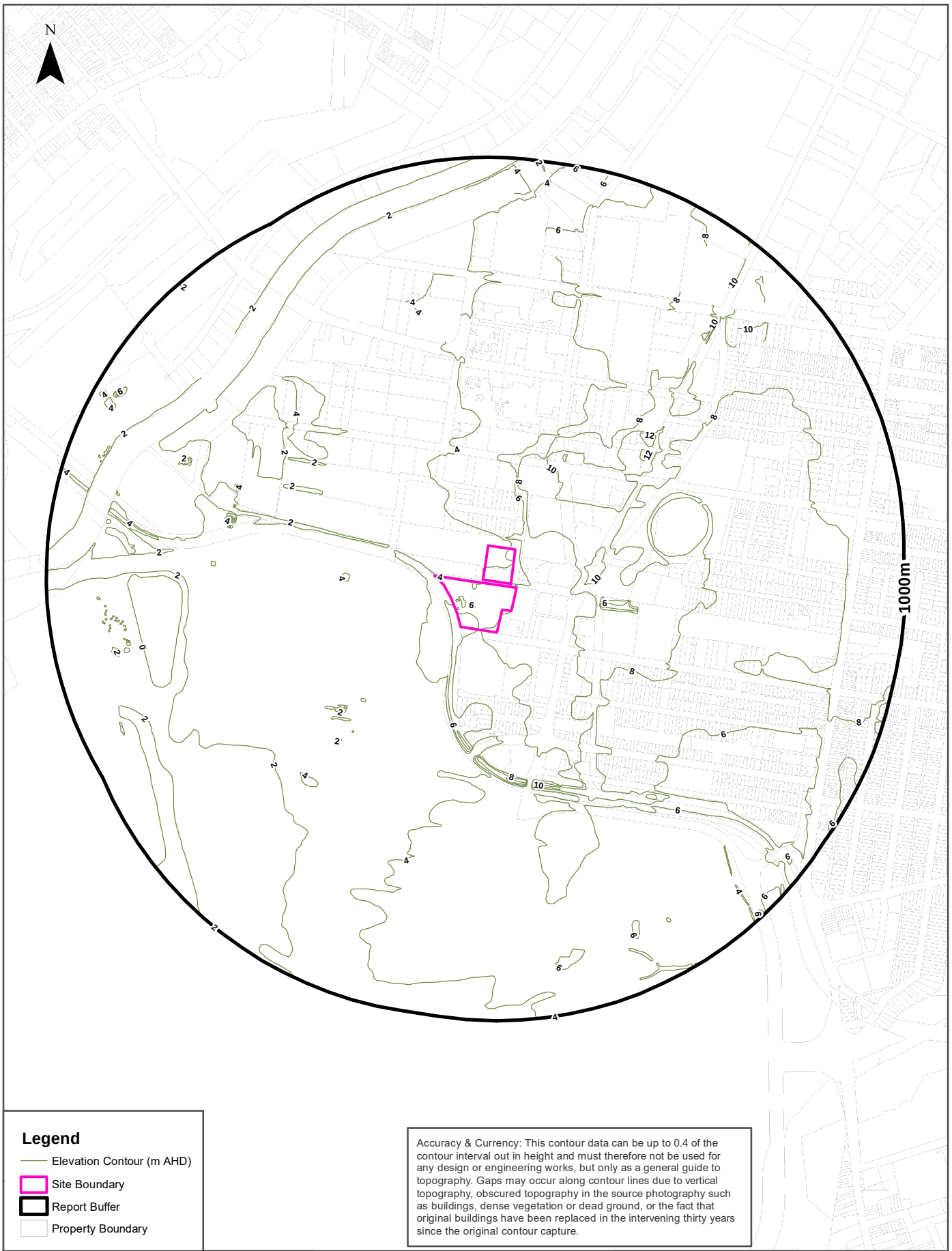
What NPWS Reserves exist within the dataset buffer?

Reserve Number	Reserve Type	Reserve Name	Gazetted Date	Distance	Direction
N/A	No records in buffer				

NPWS Data Source: © NSW Department of Finance, Services & Innovation (2018)
Creative Commons 3.0 © Commonwealth of Australia http://creativecommons.org/licenses/by/3.0/au/deed.en

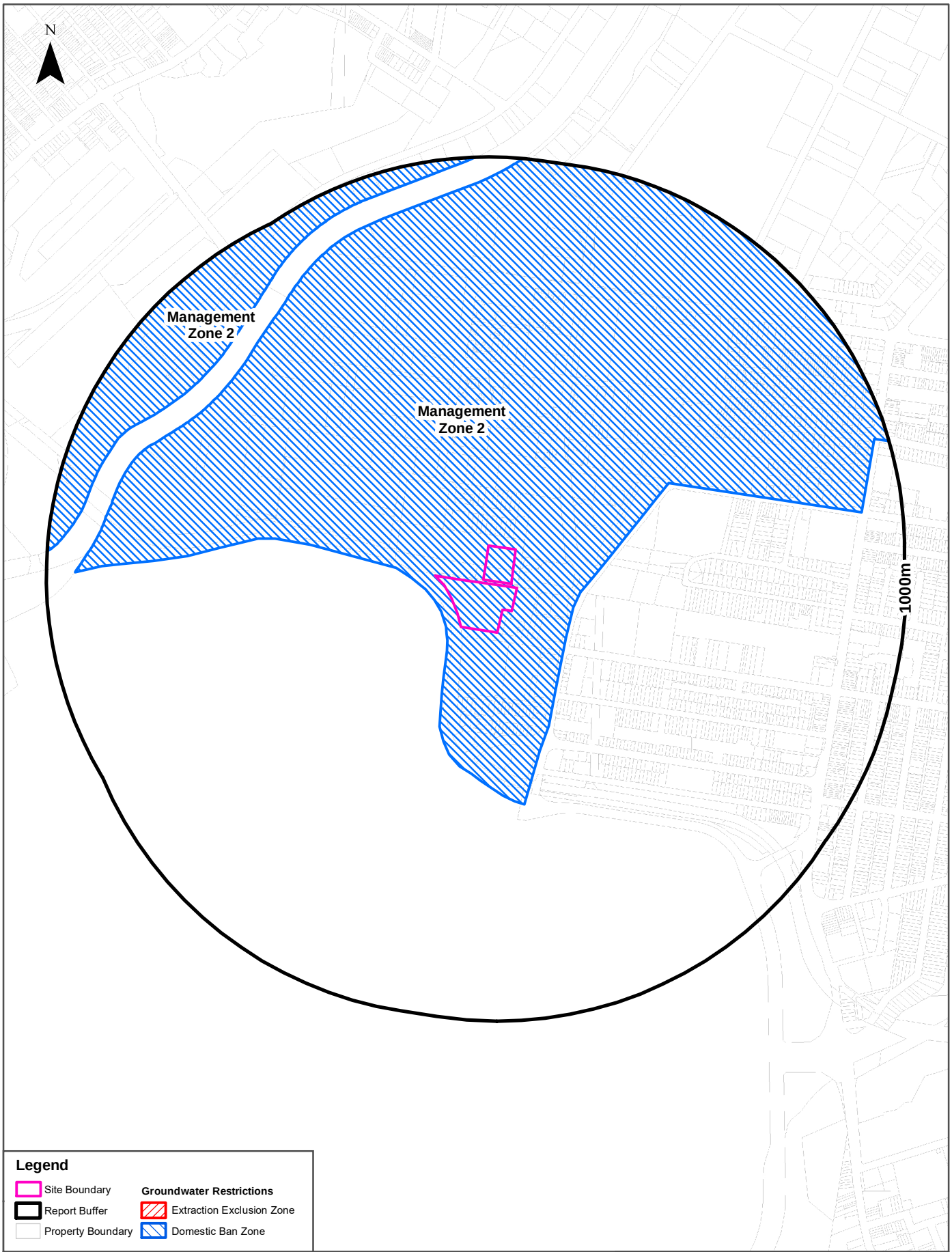
Elevation Contours (m AHD)

297 King Street, Mascot, NSW 2020



Botany Groundwater Management Zones

297 King Street, Mascot, NSW 2020



Hydrogeology & Groundwater

297 King Street, Mascot, NSW 2020

Hydrogeology

Description of aquifers on-site:

Description
Porous, extensive highly productive aquifers

Description of aquifers within the dataset buffer:

Description
Porous, extensive highly productive aquifers

Hydrogeology Map of Australia : Commonwealth of Australia (Geoscience Australia)
Creative Commons 3.0 © Commonwealth of Australia http://creativecommons.org/licenses/by/3.0/au/deed.en

Botany Groundwater Management Zones

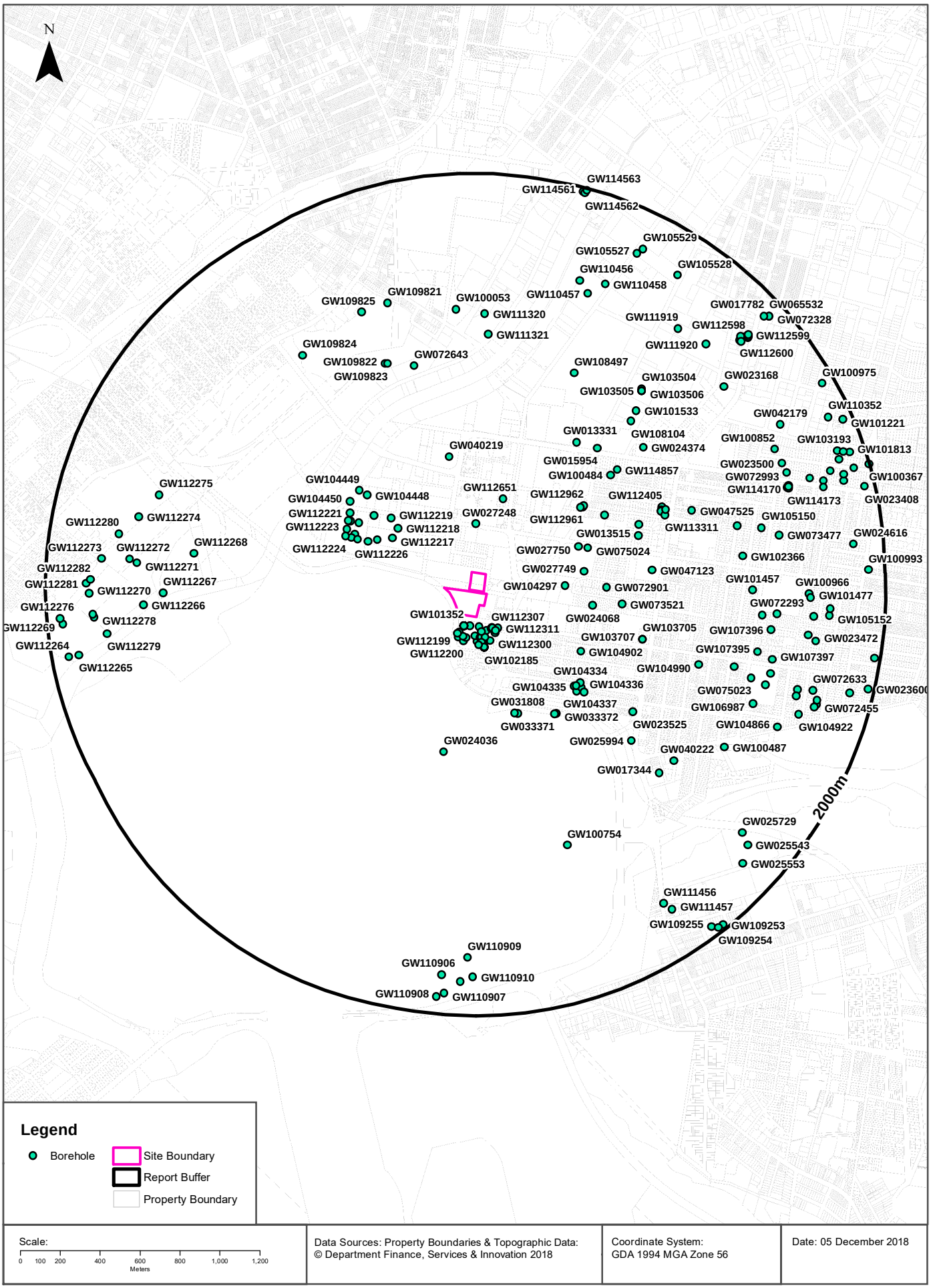
Groundwater management zones relating to the Botany Sand Beds aquifer within the dataset buffer:

Management Zone No.	Restriction	Distance	Direction
2	Domestic ban	0m	Onsite

Botany Groundwater Management Zones Data Source : NSW Department of Primary Industries

Groundwater Boreholes

297 King Street, Mascot, NSW 2020



Hydrogeology & Groundwater

297 King Street, Mascot, NSW 2020

Groundwater Boreholes

Boreholes within the dataset buffer:

GW No.	Licence No	Work Type	Owner Type	Authorised Purpose	Intended Purpose	Name	Complete Date	Final Depth (m)	Drilled Depth (m)	Salinity (mg/L)	SWL (m)	Yield (L/s)	Elev (AHD)	Dist	Dir
GW112 203	10BL156 771	Bore	Private	Monitoring Bore	Monitoring Bore		27/05/1996	6.00	6.00					50m	South
GW112 202	10BL156 771	Bore	Private	Monitoring Bore	Monitoring Bore		27/05/1996	5.90	5.90					52m	South
GW101 353	10BL157 307	Bore	Private	Monitoring Bore	Monitoring Bore		22/11/1995	6.00	6.00					53m	South
GW101 351	10BL157 307	Bore	Private	Monitoring Bore	Monitoring Bore		22/11/1995	5.05	5.05					53m	South
GW101 352	10BL157 307	Bore	Private	Monitoring Bore	Monitoring Bore		22/11/1995	5.70	5.70					53m	South
GW101 350	10BL157 307	Bore	Private	Monitoring Bore	Monitoring Bore		22/11/1995	5.90	5.90					53m	South
GW101 359	10BL157 307	Bore	Private	Monitoring Bore	Monitoring Bore		22/11/1995	6.00	6.00					54m	South
GW101 362	10BL157 307	Bore	Private	Monitoring Bore	Monitoring Bore		22/11/1995	5.90	5.90					54m	South
GW101 361	10BL157 307	Bore	Private	Monitoring Bore	Monitoring Bore		22/11/1995	4.30	4.30					54m	South
GW101 354	10BL157 307	Bore	Private	Monitoring Bore	Monitoring Bore		22/11/1995	6.00	6.00					54m	South
GW101 360	10BL157 307	Bore	Private	Monitoring Bore	Monitoring Bore		22/11/1995	6.00	6.00					54m	South
GW101 358	10BL157 307	Bore	Private	Monitoring Bore	Monitoring Bore		22/11/1995	6.00	6.00					54m	South
GW101 357	10BL157 307	Bore	Private	Monitoring Bore	Monitoring Bore		22/11/1995	5.90	5.90					54m	South
GW101 356	10BL157 307	Bore	Private	Monitoring Bore	Monitoring Bore		22/11/1995	5.60	5.60					54m	South
GW101 355	10BL157 307	Bore	Private	Monitoring Bore	Monitoring Bore		22/11/1995	6.00	6.00					54m	South
GW112 306	10BL160 586	Bore	Private	Monitoring Bore	Monitoring Bore		22/01/2002	4.00	4.00					79m	South
GW112 291	10BL160 586	Bore	Private	Monitoring Bore	Monitoring Bore		14/01/2002	6.00	6.00					86m	South East
GW112 204	10BL156 771	Bore	Private	Monitoring Bore	Monitoring Bore		27/05/1996	6.00	6.00					89m	South
GW112 307	10BL160 586	Bore	Private	Monitoring Bore	Monitoring Bore		22/01/2002	4.00	4.00					96m	South East
GW112 198	10BL156 771	Bore	Private	Monitoring Bore	Monitoring Bore		27/05/1996	6.00	6.00					96m	South
GW112 309	10BL160 586	Bore	Private	Monitoring Bore	Monitoring Bore		22/01/2002	4.00	4.00					96m	South East
GW112 196	10BL156 771	Bore	Private	Monitoring Bore	Monitoring Bore		27/07/1996	5.05	5.05					98m	South
GW112 308	10BL160 586	Bore	Private	Monitoring Bore	Monitoring Bore		23/01/2002	6.00	6.00					99m	South East
GW112 305	10BL160 586	Bore	Private	Monitoring Bore	Monitoring Bore		21/01/2002	4.00	4.00					106m	South
GW112 301	10BL160 586	Bore	Private	Monitoring Bore	Monitoring Bore		22/01/2002	6.00	6.00					106m	South
GW112 304	10BL160 586	Bore	Private	Monitoring Bore	Monitoring Bore		22/01/2002	4.00	4.00					108m	South
GW112 195	10BL156 771	Bore	Private	Monitoring Bore	Monitoring Bore		27/05/1996	5.90						109m	South

GW No.	Licence No	Work Type	Owner Type	Authorised Purpose	Intended Purpose	Name	Complete Date	Final Depth (m)	Drilled Depth (m)	Salinity (mg/L)	SWL (m)	Yield (L/s)	Elev (AHD)	Dist	Dir
GW112303	10BL160586	Bore	Private	Monitoring Bore	Monitoring Bore		22/01/2001	4.00	4.00					111m	South
GW112302	10BL160586	Bore	Private	Monitoring Bore	Monitoring Bore		22/01/2002	4.00	4.00					112m	South
GW112197	10BL156771	Bore	Private	Monitoring Bore	Monitoring Bore		27/05/1996	5.70	5.70					113m	South
GW112199	10BL156771	Bore	Private	Monitoring Bore	Monitoring Bore		27/05/1996	6.00	6.00					115m	South
GW112298	10BL160586	Bore	Private	Monitoring Bore	Monitoring Bore		21/01/2002	4.00	4.00					118m	South East
GW112310	10BL160586	Bore	Private	Monitoring Bore	Monitoring Bore		23/01/2002	6.00	6.00					122m	South East
GW112311	10BL160586	Bore	Private	Monitoring Bore	Monitoring Bore		24/01/2002	4.00	4.00					123m	South East
GW112299	10BL160586	Bore	Private	Monitoring Bore	Monitoring Bore		21/01/2002	4.00	4.00					124m	South East
GW112201	10BL156771	Bore	Private	Monitoring Bore	Monitoring Bore		27/05/1996	5.60	5.60					124m	South
GW112294	10BL160586	Bore	Private	Monitoring Bore	Monitoring Bore		21/01/2002	4.00	4.00					127m	South
GW112292	10BL160586	Bore	Private	Monitoring Bore	Monitoring Bore		21/01/2002	4.00	4.00					128m	South
GW112200	10BL156771	Bore	Private	Monitoring Bore	Monitoring Bore		27/05/1996	6.00	6.00					131m	South
GW112295	10BL160586	Bore	Private	Monitoring Bore	Monitoring Bore		21/01/2001	4.00	4.00					131m	South
GW112293	10BL160586	Bore	Private	Monitoring Bore	Monitoring Bore		21/01/2002	4.00	4.00					132m	South
GW112300	10BL160586	Bore	Private	Monitoring Bore	Monitoring Bore		21/01/2002	4.00	4.00					139m	South East
GW112296	10BL160586	Bore	Private	Monitoring Bore	Monitoring Bore		21/01/2002	6.00	6.00					141m	South
GW112297	10BL160586	Bore	Private	Monitoring Bore	Monitoring Bore		21/01/2002	6.00	6.00					142m	South
GW102188	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		22/03/1999	4.00	4.00					158m	South
GW102194	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		22/03/1999	3.70	3.70					158m	South
GW102191	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		18/03/1999	4.00	4.00					158m	South
GW102173	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		06/01/1999	4.50	4.50					158m	South
GW102168	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		07/01/1999	5.00	5.00					158m	South
GW102198	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		22/03/1999	3.50	3.50					158m	South
GW102184	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		18/03/1999	4.20	4.20					158m	South
GW102171	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		07/01/1999	6.00	6.00					158m	South
GW102193	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		22/03/1999	3.90	3.90					158m	South
GW102178	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		22/03/1999	4.40	4.40					158m	South
GW102169	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		07/01/1999	4.50	4.50					158m	South
GW102196	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		22/03/1999	3.60	3.60					158m	South
GW102192	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		19/03/1999	4.00	4.00					158m	South
GW102186	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		22/03/1999	4.20	4.20					158m	South
GW102199	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		22/03/1999	3.50	3.50					159m	South
GW102176	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		06/01/1999	4.50	4.50					159m	South
GW102187	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		22/03/1999	4.20	4.20					159m	South

GW No.	Licence No	Work Type	Owner Type	Authorised Purpose	Intended Purpose	Name	Complete Date	Final Depth (m)	Drilled Depth (m)	Salinity (mg/L)	SWL (m)	Yield (L/s)	Elev (AHD)	Dist	Dir
GW102195	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		22/03/1999	3.60	3.60					159m	South
GW102204	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		22/03/1999	3.30	3.30					159m	South
GW102189	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		22/03/1999	4.00	4.00					159m	South
GW102200	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		19/03/1999	3.50	3.50					159m	South
GW102205	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		22/03/1999	3.30	3.30					159m	South
GW102160	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		07/01/1999	5.00	5.00					159m	South
GW102164	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		07/01/1999	5.00	5.00					159m	South
GW102203	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		18/03/1999	3.50	3.50					159m	South
GW102190	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		18/03/1999	4.00	4.00					159m	South
GW102172	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		06/01/1999	4.50	4.50					159m	South
GW102162	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		07/01/1999	5.00	5.00					159m	South
GW102197	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		22/03/1999	3.60	3.60					159m	South
GW102201	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		18/03/1999	3.50	3.50					159m	South
GW102165	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		07/01/1999	5.00	5.00					159m	South
GW102185	10BL159044	Bore	Private	Monitoring Bore	Monitoring Bore		18/03/1999	4.20	4.20					159m	South
GW027248	10BL020568	Spear	Private	Industrial	Industrial		01/11/1965	4.80	4.90					243m	North
GW112217	10BL160943	Bore	Private	Monitoring Bore	Monitoring Bore		03/12/2002	4.10	4.10					359m	North West
GW112218	10BL160943	Bore	Private	Monitoring Bore	Monitoring Bore		03/12/2002	4.00	4.00					376m	North West
GW112651	10BL604737	Bore	Private	Dewatering (groundwater)	Dewatering (groundwater)		23/12/2011	6.00	6.00					388m	North
GW104297	10BL156208, 10WA113023	Bore	Private	Domestic	Domestic		20/12/1994		42.00		4.00	0.400		398m	East
GW112227	10BL160943	Bore	Private	Monitoring Bore	Monitoring Bore		03/12/2002	3.50	3.50					412m	North West
GW112219	10BL160943	Bore	Private	Monitoring Bore	Monitoring Bore		03/12/2002	4.00	4.00					439m	North West
GW112226	10BL160943	Bore	Private	Monitoring Bore	Monitoring Bore		03/12/2002	4.40	4.40					446m	North West
GW027750	10BL021266, 10WA114789	Bore	Local Govt	Recreation (groundwater)	Recreation (groundwater)		01/12/1965	17.30	17.40					484m	North East
GW027749	10BL021267	Bore	Local Govt	Irrigation	Recreation (groundwater)		01/12/1965	16.40	16.50					492m	East
GW112225	10BL160943	Bore	Private	Monitoring Bore	Monitoring Bore		03/12/2002	4.10	4.10					496m	North West
GW112220	10BL160943	Bore	Private	Monitoring Bore	Monitoring Bore		03/12/2002	4.00	4.00					505m	North West
GW024655	10BL018264	Bore	Private	Industrial	General Use		01/06/1966	9.10	9.10					519m	South
GW112229	10BL160943	Bore	Private	Monitoring Bore	Monitoring Bore		03/12/2002	4.00	4.00					523m	North West
GW031808	10BL024739	(Unknown)	P.W.D.	Test Bore	G/water Xplore		01/06/1969	18.20	18.30					526m	South

GW No.	Licence No	Work Type	Owner Type	Authorised Purpose	Intended Purpose	Name	Complete Date	Final Depth (m)	Drilled Depth (m)	Salinity (mg/L)	SWL (m)	Yield (L/s)	Elev (AHD)	Dist	Dir
GW075 024		Bore	NSW Office of Water		Monitoring Bore	BOTANY BOREFIELD AT MASCOT OVAL	16/07/1998	19.50	20.50		0.76		8.48	529m	East
GW112 228	10BL160 943	Bore	Private	Monitoring Bore	Monitoring Bore		03/12/2002	4.00	4.00					530m	North West
GW024 068	10BL017 315, 10WA11 2890	Spear	Private	Domestic	Domestic		01/05/1966	4.20	4.30					536m	East
GW112 231	10BL160 943	Bore	Private	Monitoring Bore	Monitoring Bore		03/12/2002	4.00	4.00					537m	North West
GW104 902	10BL157 111, 10WA11 3115	Bore	Private	Domestic	Domestic		27/09/1995	7.10	7.10	Good	1.83	1.000		539m	South East
GW112 224	10BL160 943	Bore	Private	Monitoring Bore	Monitoring Bore		03/12/2002	4.10	4.10					558m	North West
GW112 223	10BL160 943	Bore	Private	Monitoring Bore	Monitoring Bore		31/12/2002	4.20	4.20					569m	North West
GW112 230	10BL160 943	Bore	Private	Monitoring Bore			03/12/2002	4.00	4.00					577m	North West
GW112 960	10BL602 812	Bore	Private	Monitoring Bore	Monitoring Bore	Caltex - Mascot	17/11/2008	5.50	5.50					581m	North East
GW112 222	10BL160 943	Bore	Private	Monitoring Bore	Monitoring Bore		03/12/2002	4.20	4.20					587m	North West
GW040 219		Spear	Private		Industrial			6.30	6.30				3.89	589m	North
GW112 961	10BL602 812	Bore	Private	Monitoring Bore	Monitoring Bore	Caltex - Mascot	17/11/2008	5.00	5.00					593m	North East
GW112 962	10BL602 812	Bore	Private	Monitoring Bore	Monitoring Bore	Caltex - Mascot	17/11/2008	5.00	5.00					599m	North East
GW112 221	10BL160 943	Bore	Private	Monitoring Bore	Monitoring Bore		03/12/2002	4.20	4.20					602m	North West
GW104 335	10BL160 591	Bore	Private	Monitoring Bore	Monitoring Bore		05/04/2002	3.50	3.50		1.40			602m	South East
GW072 901		Bore	Private		Domestic		15/11/1994	7.00	7.00					603m	East
GW104 448	10BL160 854	Bore	Private	Monitoring Bore	Monitoring Bore		25/11/2002	3.50	3.50			1.000		604m	North West
GW104 333	10BL160 591	Bore	Private	Monitoring Bore	Monitoring Bore		05/04/2002	3.50	3.50		1.20			609m	South East
GW104 334	10BL160 591	Bore	Private	Monitoring Bore	Monitoring Bore		05/04/2002	3.50	3.50		0.90			616m	South East
GW033 371	10BL024 740	Bore	Federal Govt	Industrial	Industrial		01/03/1970	11.80	11.90					624m	South East
GW104 337	10BL160 591	Bore	Private	Monitoring Bore	Monitoring Bore		05/04/2002	3.50	3.50		1.40			627m	South East
GW033 372	10BL024 741	Bore	Federal Govt	Industrial	Industrial		01/03/1970	11.80	11.90					629m	South East
GW104 336	10BL160 591	Bore	Private	Monitoring Bore	Monitoring Bore		05/04/2002	3.50	3.50		1.00			636m	South East
GW104 450	10BL160 854	Bore	Private	Monitoring Bore	Monitoring Bore		01/01/2002	3.50	3.50			0.500		640m	North West
GW104 449	10BL160 854	Bore	Private	Monitoring Bore	Monitoring Bore		01/01/2002	3.50	3.50			1.000		646m	North West
GW104 338	10BL160 591	Bore	Private	Monitoring Bore	Monitoring Bore		05/04/2002	3.50	3.50		1.20			659m	South East
GW103 588	10BL160 017, 10WA11 3300	Bore		Domestic	Domestic		18/02/2001	7.00	7.00					664m	North East
GW073 521		Spear	Private		Domestic		29/10/1995	3.00	3.00					682m	East
GW024 036	10BL017 949	Spear	Private	Industrial	General Use		01/01/1966	6.00	6.10					695m	South

GW No.	Licence No	Work Type	Owner Type	Authorised Purpose	Intended Purpose	Name	Complete Date	Final Depth (m)	Drilled Depth (m)	Salinity (mg/L)	SWL (m)	Yield (L/s)	Elev (AHD)	Dist	Dir
GW013515	10BL008626, 10WA112796	Spear	Private	Domestic	Domestic		01/01/1958	8.20	8.20					788m	East
GW100484	10BL157840	Bore	Private	Monitoring Bore	Monitoring Bore		19/12/1996	4.00	4.00		0.00			798m	North East
GW013331	10BL006748	Bore	Private	General Use, Industrial	Industrial		01/08/1954	14.90	14.90					801m	North East
GW104988	10BL160392, 10WA113311	Bore	Private	Domestic	Domestic		15/12/2001	7.00	7.00		4.00	1.000		806m	North East
GW103706	10BL160099	Bore		Monitoring Bore	Monitoring Bore		02/11/2000	4.30	4.30					814m	East
GW103707	10BL160099	Bore		Monitoring Bore	Monitoring Bore		03/11/2000	4.20	4.20					814m	East
GW103705	10BL160099	Bore		Monitoring Bore	Monitoring Bore		02/11/2000	4.70	4.70					814m	East
GW047123	10BL105637, 10WA114669	Bore	Local Govt	Recreation (groundwater)	Recreation (groundwater)		01/07/1973	18.90	18.90					833m	East
GW114857	10BL605586	Bore	Private	Monitoring Bore	Monitoring Bore		15/05/2014	6.00	6.00					840m	North East
GW015954	10BL006808	Bore	Private	Industrial	Industrial		01/05/1957	20.10	20.10					842m	North East
GW023525	10BL016753	Spear	Private	Domestic	General Use		01/11/1965	5.90	5.90					916m	South East
GW112403	10BL602019, 10WA114432	Well	Private	Groundwater Remediation	Groundwater Remediation		29/11/2007	0.90	0.90					934m	North East
GW112404	10BL602019, 10WA114432	Well	Private	Groundwater Remediation	Groundwater Remediation		29/11/2007	1.30	1.30					937m	North East
GW112405	10BL602019, 10WA114432	Well	Private	Groundwater Remediation	Groundwater Remediation		29/11/2007	1.30	1.30					944m	North East
GW113311	10BL160868	Bore	Private	Monitoring Bore	Monitoring Bore	Shell	01/01/2002	4.00	4.00		1.78			944m	North East
GW107976	10BL164933	Spear	Private	Dewatering (groundwater)	Dewatering (groundwater)		05/10/2004	3.50	3.50					957m	North East
GW025994	10BL016721	Bore	Private	Not Known	General Use		01/03/1966	13.20	13.30	Good				994m	South East
GW024374	10BL016571	Spear	Private	Irrigation	General Use		01/12/1965	5.10	5.20	Poor				1013m	North East
GW108104	10BL160615	Bore		Industrial	Industrial		10/05/2007		20.00			13.000		1057m	North East
GW072643	10BL156189	Bore	Local Govt	Test Bore	Test Bore		25/09/1996	12.00	12.00					1073m	North
GW047525	10BL105640, 10WA114683	Bore	Local Govt	Recreation (groundwater)	Recreation (groundwater)		01/05/1975	17.10	19.40					1081m	East
GW108497	10BL161956, 10WA114717	Bore	Private	Recreation (groundwater)			16/01/2008	8.00				3.000		1100m	North East
GW101533	10BL157298	Bore	Private	Industrial	Industrial		06/11/1997	20.00	20.00	Good	4.40	1.000		1112m	North East
GW104990	10BL160430, 10WA113313	Bore	Private	Domestic	Domestic		22/01/2002	6.00	6.00		3.50	1.000		1117m	East
GW109823	10BL164967	Bore	Private	Monitoring Bore	Monitoring Bore		23/10/2000	29.00	29.00	10.6	12.50	0.100		1126m	North
GW109822	10BL164967	Bore	Private	Monitoring Bore	Monitoring Bore		04/04/1997	10.45	10.45	958	3.00			1131m	North

GW No.	Licence No	Work Type	Owner Type	Authorised Purpose	Intended Purpose	Name	Complete Date	Final Depth (m)	Drilled Depth (m)	Salinity (mg/L)	SWL (m)	Yield (L/s)	Elev (AHD)	Dist	Dir
GW111 321	10BL601 845	Bore	Private	Monitoring Bore	Monitoring Bore		09/01/2007	5.00	5.00		2.63			1195m	North
GW103 507	10BL159 488	Bore		Monitoring Bore	Monitoring Bore		14/10/1999	6.00	6.00					1205m	North East
GW103 508	10BL159 488	Bore		Monitoring Bore	Monitoring Bore		15/10/1999	6.00	6.00					1205m	North East
GW103 506	10BL159 488	Bore		Monitoring Bore	Monitoring Bore		13/10/1999	6.00	6.00					1205m	North East
GW103 505	10BL159 488	Bore		Monitoring Bore	Monitoring Bore		14/10/1999	6.00	6.00					1205m	North East
GW017 344	10BL008 344	Bore	Private	Not Known	Industrial		01/02/1955	13.80	13.80					1206m	South East
GW103 504	10BL159 488	Bore		Monitoring Bore	Monitoring Bore		13/10/1999	6.10	6.10					1212m	North East
GW040 222		Well	Private		Industrial			7.00	7.00				8.69	1225m	South East
GW100 754	10BL156 761, 10WA11 4629	Bore	Private	Industrial	Industrial		21/06/1995	148.00	148.00	560	6.00	8.200		1233m	South
GW112 268	10BL161 855	Bore	Private	Monitoring Bore	Monitoring Bore		21/03/2003	12.35	12.35					1267m	West
GW024 244	10BL018 810, 10WA11 2967	Spear	Private	Domestic	General Use		01/11/1965	3.00	3.00	Fair				1282m	East
GW102 366	10BL159 184, 10WA11 3281	Bore		Domestic	Domestic		23/05/1999	7.00	7.00					1290m	East
GW101 523	10BL158 689, 10WA11 3260	Bore	Private	Domestic	Domestic		01/06/1998	6.10	6.10	Good	1.52	1.000		1293m	East
GW111 320	10BL601 845	Bore	Private	Monitoring Bore	Monitoring Bore		09/01/2007	5.20	5.20		2.52			1297m	North
GW100 053	10BL154 407, 10WA11 4697	Spear	Local Govt	Recreation (groundwater)	Recreation (groundwater)		20/04/1994	7.00	7.00		1.00	1.800		1319m	North
GW101 457	10BL158 490, 10WA11 3250	Spear	Private	Domestic	Domestic		02/03/1998	6.00	6.00					1334m	East
GW109 824	10BL164 967	Bore	Private	Monitoring Bore	Monitoring Bore		05/04/2005	20.70	20.70		4.51			1362m	North West
GW072 413	10BL156 159, 10WA11 3021	Spear	Private	Domestic	Domestic		31/10/1994	6.00	6.00					1387m	East
GW075 023		Bore	NSW Office of Water		Monitoring Bore	BOTANY BOREFIELD AT LESTRANGE PARK	15/07/1998	18.50	26.00				8.44	1388m	East
GW107 395	10BL163 147	Bore		Monitoring Bore	Monitoring Bore		22/07/2003	3.60	3.60					1389m	East
GW100 487	10BL157 229	Bore		Domestic			01/01/1996	5.00			4.00			1398m	South East
GW105 150	10BL157 080, 10WA11 3111	Bore	Private	Domestic	Domestic		20/09/1995	5.00	5.00					1400m	East
GW112 267	10BL161 855	Bore	Private	Monitoring Bore	Monitoring Bore		20/03/2003	12.12	12.12					1409m	West
GW109 821	10BL164 967	Bore	Private	Monitoring Bore	Monitoring Bore		03/04/1997	35.00	35.00	4400	14.50			1413m	North
GW109 825	10BL164 967	Bore	Private	Monitoring Bore	Monitoring Bore		10/02/2005	22.00	22.00		14.90			1415m	North

GW No.	Licence No	Work Type	Owner Type	Authorised Purpose	Intended Purpose	Name	Complete Date	Final Depth (m)	Drilled Depth (m)	Salinity (mg/L)	SWL (m)	Yield (L/s)	Elev (AHD)	Dist	Dir
GW106 987	10BL161 311, 10WA11 3334	Spear	Private	Domestic	Domestic		10/04/2005	7.00	7.00					1435m	East
GW107 396	10BL163 147	Bore		Monitoring Bore	Monitoring Bore		22/07/2003	3.50	3.50					1438m	East
GW072 293		Spear	Private		Domestic		29/11/1994	6.60						1459m	East
GW023 605	10BL017 288, 10WA11 2883	Spear	Private	Domestic	General Use		01/01/1966	4.50	4.60	Good				1466m	East
GW107 397	10BL163 147	Bore		Monitoring Bore	Monitoring Bore		27/07/2003	3.60	3.60					1470m	East
GW105 117	10BL160 666, 10WA11 4711	Bore	Private	Recreation (groundwater)	Recreation (groundwater)		12/12/2012	14.00	14.00	220	1.30	5.000		1477m	East
GW073 477	10BL157 226, 10WA11 3127	Bore		Domestic	Domestic		20/10/1995	5.00						1483m	East
GW110 457	10BL603 007	Well	Private	Monitoring Bore	Monitoring Bore		01/05/2009	3.60	3.60		1.70			1495m	North
GW112 275	10BL161 855	Bore	Private	Monitoring Bore	Monitoring Bore		27/02/2003	16.50	16.50					1502m	West
GW112 266	10BL161 855	Bore	Private	Monitoring Bore	Monitoring Bore		19/03/2003	10.37	10.37					1510m	West
GW023 168	10BL017 001	Spear	Private	Domestic	General Use		01/01/1966	4.50	4.60					1519m	North East
GW112 271	10BL161 855	Bore	Private	Monitoring Bore	Monitoring Bore		07/03/2003	19.51	19.51					1544m	West
GW110 456	10BL603 007	Well	Private	Monitoring Bore	Monitoring Bore		01/05/2009	3.20	3.60		2.30			1544m	North
GW111 919	10BL602 004	Spear	Private	Monitoring Bore	Monitoring Bore		01/01/2007	7.00	7.00		90.00	0.200		1563m	North East
GW110 458	10BL603 007	Well	Private	Monitoring Bore	Monitoring Bore		01/05/2009	2.80	2.80		2.30			1570m	North East
GW114 173	10BL604 101	Bore	Private	Monitoring Bore	Monitoring Bore		05/10/2010	4.00	4.00					1571m	East
GW112 274	10BL161 855	Bore	Private	Monitoring Bore	Monitoring Bore		26/02/2003	13.70	13.70					1572m	West
GW114 172	10BL604 101	Bore	Private	Monitoring Bore	Monitoring Bore		05/10/2010	4.00	4.00					1574m	East
GW114 174	10BL604 101	Bore	Private	Monitoring Bore	Monitoring Bore		05/10/2010	4.00	4.00					1575m	East
GW100 852	10BL157 549, 10WA11 3165	Spear	Private	Domestic	Domestic		14/03/1996	6.10	6.10	Good	1.83	1.000		1577m	North East
GW114 171	10BL604 101	Bore	Private	Monitoring Bore	Monitoring Bore		05/10/2010	4.00	4.00					1579m	East
GW114 170	10BL604 101	Bore	Private	Monitoring Bore	Monitoring Bore		05/10/2010	4.00	4.00					1581m	East
GW112 272	10BL161 855	Bore	Private	Monitoring Bore	Monitoring Bore		03/03/2003	14.84	14.84					1582m	West
GW023 500	10BL017 646, 10WA11 2923	Spear	Private	Domestic	General Use		01/01/1966	5.40	5.50	Good				1585m	North East
GW072 993	10BL156 242, 10WA11 3026	Bore		Domestic			01/01/1995	48.77	48.76			0.667		1592m	East
GW104 866	10BL161 625, 10WA11 3339	Bore	Private	Domestic	Domestic		17/03/2003	6.71	6.71		3.66	1.190		1593m	South East
GW111 920	10BL602 005	Spear	Private	Monitoring Bore	Monitoring Bore		01/01/2007	6.00	6.00		9.00	0.200		1596m	North East

GW No.	Licence No	Work Type	Owner Type	Authorised Purpose	Intended Purpose	Name	Complete Date	Final Depth (m)	Drilled Depth (m)	Salinity (mg/L)	SWL (m)	Yield (L/s)	Elev (AHD)	Dist	Dir
GW100 966	10BL156 935, 10WA11 3086	Spear	Private	Domestic	Domestic		23/08/1995	5.50	5.50	Good	1.83	1.000		1617m	East
GW026 070	10BL017 804, 10WA11 2932	Spear	Private	Domestic	Domestic		01/01/1966	3.60	3.70					1626m	East
GW101 477	10BL158 449, 10WA11 3241	Spear	Private	Domestic	Domestic		05/01/1998	6.00	6.00					1626m	East
GW072 632		Bore	Private		Domestic		02/12/1994	5.00	5.00					1627m	East
GW101 787	10BL157 379, 10WA11 3154	Bore		Domestic	Domestic		18/12/1995	5.80	5.80	Good	1.83	1.000		1630m	East
GW101 475	10BL158 448, 10WA11 3240	Spear	Private	Domestic	Domestic		04/02/1998	6.00	6.00					1643m	East
GW112 280	10BL161 855	Bore	Private	Monitoring Bore	Monitoring Bore		18/04/2003	16.50	16.50					1651m	West
GW042 179		Well	Private		Not Known			24.00	24.00				12.26	1655m	North East
GW023 472	10BL017 260, 10WA11 2877	Spear	Private	Domestic	General Use		01/03/1966	3.60	3.70	Good				1668m	East
GW104 922	10BL160 557, 10WA11 3318	Bore	Private	Domestic	Domestic		09/03/2002	7.00	7.00		3.50	1.000		1669m	East
GW023 162	10BL016 979	Spear	Private	Domestic	General Use		01/01/1966	4.80	4.90	Good				1694m	East
GW072 633		Bore	Private		Domestic		03/12/1994	5.00	5.00					1703m	East
GW112 279	10BL161 855	Bore	Private	Monitoring Bore	Monitoring Bore		18/04/2003	6.42	6.42					1706m	West
GW110 909	10BL603 566	Well	Private	Monitoring Bore	Monitoring Bore		19/01/2010	5.80	5.80		2.50			1708m	South
GW111 456	10BL604 566	Bore	Private	Monitoring Bore	Monitoring Bore		14/04/2011	5.20	6.20		2.77			1716m	South East
GW025 729	10BL016 155	(Unkn own)	Private	Industrial	Industrial		01/01/1940	21.30						1718m	South East
GW105 152	10BL157 076, 10WA11 3110	Bore	Private	Domestic	Domestic		20/09/1995	5.00	5.00					1723m	East
GW112 273	10BL161 855	Bore	Private	Monitoring Bore	Monitoring Bore		17/03/2003	11.50	11.50					1724m	West
GW101 446	10BL158 458, 10WA11 3243	Spear	Private	Domestic	Domestic		04/01/1998	6.00	6.00					1726m	East
GW112 603	10BL604 110	Bore	Private	Monitoring Bore	Monitoring Bore	Shell - Alexandria	13/07/2010	5.00	5.00		4.00			1730m	North East
GW112 600	10BL604 110	Bore	Private	Monitoring Bore	Monitoring Bore	Shell - Alexandria	13/07/2010	4.60	4.60		3.30			1731m	North East
GW072 634		Spear	Private		Domestic		24/10/1994	6.10	6.10					1732m	East
GW100 803	10BL156 210, 10WA11 3024	Bore		Domestic			31/12/1994	6.00	6.00		2.00			1737m	East
GW072 455	10BL156 142, 10WA11 3019	Bore		Domestic	Domestic		24/10/1994	5.80	5.80					1740m	East
GW112 602	10BL604 110	Bore	Private	Monitoring Bore	Monitoring Bore	Shell - Alexandria	13/07/2010	5.00	5.00		3.80			1746m	North East

GW No.	Licence No	Work Type	Owner Type	Authorised Purpose	Intended Purpose	Name	Complete Date	Final Depth (m)	Drilled Depth (m)	Salinity (mg/L)	SWL (m)	Yield (L/s)	Elev (AHD)	Dist	Dir
GW023 561	10BL017 493, 10WA11 2901	Spear	Private	Domestic	General Use		01/01/1966	5.40	5.50	Good				1747m	East
GW023 968		Spear	Private		General Use		01/01/1966	4.50	4.60	Good				1754m	East
GW112 278	10BL161 855	Bore	Private	Monitoring Bore	Monitoring Bore		10/03/2003	17.10	17.10					1760m	West
GW112 598	10BL604 110	Bore	Private	Monitoring Bore	Monitoring Bore	Shell - Alexandria	13/07/2010	5.00	5.00					1762m	North East
GW111 457	10BL604 566	Bore	Private	Monitoring Bore	Monitoring Bore		14/04/2011	6.20	6.20		2.77			1764m	South East
GW112 277	10BL161 855	Bore	Private	Monitoring Bore	Monitoring Bore		04/03/2003	19.70	19.70					1765m	West
GW112 599	10BL604 110	Bore	Private	Monitoring Bore	Monitoring Bore	Shell - Alexandria	13/07/2010	4.50	4.50		3.50			1768m	North East
GW112 282	10BL161 855	Bore	Private	Monitoring Bore	Monitoring Bore		06/06/2003	18.50	18.50					1773m	West
GW112 601	10BL604 110	Bore	Private	Monitoring Bore	Monitoring Bore	Shell - Alexandria	13/07/2010	5.00	5.00		4.20			1774m	North East
GW025 543	10BL016 154	Bore	Private	Industrial	Industrial		01/01/1963	18.50	18.60	Good			7.05	1778m	South East
GW105 527	10BL160 254	Bore		Monitoring Bore	Monitoring Bore		15/12/2000	5.00	5.00					1778m	North East
GW105 528	10BL160 254	Bore		Monitoring Bore	Monitoring Bore		02/12/1993	5.00	5.00					1780m	North East
GW112 270	10BL161 855	Bore	Private	Monitoring Bore	Monitoring Bore		05/03/2003	19.67	19.67					1780m	West
GW112 597	10BL604 110	Bore	Private	Monitoring Bore	Monitoring Bore	Shell - Alexandria	13/07/2010	5.00	5.00		3.90			1781m	North East
GW112 281	10BL161 855	Bore	Private	Monitoring Bore	Monitoring Bore		29/05/2003	9.70	9.70					1795m	West
GW100 575	10BL158 007, 10WA11 3192	Spear	Private	Domestic	Domestic		20/04/1997	5.00	5.00					1802m	East
GW110 906	10BL603 567	Well	Private	Monitoring Bore	Monitoring Bore		19/01/2010	5.80	5.80		3.50			1802m	South
GW110 910	10BL603 566	Well	Private	Monitoring Bore	Monitoring Bore		19/01/2010	6.00	6.00		3.00			1805m	South
GW105 529	10BL160 254	Bore		Monitoring Bore	Monitoring Bore		07/02/2001	5.00	5.00					1808m	North East
GW025 553	10BL016 153	(Unkn own)	Private	Industrial	Industrial		01/01/1940	17.00						1821m	South East
GW110 911	10BL603 566	Well	Private	Monitoring Bore	Monitoring Bore		19/01/2010	6.00	6.00		3.20			1830m	South
GW024 616	10BL019 001, 10WA11 2979	Spear	Private	Domestic	Domestic		01/09/1966	5.60	5.60					1849m	East
GW101 231	10BL158 390, 10WA11 3225	Spear	Private	Domestic	Domestic		21/12/1997	7.00	7.00					1854m	East
GW100 945	10BL156 905, 10WA11 3083	Spear	Private	Domestic	Domestic		14/08/1995	7.10	7.10	Good	2.13	1.000		1860m	East
GW112 265	10BL161 855	Bore	Private	Monitoring Bore	Monitoring Bore		18/03/2003	8.00	8.00					1861m	West
GW101 161	10BL157 031, 10WA11 3100	Spear	Private	Domestic	Domestic		06/09/1995	6.10	6.10	Good	3.50	1.000		1862m	East
GW103 193	10BL159 777, 10WA11 3296	Bore		Domestic	Domestic		01/01/1985	6.70	6.70		2.00	0.378		1866m	East

GW No.	Licence No	Work Type	Owner Type	Authorised Purpose	Intended Purpose	Name	Complete Date	Final Depth (m)	Drilled Depth (m)	Salinity (mg/L)	SWL (m)	Yield (L/s)	Elev (AHD)	Dist	Dir
GW102 800	10BL159 567, 10WA11 3293	Bore		Domestic	Domestic		12/01/2000	6.10	6.10	Good				1886m	East
GW110 352	10BL602 743, 10WA11 4783	Bore	Local Govt	Recreation (groundwater)	Recreation (groundwater)		01/01/1975	40.00	40.00		10.00	2.000		1888m	North East
GW110 907	10BL603 567	Well	Private	Monitoring Bore	Monitoring Bore		19/01/2010	5.80	5.80		3.80			1892m	South
GW100 997	10BL158 173, 10WA11 3201	Spear	Private	Domestic	Domestic		01/10/1997	8.23	8.24	Good		1.000		1893m	East
GW017 782	10BL009 960	Bore	Private	Industrial (low Security)	Industrial		01/09/1959	15.50	15.50					1901m	North East
GW112 264	10BL161 855	Bore	Private	Monitoring Bore	Monitoring Bore		17/03/2003	15.45	15.45					1912m	West
GW110 908	10BL603 567	Well	Private	Monitoring Bore	Monitoring Bore		19/01/2010	6.00	6.00		4.00			1913m	South
GW100 993	10BL156 957, 10WA11 3091	Spear	Private	Domestic	Domestic		29/08/1995	5.49	5.49	Good	2.13	1.000		1917m	East
GW023 967	10BL017 821, 10WA11 2935	Spear	Private	Domestic	General Use		01/05/1966	2.70	2.70	Good				1919m	East
GW112 269	10BL161 855	Bore	Private	Monitoring Bore	Monitoring Bore		11/03/2003	17.60	17.60					1920m	West
GW065 532		Bore	Private		Industrial		01/11/1990	18.00						1921m	North East
GW072 328	10BL155 241	Bore	Private	Industrial	Industrial		18/06/1994	13.00	14.00					1921m	North East
GW101 813	10BL157 317, 10WA11 3139	Bore		Domestic	Domestic		16/11/1995	8.54	8.54	Good	2.75	1.000		1922m	East
GW112 276	10BL161 855	Bore	Private	Monitoring Bore	Monitoring Bore		27/02/2013	26.65	26.65					1931m	West
GW100 975	10BL156 944, 10WA11 3087	Spear	Private	Domestic	Domestic		10/05/1993	6.10	6.10	Good	2.74	1.000		1938m	North East
GW023 408	10BL016 677	Spear	Private	Domestic	General Use		01/12/1965	7.00	7.00					1947m	East
GW101 221	10BL158 317, 10WA11 3219	Spear	Private	Domestic	Domestic		12/12/1997	6.10	6.10	Good	2.13	1.000		1950m	North East
GW109 255	10BL602 488	Bore	Private	Monitoring Bore	Monitoring Bore		21/08/2008	7.30	7.30	Fresh	0.72			1950m	South East
GW023 600	10BL017 286, 10WA11 2881	Spear	Private	Domestic	General Use		01/01/1966	7.30	7.30	Good				1970m	East
GW072 214		Bore	Private		Domestic		01/03/1995	5.00	5.00					1971m	East
GW114 562	10BL605 489	Bore	Other Govt	Monitoring Bore	Monitoring Bore	SCA	06/12/2013	4.00	2.70	448	2.51			1972m	North
GW109 254	10BL602 488	Bore	Private	Monitoring Bore	Monitoring Bore		21/08/2008	9.70	9.70	Fresh	1.03			1975m	South East
GW114 561	10BL605 489	Bore	Other Govt	Monitoring Bore	Monitoring Bore	SCA	06/12/2013	4.00	4.00	529	2.92			1976m	North
GW109 253	10BL602 488	Bore	Private	Monitoring Bore	Monitoring Bore		21/08/2008	10.30	10.30	Fresh	1.42			1978m	South East
GW114 563	10BL605 489	Bore	Other Govt	Monitoring Bore	Monitoring Bore	SCA	06/12/2013	4.00	3.90	591				1989m	North
GW100 367	10BL157 662, 10WA11 3172	Spear	Private	Domestic	Domestic		30/05/1995	6.00	6.00	Good	2.90	0.500		1996m	East

Borehole Data Source : NSW Department of Primary Industries - Office of Water / Water Administration Ministerial Corporation for all bores prefixed with GW. All other bores © Commonwealth of Australia (Bureau of Meteorology) 2015. Creative Commons 3.0 © Commonwealth of Australia http://creativecommons.org/licenses/by/3.0/au/deed.en

Hydrogeology & Groundwater

297 King Street, Mascot, NSW 2020

Driller's Logs

Drill log data relevant to the boreholes within the dataset buffer:

Groundwater No	Drillers Log	Distance	Direction
GW101350	0.00m-5.90m SAND. FINE TO MEDIUM GRAINED	53m	South
GW101351	0.00m-5.05m SAND. SILTY,PEATY, WITH TRACES OF CLAY	53m	South
GW101352	0.00m-5.70m SAND. SILTY, PEATY	53m	South
GW101353	0.00m-6.00m SAND.FINE TO MEDIUM GRAINED, TRACE OF SILT	53m	South
GW101354	0.00m-6.00m SAND. FINE TO MEDIUM GRAINED WITH SOME SILT	54m	South
GW101355	0.00m-6.00m SAND. SILTY,PEATY WITH TRACE OF CLAY	54m	South
GW101356	0.00m-5.60m SAND.silty, peaty with traces of clay and some thin peat lenses	54m	South
GW101357	0.00m-5.90m SAND. FINE TO MEDIUM GRAINED, TRACE OF SILT	54m	South
GW101358	0.00m-6.00m SAND. FINE TO MEDIUM GRAINED	54m	South
GW101359	0.00m-6.00m SAND.FIE TO MEDIUM GRAINED WITH SOME SILT. SOME PEAT LENSES	54m	South
GW101360	0.00m-6.00m SAND.FINE TO MEDIUM GRAINED, TRACE OF SILT SOME PEAT LENSES	54m	South
GW101361	0.00m-4.30m SAND. FINE TO MEDIUM GRAINED WITH SOME SILT	54m	South
GW101362	0.00m-5.90m SAND. FINE TO MEDIUM GRAINED	54m	South
GW102168	0.00m-0.10m Concrete 0.10m-0.80m Fill: Dark brown/grey Sandy Clay, moist, some brick and rock fragments 0.80m-2.40m Fill: Sandstone boulders 2.40m-3.20m Black Peaty Clay, moist 3.20m-5.00m Brown/black Sand, wet, some Silt and Peat	158m	South
GW102169	0.00m-0.10m Fill: Light brown/red Silty Sand, dry 0.10m-1.80m Fill: Dark brown Clayey Sand, moist, with plastic, wire, steel fragments 1.80m-2.50m Light Grey Clayey Sand, wet 2.50m-3.50m Dark grey Clayey Sand, wet, some Silt and Peat 3.50m-4.50m Dark brown Sand, wet, with Silt and Peat	158m	South
GW102171	0.00m-0.30m Fill: Brown/red Sand, some Silt 0.30m-0.80m Fill: Dark brown Sand, some Silt, wire, Clay, pipe and metal fragments 0.80m-1.70m Fill: Grey Clayey Sand, moist 1.70m-3.70m Dark grey/brown Silty Sand, wet, some Clay and Silt 3.70m-6.00m Dark Grey Silty Sand, some Peat	158m	South
GW102173	0.00m-0.70m Fill: Brown/red Silty Sand, dry, steel, rock and glass fragments 0.70m-1.00m Dark brown Sand, moist, some Silt and Peat 1.00m-2.20m Light brown Sand, moist, some Silt and Peat 2.20m-3.40m Dark grey Clayey Sand, some Silt and Clay 3.40m-4.50m Dark grey Sand, wet, some Silt and Peat	158m	South
GW102178	0.00m-0.17m Concrete 0.17m-2.70m Fill: Dark grey/black Sand, concrete fragments, timber and sandstone fragments 2.70m-3.50m Dark brown/grey Clayey Sand, moist, with Silt and Peat. 3.50m-4.40m Dark brown/grey Sand, wet, some Silt and Peat	158m	South
GW102184	0.00m-2.40m Fill: Dark grey/black Sand, moist, some rock, glass asbestos fragments 2.40m-3.40m Dark brown/red Clayey Sand, moist, some Silt and Peat 3.40m-4.20m Dark grey/black Sand, wet, some Silt and Peat	158m	South

Groundwater No	Drillers Log	Distance	Direction
GW102186	0.00m-0.19m Concrete 0.19m-2.70m Fill: Dark brown/red Sand, moist, concrete, brick and asbestos fragments 2.70m-3.70m Dark brown/black Sand, wet, some Silt and Peat 3.70m-4.20m Light brown Sand, wet, some Silt and Peat	158m	South
GW102188	0.00m-0.20m Concrete 0.20m-2.70m Fill: Dark brown/red Sand, moist, rock fragments 2.70m-4.00m Dark grey/black Sand, moist, some Silt and Peat	158m	South
GW102191	0.00m-0.22m Concrete 0.22m-2.70m Fill: Dark gre/black Sand, moist, rock and metal fragments 2.70m-4.00m Dark brown/grey Sand, some Silt and Peat	158m	South
GW102192	0.00m-0.22m Concrete 0.22m-2.50m Fill: Brown/grey Sand, moist, rocks and steel fragments 2.50m-3.20m Black Peaty Clay, moist, some Sand 3.20m-4.00m Brown/black Sand, wet, some Silt and Peat	158m	South
GW102193	0.00m-0.17m Concrete 0.17m-2.60m Fill: Dark brown Sand, moist, rocks and concrete fragments 2.60m-3.90m Dark brown/black Sand, moist, some Silt and Peat	158m	South
GW102194	0.00m-0.19m Concrete 0.19m-2.40m Fill: Dark brown Sand, rock and concrete fragments 2.40m-3.00m Dark grey/black Clayey Sand, moist, some Silt and Peat 3.00m-3.70m Dark brown Sand, wet, some Silt and Peat	158m	South
GW102196	0.00m-0.12m Concrete 0.12m-2.40m Fill: Dark brown/grey Sand, moist, brick and concrete fragments 2.40m-3.60m Dark brown Sand, wet, some Clay, Silt and Peat	158m	South
GW102198	0.00m-0.15m Concrete 0.15m-2.30m Fill: Dark brown/black Sand, moist, some Clay and rubble 2.30m-3.10m Dark brown/grey Sand, moist, some Silt, Clay and Peat 3.10m-3.50m Black Peaty Clay, moist, some Sand	158m	South
GW102160	0.00m-0.15m Concrete 0.15m-1.50m Fill: dark brown/grey, moist Sand, tile and metal fragments 1.50m-2.60m Fill: Klinker ash, dark grey, moist, loose 2.60m-3.80m Dark brown/grey Sandy Clay, moist, some ash 3.80m-5.00m Dark brown Sand, wet, some peat	159m	South
GW102162	0.00m-0.15m Concrete 0.15m-2.50m Fill: Dark grey/black Sand, Silt, and Concrete fragments 2.50m-3.70m Dark brown/grey Clayey Sand, with Silt 3.70m-5.00m Dark brown/grey Sand, wet, some Silt and Peat	159m	South
GW102164	0.00m-0.15m Concrete 0.15m-2.60m Fill: Dark brown/grey Sand, some metal, rock, brick 2.60m-3.80m Dark brown/grey Clayey Sand, wet, some Silt and Clay 3.80m-5.00m Dark brown/black Sand, wet, some Silt and Peat	159m	South
GW102165	0.00m-0.10m Concrete 0.10m-0.70m Fill: Dark brown/grey Sand, moist, glass fragments 0.70m-2.60m Fill: Light brown/red Sand, moist, some Sandstone 2.60m-4.20m Black Peaty Clay, moist, some Sand 4.20m-5.00m Dark brown Sand, wet, some Silt and Peat	159m	South
GW102172	0.00m-0.70m Fill: Dark brown/grey Sandy Clay, moist, rock fragments 0.70m-1.80m Dark brown/grey Silty Sand, moist 1.80m-2.80m Light brown Sand, some Silt and Peat 2.80m-4.50m Dark grey/brown Sand, wet, some Silt and Peat	159m	South
GW102176	0.00m-0.10m Fill: Light brown/grey Sand, dry, some Silt 0.10m-0.70m Fill: Dark brown Sand, dry, steel, broken concrete 0.70m-2.20m Dark brown Sand, some Silt 2.20m-2.90m Light brown Sand, moist, some Peat 2.90m-3.40m Dark grey Clayey Sand, wet, some Silt and Peat 3.40m-4.50m Dark grey Sand, wet, some Silt and Peat	159m	South
GW102185	0.00m-0.16m Concrete 0.16m-2.70m Fill: Dark grey Sand,moist, rock and brick fragments 2.70m-3.60m Dark grey/black Sand, moist, some Silt and Peat 3.60m-4.20m Light brown Sand, wet, some SIlt and Peat	159m	South
GW102187	0.00m-0.22m Concrete 0.22m-2.80m Fill: Grey/brown Sand, moist, Sandstone fragments and timber 2.80m-3.70m Dark brown/black Sand, moist, some Silt and Peat 3.70m-4.20m Light brown Sand, wet, some SIlt and Peat	159m	South
GW102189	0.00m-0.20m Concrete 0.20m-2.70m Fill: Dark brown/red Sand, moist, brick and rock fragments 2.70m-3.50m Dark brown/black Clayey Sand, moist, some Silt and Peat 3.50m-4.00m Dark brown/black Sand, wet, some Silt and Peat.	159m	South

Groundwater No	Drillers Log	Distance	Direction
GW102190	0.00m-0.17m Concrete 0.17m-2.70m Fill: Dark brown/grey Sand, moist, glass and Sandstone fragments 2.70m-3.60m Black Peaty Clay, moist, some Sand 3.60m-4.00m Dark brown Sand, wet, some Silt and Peat	159m	South
GW102195	0.00m-0.15m Concrete 0.15m-2.40m Fill: Light and dark brown Sandy Clay, rubble 2.40m-3.60m Dark grey/black Sandy Clay, wet, sheen on soil	159m	South
GW102197	0.00m-0.16m Concrete 0.16m-2.30m Fill: Light and dark brown Sand, moist, cocnrete and rock fragments 2.30m-3.60m Dark brown/grey Sand, moist, some Silt and Peat	159m	South
GW102199	0.00m-0.15m Concrete 0.15m-2.30m Fill: Dark brown/grey Sand, moist, clay, brick, and rock fragments 2.30m-3.00m Dark brown Clayey Sand, moist, some Silt and Peat 3.00m-3.50m Dark grey/brown Sand, wet, some Silt and Peat	159m	South
GW102200	0.00m-0.16m Concrete 0.16m-1.50m Fill: Ripped Sandstone with metal and brick fragments 1.50m-2.30m Dark brown/black Sand, moist, some Silt and Peat 2.30m-3.50m Light brown/grey Sand, wet, some Silt and Peat	159m	South
GW102201	0.00m-1.20m Fill: Dark brown/grey Sandy Clay, moist, rock fragments 1.20m-2.70m Light brown Sand, moist, some Silt and Peat 2.70m-3.50m Brown/grey Sand, wet, some Silt and Peat	159m	South
GW102203	0.00m-1.20m Fill: Dark brown Sand, brick and metal fragments 1.20m-2.70m Light brown Sand, moist, some Silt and Peat 2.70m-3.50m Dark brown/grey Sand, wet, some Silt and Peat	159m	South
GW102204	0.00m-2.20m Fill: Dark brown/red Sand, moist, metal, wire, and Sandstone fragments 2.20m-3.30m Dark brown/grey Sand, moist, some Silt and Peat	159m	South
GW102205	0.00m-2.20m Fill: Dark brown Sand, moist, wire, timber, and metal fragments 2.20m-3.30m Dark brown/grey Sand, moist, some Silt and Peat	159m	South
GW027248	0.00m-1.21m Topsoil 0.00m-1.21m Loam Sandy 1.21m-3.04m Sand 3.04m-4.87m Sand Slightly Silty Water Supply	243m	North
GW112651	0.00m-6.00m SAND LIGHT M/GRAIN	388m	North
GW027750	0.00m-4.57m Sand Dry 4.57m-10.97m Sand Water Supply 10.97m-11.28m Clay Sandy Pete 11.28m-12.80m Sand Grey Slightly Peaty Water Supply 12.80m-14.63m Sand Very Dirty Pete Water Supply 14.63m-15.84m Sand Peaty Water Supply 15.84m-17.37m Sand Grey Clay Pete Water Supply 17.37m-17.38m Clay Sandy	484m	North East
GW027749	0.00m-2.43m Sand 2.43m-5.18m Sand Peaty 5.18m-5.79m Peat Sandy 5.79m-8.22m Sand Very Dirty Peaty 8.22m-10.97m Peat Small 8.22m-10.97m Clay 10.97m-16.15m Sand White Water Supply 16.15m-16.45m Clay White Puggy	492m	East
GW024655	0.00m-1.21m Ash Rubble 1.21m-2.43m Sand Peaty 2.43m-5.48m Peat Black 5.48m-7.92m Sand Peaty 5.48m-7.92m Clay Seams Water Supply 7.92m-9.14m Sand Grey Clean Water Supply	519m	South

Groundwater No	Drillers Log	Distance	Direction
GW031808	0.00m-0.15m Sand Dark Brown Light Brown 0.15m-5.63m Sand Yellow Fine 0.15m-5.63m Clay Yellow 5.63m-6.55m Sand 5.63m-6.55m Clay Black Silty 6.55m-6.85m Sand Black 6.55m-6.85m Clay Black 6.85m-8.38m Sand 8.38m-9.14m Clay 9.14m-9.90m Sand Yellow Fine Water Supply 9.90m-11.12m Sand Grey 9.90m-11.12m Clay Grey Fossils:wood Water Supply 11.12m-11.43m Sand Black 11.12m-11.43m Clay Black 11.43m-11.58m Clay Black 11.58m-11.88m Sand Grey Clayey 11.88m-12.80m Sand 11.88m-12.80m Clay Water Supply 12.80m-12.95m Clay Grey Dry 12.80m-12.95m Sand Grey 12.95m-14.17m Clay White Light Grey Sandy 14.17m-16.15m Clay Grey Yellow Red 16.15m-18.28m Clay Dark Grey Stiff	526m	South
GW075024	0.00m-4.00m PEATY SAND,BLACK 4.00m-9.00m SAND,FINE COFFEE BROWN 9.00m-11.00m PEATY SAND,DARK BROWN 11.00m-15.50m SILTY SAND,MED GRAINED,GREY 15.50m-19.00m SANDY CLAY,DARK GREY	529m	East
GW024068	0.00m-1.52m Loam Light Sandy 1.52m-2.13m Loam Dark Brown 2.13m-2.74m Loam Sandy Water Supply 2.74m-3.35m Loam Dark Brown 3.35m-4.26m Sand	536m	East
GW104902	0.00m-7.10m UNCONSOLIDATED ALL SANDS	539m	South East
GW104335	0.00m-0.10m PAVEMENT: CONCRETE 0.10m-0.80m FILL:SILKTY SAND 0.80m-1.80m BOTANY SAND:SILTY SAND 1.80m-3.50m BOTANY SAND:SAND	602m	South East
GW072901	0.00m-7.00m Peaty Sand Fine To Medium	603m	East
GW104333	0.00m-0.20m TOPSOIL/SILTY SAND 0.20m-0.90m FILL:GRAVELLY SAND 0.90m-3.50m SAND: CLAYEY PEATY SAND	609m	South East
GW104334	0.00m-0.30m TOPSOIL:SILTY SAND 0.30m-3.50m SAND	616m	South East
GW033371	0.00m-0.91m Made Ground 0.91m-4.26m Sand 4.26m-4.41m Sand Peat Water Supply 4.41m-5.02m Clay Peaty 5.02m-6.09m Sand Peat Water Supply 6.09m-8.83m Sand Water Supply 8.83m-9.75m Clay Yellow Sandy 9.75m-10.97m Sand Water Supply Peat Fine 10.97m-11.58m Peat Sandy 11.58m-11.88m Clay Peaty	624m	South East
GW104337	0.00m-0.10m PAVEMENT:CONCRETE AND BRICK 0.10m-3.50m BOTANY SAND:SAND	627m	South East
GW033372	0.00m-0.91m Made Ground 0.91m-3.04m Sand 3.04m-4.57m Sand Wet 4.57m-5.18m Peat 5.18m-5.79m Sand Peaty Water Supply 5.79m-6.70m Sand Grey Clay Seams 6.70m-9.14m Sand Peat 9.14m-9.60m Sand Water Supply 9.60m-11.58m Sand Peat Water Supply 11.58m-11.88m Clay Stiff Peaty	629m	South East
GW104336	0.00m-0.10m PAVEMENT: CONCRETE 0.10m-0.60m FILL:GRAVELLY CLAYEY SAND 0.60m-1.00m BOTANY SAND: SAND 1.00m-2.80m BOTANY SAND:CLAY/PEAT 2.80m-3.50m BOTANY SAND :SAND	636m	South East

Groundwater No	Drillers Log	Distance	Direction
GW104338	0.00m-0.10m PAVEMENT:CONCRETE 0.10m-0.80m FILL:GRAVELLY SAND 0.80m-1.60m BOTANY SAND:SAND 1.60m-3.50m BOTANY SAND:CLAYEY PEATY SAND	659m	South East
GW103588	0.00m-7.00m SAND	664m	North East
GW024036	0.00m-6.09m Sand	695m	South
GW013515	0.00m-8.22m Sand	788m	East
GW100484	0.00m-0.30m CONCRETE 0.30m-2.50m FILL 2.50m-4.00m NATURAL SANDS	798m	North East
GW013331	0.00m-1.52m Sand Yellow Loamy 1.52m-7.92m Sand Peaty Dirty 7.92m-10.36m Sand Dirty Water Supply 10.36m-10.66m Wood Peaty 10.66m-12.19m Sand Peaty Water Supply 12.19m-12.49m Clay Sandy 12.49m-14.94m Sand Dark Pete Water Supply	801m	North East
GW104988	0.00m-7.00m SAND	806m	North East
GW103705	0.00m-0.15m CONCRETE PAVEMENT 0.15m-0.70m SAND:MEDIUM BROWN /ROCKS AND GLASS 0.70m-1.60m SAND:WHITE,NATURAL MATERIAL 1.60m-4.70m SAND:VERY DARK BROWN	814m	East
GW103706	0.00m-0.11m CONCRETE SLAB 0.11m-0.26m FILL 0.26m-0.36m CONCRETE SLAB 0.36m-0.50m SAND:BROWN 0.50m-1.60m SAND:YELLOW-BROWN 1.60m-2.40m LOAMY SAND:DARK BROWN 2.40m-3.40m SANDY LOAM:VERY DARK BROWN 3.40m-4.30m SANDY LOAM:DARK GREY	814m	East
GW103707	0.00m-0.90m SAND:ORANGE-BROWN 0.90m-1.20m SAND:RED 1.20m-1.50m SAND:SHARP BOUNDARY,PALE IN COLOUR 1.50m-1.70m SAND:GREY 1.70m-2.10m SAND:WHITE 2.10m-2.30m LOAMY SAND 2.30m-2.80m LOAMY SAND:PALER RED-BROWN 2.80m-4.20m SAND:YELLOW-GREY	814m	East
GW047123	0.00m-1.52m Soil Black Sandy 1.52m-10.06m Sand Peat Water Supply 10.06m-10.67m Peat Sand 10.67m-14.94m Sand Some Peat Water Supply, Traces Clay 14.94m-15.24m Peat Sand 15.24m-18.29m Sand Some Peat Water Supply 18.29m-18.90m Peat Sand 18.90m-18.91m Clay Grey	833m	East
GW114857	0.00m-0.21m CONCRETE 0.21m-2.20m FILL CLAYEY SILTY SAND DARK BROWN,TRACE OF SANDSTONE 2.20m-2.80m SAND, FINE TO MED. GRAINED 2.80m-4.20m CLAYEY SILTY SAND, FINE GRAINED 4.20m-6.00m SAND,FINE TO MEDIUM GRAINED YELLOW AND GREY BROWN	840m	North East
GW015954	0.00m-0.30m Made Ground 0.30m-1.82m Sand White Fine 1.82m-5.10m Sand Fine 5.10m-5.18m Peat 5.18m-6.70m Sand Fine 6.70m-6.78m Peat 6.78m-8.22m Sand Fine Water Supply 8.22m-8.61m Peat 8.61m-10.97m Sand Dark Brown Fine Water Supply 10.97m-11.12m Peat 11.12m-12.80m Sand Dark Brown Fine Water Supply 12.80m-13.71m Sand Fine Water Supply 13.71m-13.79m Peat 13.79m-16.15m Sand Dark Grey Fine Water Supply 16.15m-17.98m Sand Dark Brown Fine Water Supply 17.98m-19.20m Sand Dark Grey Water Supply 19.20m-19.50m Clay Dark Grey 19.50m-19.81m Sand Clay 19.81m-20.11m Clay	842m	North East

Groundwater No	Drillers Log	Distance	Direction
GW023525	0.00m-2.43m Sand 2.43m-3.04m Sand Hard Cemented 3.04m-5.94m Sand Water Supply	916m	South East
GW107976	0.00m-0.70m topsoil, fill 0.70m-2.00m sand, loose 2.00m-2.50m sandy, coarse 2.50m-3.50m sand, peaty	957m	North East
GW025994	0.00m-0.30m Made Ground 0.30m-4.41m Sand Yellow Moist 4.41m-10.51m Sand Grey Water Supply 10.51m-13.25m Sand Grey White Water Supply	994m	South East
GW024374	0.00m-5.18m Sand Water Supply	1013m	North East
GW072643	0.00m-2.00m FILL 2.00m-6.50m MEDIUM SANDY GRAVEL 6.50m-7.20m GREY SILTY CLAY WB 7.20m-8.50m MEDIUM SAND WB 8.50m-10.00m BROWN SILTY SAND WB 10.00m-12.00m GREY SHALE CLAY	1073m	North
GW047525	0.00m-0.61m Peat Sandy 0.61m-1.52m Sand Peaty 1.52m-4.27m Sand Dirty Water Supply 4.27m-6.25m Sand Indurated Water Supply 6.25m-12.65m Sand Dirty Water Supply 12.65m-12.95m Clay Soft Sandy Water Supply 12.95m-13.87m Sand Grey Some Clay Water Supply 13.87m-17.07m Sand Grey Dirty Water Supply Wood Decomposed 17.07m-19.20m Clay Grey Peaty Sandy 19.20m-19.35m Sandstone	1081m	East
GW101533	0.00m-2.00m FILL, CONCRETE BLOCKS 2.00m-11.00m SAND, BROWN, PEATY 11.00m-13.50m SAND, BLACK, PEATY 13.50m-18.00m SAND, BROWN. W.B. 18.00m-19.50m SAND,BROWN,WITH GREY CLAY SEAMS 19.50m-20.00m CLAY,DARK BROWN	1112m	North East
GW104990	0.00m-6.00m SAND	1117m	East
GW109823	0.00m-3.00m FILL 3.00m-6.00m CLAYEY SAND 6.00m-8.11m SAND 8.11m-11.50m SANDY CLAY 11.50m-29.00m SHALE	1126m	North
GW109822	0.00m-2.60m FILL 2.60m-3.80m CLAYEY SAND 3.80m-8.20m SAND 8.20m-10.45m CLAY	1131m	North
GW111321	0.00m-0.18m CONCRETE 0.18m-0.90m GRAVELLY CLAYEY SAND,DENSE,MOIST 0.90m-1.60m GRAVEL SILTY,DENSE,VERY MOIST 1.60m-2.00m SAND,CLAYEY SAND,GREY,FINE GRAINED 2.00m-5.00m CLAY,SANDY,SOFT,L/PLASTICITY,SAND FINE GRAINED	1195m	North
GW103505	0.00m-0.16m CONCRETE 0.16m-0.80m FILL(SILTY SAND) SILT AND GRAVEL 0.80m-1.80m FILL(SILTY SAND) SILT AND SHELLS 1.80m-2.70m SAND: BROWN/ORANGE WITH SILT 2.70m-3.30m SAND: GREY,BROWN,MOIST WITH SILT 3.30m-6.00m SAND: BROWN/ORANGE,SOME SILT	1205m	North East
GW103506	0.00m-0.17m CONCRETE 0.17m-1.00m FILL (SILTY SAND) SANDSTONE FRAG. 1.00m-1.30m SAND: GREYMOIST WITH SOME SILT 1.30m-1.80m SAND: BROWN,RED, MOIST,SOME SILT 1.80m-2.30m SAND:WHITE,MOIST 2.30m-3.30m SAND: GREY/BROWN,MOIST SOME SILT 3.30m-6.00m SAND: YELLOW/BROWN,MOIST WITH SILT	1205m	North East
GW103507	0.00m-0.16m CONCRETE 0.16m-1.20m FILL(SILTY SAND),SOME GRAVEL,SHELLS 1.20m-1.80m SAND: BROWN AND GREY,SOME SILT 1.80m-2.30m SAND: WHITE MOIST,FINE GRAINED 2.30m-2.80m SANDY PEAT:DARK BROWN,MOIST,SILT 2.80m-6.00m SILTY SAND:BROWN/ORANGE,WITH SILT	1205m	North East

Groundwater No	Drillers Log	Distance	Direction
GW103508	0.00m-0.16m CONCRETE 0.16m-0.70m FILL(SILTY SAND)DARK BROWN,MOIST/GRAVEL 0.70m-1.60m FILL(SILTY SAND)SOME CLAY/SANDSTONE 1.60m-3.40m SAND:RED/BROWN,WITH SILT 3.40m-3.80m SAND:YELLOW/BROWN/MOIST WITH SILT 3.80m-6.00m SILTY SAND:DARK BROWN/GREY/SILT	1205m	North East
GW017344	0.00m-0.76m Made Ground 0.76m-2.43m Sand Grey 2.43m-3.65m Sand Water Supply 3.65m-4.87m Sand Grey 4.87m-7.01m Sand Greasy 7.01m-7.92m Sand Water Supply 7.92m-8.53m Sand Grey Peaty 8.53m-9.29m Sand Clay 9.29m-10.05m Sand Peat Clay 10.05m-10.36m Sand Water Supply 10.36m-11.58m Sand Peaty 11.58m-11.88m Sand 11.88m-12.34m Clay Grey Peaty 12.34m-13.71m Sand Grey Peaty Water Supply 13.71m-13.80m Peat	1206m	South East
GW103504	0.00m-0.50m BITUMEN 0.50m-0.60m FILL(SILTY SAND)/GRAVEL/SANDSTONE 0.60m-2.00m FILL (SAND),GRAVEL,SOME ASH AND CLAY 2.00m-2.80m SANDY LOAM: DARK BROWN WITH SILT 2.80m-6.10m SAND:YELLOW,ORANGE,MOIST	1212m	North East
GW100754	0.00m-1.30m FILL 1.30m-13.90m LAYERED SANDS 13.90m-15.40m PEAT 15.40m-18.60m LAYERED SANDS 18.60m-24.80m GREY MARINE CLAY 24.80m-38.20m GREY F/G SANDSTONE CLAY MATRIX 38.20m-47.30m MOIST WHITE F/G S/STONE 47.30m-51.70m YELLOW M/G S/S- CLAY MATRIX 51.70m-54.90m FRACTURE WHITE S/STONE 54.90m-63.70m SHALE 63.70m-66.80m SHALE/QUARTZ/S/S CROSS BED 66.80m-93.20m WHITE M/G S/STONE 93.20m-96.50m SILSTONE 96.50m-101.80m WHITE M/G S/STONE 101.80m-117.20m DARK GREY SHALE 117.20m-130.10m WHITE M/G S/STONE 130.10m-135.00m WHITE M/G S-S QUARTZ MATRIX 135.00m-136.30m SHALE 136.30m-139.50m WHITE M/G S/STONE 139.50m-142.00m FRACTURED GREY S/STONE 142.00m-148.00m GREY M/G S/STONE	1233m	South
GW024244	0.00m-1.52m Soil 1.52m-3.04m Water Supply	1282m	East
GW102366	0.00m-7.00m SAND	1290m	East
GW101523	0.00m-6.10m UNCONSOLIDATED SAND	1293m	East
GW111320	0.00m-0.18m CONCRETE 0.18m-0.33m SAND,GRAVELLY CLAYEY,M/DENSE 0.33m-0.70m SAND,VERY LOOSE,MOIST 0.70m-1.50m SAND,CLAYEY,MEDIUM DENSE,MOIST,DARK BROWN 1.50m-4.00m SAND,LOOSE, VERY MOIST,BROWN 4.00m-4.50m SAND CLAYEY,MEDIUM DENSE,GREY/BROWN 4.50m-5.20m CLAY SANDY,SOFT,SATURATED,L/PLASTICITY	1297m	North
GW100053	0.00m-0.95m FILL 0.95m-2.12m BROWN PEAT & SAND 2.12m-6.00m WHITESAND (WB) 6.00m-7.00m DARK GREY CLAY	1319m	North
GW101457	0.00m-6.00m sand	1334m	East
GW109824	0.00m-4.50m FILL 4.50m-9.00m LAMINITE 9.00m-17.00m SHALE 17.00m-20.70m SANDSTONE	1362m	North West
GW072413	0.00m-6.00m SAND	1387m	East

Groundwater No	Drillers Log	Distance	Direction
GW075023	0.00m-2.00m PEATY SAND 2.00m-8.00m SAND,FINE GRAINED,YELLOW 8.00m-9.50m SAND,DENSE,FINE,OLIVE GREY 9.50m-11.00m PEATY SAND,DARK BROWN 11.00m-12.00m SAND.GREY 12.00m-14.00m PEATY SAND,DARK BROWN 14.00m-15.00m SANDY PEAT,BLACK 15.00m-19.00m CLAYEY SAND,BROWN 19.00m-26.00m CLAY,DARK GREY	1388m	East
GW107395	0.00m-0.40m MOSTLY ASH 0.40m-1.00m SILTY SAND 1.00m-3.60m GRADES TO PALE GREY	1389m	East
GW105150	0.00m-5.00m SAND	1400m	East
GW109821	0.00m-2.20m FILL 2.20m-35.00m ASHFIELD SHALE	1413m	North
GW109825	0.00m-4.50m FILL 4.50m-22.00m SHALE	1415m	North
GW106987	0.00m-7.00m Sand	1435m	East
GW107396	0.00m-0.30m SILTY SAND 0.30m-1.00m SILTY SAND,MEDIUM DENSITY 1.00m-3.50m GRADES TO PALE GREY BROWN SAT.	1438m	East
GW023605	0.00m-0.60m Sand Grey 0.60m-4.57m Sand White Water Supply	1466m	East
GW107397	0.00m-0.50m SILTY SAND 0.50m-2.50m SILTY SAND,MEDIUM DENSITY 2.50m-3.60m GRADES TO YELLO/GREY	1470m	East
GW105117	0.00m-0.60m GREY SAND 0.60m-0.80m ROCK 0.80m-3.50m SAND LIGHT BROWN 3.50m-6.30m YELLOW SAND 6.30m-9.80m WHITE SAND 9.80m-9.90m GREY CLAY 9.90m-13.30m GREY SAND 13.30m-14.00m PEATY SAND	1477m	East
GW110457	0.00m-0.25m CONCRETE 0.25m-0.90m FILL 0.90m-1.70m SANDY SILT,SILT 1.70m-3.60m SAND	1495m	North
GW023168	0.00m-4.57m Sand White Water Supply	1519m	North East
GW110456	0.00m-0.30m CONCRETE 0.30m-0.50m FILL 0.50m-0.60m CONCRETE 0.60m-1.80m SILTY SAND 1.80m-3.60m SAND	1544m	North
GW110458	0.00m-0.70m FILL 0.70m-2.80m SANDS	1570m	North East
GW100852	0.00m-6.10m UNCONSOLIDATED ALL SAND	1577m	North East
GW023500	0.00m-5.48m Sand Water Supply	1585m	North East
GW104866	0.00m-6.71m UNCONSOLIDATED ALL SAND	1593m	South East
GW100966	0.00m-5.50m UNCONSOLIDATEDALL SANDS	1617m	East
GW026070	0.00m-3.65m Sand	1626m	East
GW101477	0.00m-6.00m SAND	1626m	East
GW072632		1627m	East
GW101787	0.00m-5.79m Unconsolidated Sand	1630m	East
GW101475	0.00m-6.00m SAND	1643m	East

Groundwater No	Drillers Log	Distance	Direction
GW023472	0.00m-0.60m Sand Grey 0.60m-1.52m Sand White 1.52m-1.82m Sand Hard Cemented 1.82m-3.65m Sand Yellow Water Supply	1668m	East
GW104922	0.00m-7.00m SAND	1669m	East
GW023162	0.00m-2.43m Sand White 2.43m-4.87m Loam Water Supply	1694m	East
GW072633		1703m	East
GW110909	0.00m-0.30m ROADBASE GREY 0.30m-1.00m SAND WITH GRAVEL,BROWN-GREY 1.00m-2.00m SAND WITH GRAVEL DARK GREY 2.00m-3.80m SAND LIGHT BROWN 3.80m-5.80m SAND GREY	1708m	South
GW111456	0.00m-0.60m SAND SILTY 0.60m-6.20m SAND	1716m	South East
GW105152	0.00m-5.00m SAND	1723m	East
GW101446	0.00m-6.00m SAND	1726m	East
GW112603	0.00m-1.30m FILL, SANDY ,GRAVELLY,,GRAVEL 1.30m-4.00m SILTY SAND, BROWN,M/GRAINED,WELL GRADED 4.00m-5.00m SILTY SAND,DARK BROWN.FINE TO MED. GRAINED	1730m	North East
GW112600	0.00m-0.30m CONCRETE 0.30m-4.60m (Unknown)	1731m	North East
GW072634	0.00m-6.10m Unconsolidated Sand	1732m	East
GW072455	0.00m-5.80m UNCONSOLIDATED ALL SAND	1740m	East
GW112602	0.00m-1.50m FILL, CLAYEY,GRAVELLY,BROWN,DRY TO MOIST 1.50m-5.00m SILTY SAND,BROWN TO D/BROWN,WET	1746m	North East
GW023561	0.00m-0.91m Sand Black 0.91m-5.48m Sand White Water Supply	1747m	East
GW023968	0.00m-2.43m Sand White 2.43m-4.57m Loam Water Supply	1754m	East
GW112598	0.00m-0.30m CONCRETE 0.30m-1.30m SANDSTONE CRUSHED 1.30m-3.50m SAND,DARK BROWN,FINE TO MEDIUM GRAINED 3.50m-4.50m SAND MOIST TO WET 4.50m-5.00m SAND BROWN TO LIGHT BROWN , WET	1762m	North East
GW111457	0.00m-0.09m ASPHALT 0.09m-0.20m BASE COURSE 0.20m-0.60m SAND FILLING 0.60m-1.30m SAND 1.30m-2.00m COFFEE ROCK 2.00m-6.20m SAND	1764m	South East
GW112599	0.00m-0.30m CONCRETE 0.30m-0.80m GRAVELLY SAND,FILO,DARK BROWN 0.80m-1.60m SAND GREY FINE TO MED. GRAINED 1.60m-3.50m SAND TO DARK BROWN 3.50m-4.50m SAND WET	1768m	North East
GW112601	0.00m-0.30m CONCRETE 0.30m-1.30m FILL SANDY BROWN,SOME SANDSTONE 1.30m-5.00m FILL,SANDY,BROWN COARSE,MOIST,WET	1774m	North East
GW025543	0.00m-0.09m Made Ground 0.09m-2.74m Sand Coarse 2.74m-7.62m Sand 7.62m-7.77m Clay Grey 7.77m-9.44m Sand 9.44m-12.49m Sand Grey Water Supply 12.49m-12.80m Wood Peat 12.80m-14.02m Sand Water Supply 14.02m-14.63m Clay Peaty 14.63m-18.28m Sand Water Supply 18.28m-18.59m Clay Peaty	1778m	South East
GW105527	0.00m-0.80m FILL,SANDY GRAVEL 0.80m-2.10m SAND,MEDIUM GRAINED,BROWN/YELLOW 2.10m-5.00m SAND,MEDIUM GRAINED,YELLOW/WHITE	1778m	North East

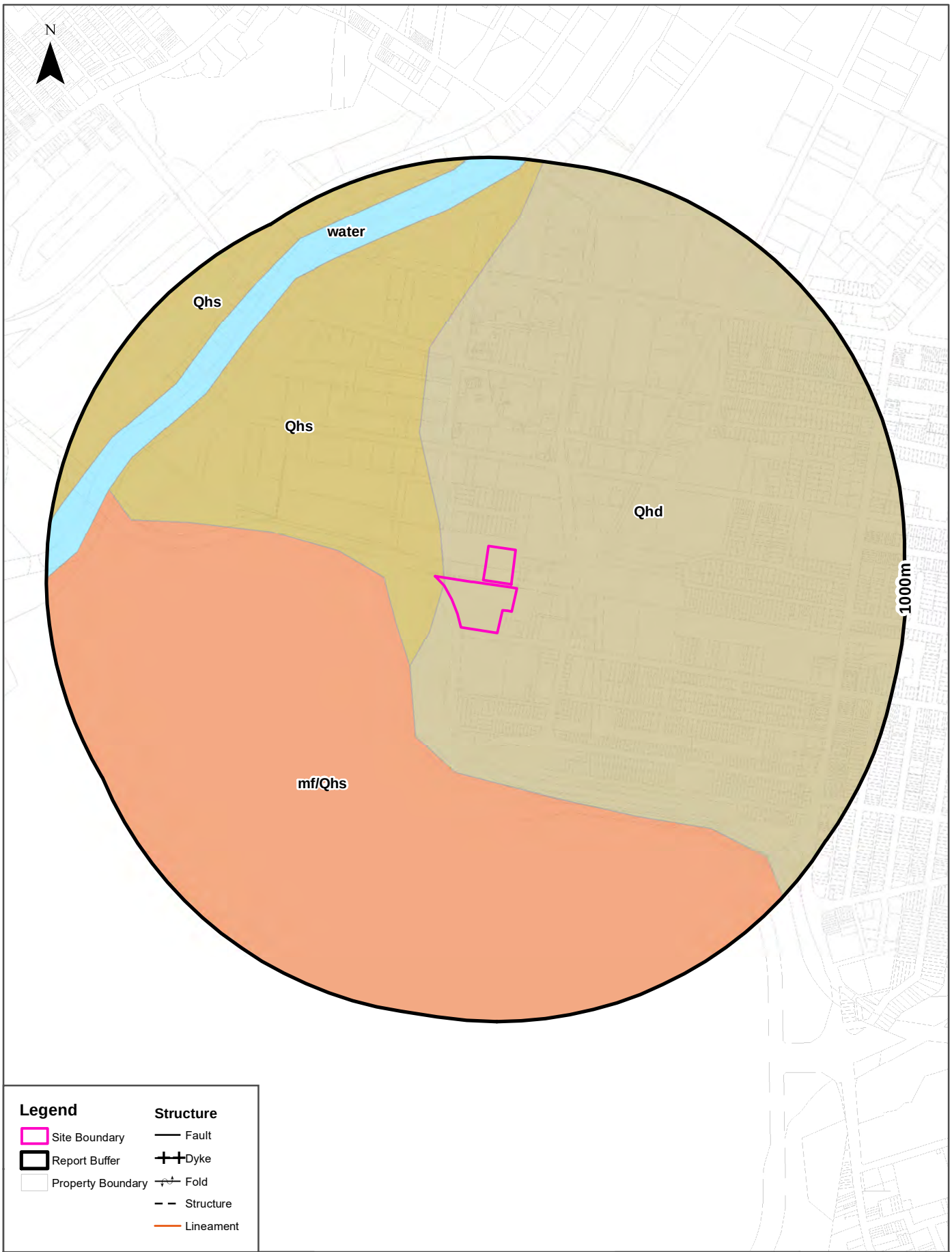
Groundwater No	Drillers Log	Distance	Direction
GW105528	0.00m-1.00m SAND,GREY,SOME GRAVEL,CLAY WET 1.00m-1.50m GRAVELLY CLAY,YELLOW BROWN 1.50m-2.50m SANDY SILT,BLACK 2.50m-4.00m SAND,L/BROWN,GREY 4.00m-5.00m SAND GREY,L/BROWN	1780m	North East
GW112597	0.00m-0.80m FILL, CLAYEY, SANDY GRAVELLY,SANDSTONE 0.80m-1.10m SAND. LIGHT GREY,FINE GRAINED,MOIST 1.10m-3.00m SAND TO DARK BROWN 3.00m-3.90m SAMD TO LIGHT BROWN 3.90m-5.00m SAND WET,STRONG HYDROCARBON ODOUR	1781m	North East
GW100575	0.00m-5.00m SAND	1802m	East
GW110906	0.00m-1.00m ROADBASE GREY 1.00m-2.80m SAND GREY 2.80m-5.80m SAND BROWN	1802m	South
GW110910	0.00m-0.30m ROADBASE,GREY 0.30m-1.00m SAND SILTY WITH GRAVEL,GREY,BROWN 1.00m-3.00m SAND BROWN 3.00m-4.50m SAND WITH SHELLS GREY 4.50m-6.00m SAND WITH GRAVELS BLACK.	1805m	South
GW105529	0.00m-2.00m FILL,SILTY SAND/GRAVEL 2.00m-5.00m SAND,BEIGE/BROWN/YELLOW MOT.	1808m	North East
GW110911	0.00m-0.30m ROADBASE GREY 0.30m-2.20m SAND SILTY WITH GRAVEL GREY 2.20m-3.50m SAND WITH SHELLS GREY 3.50m-6.00m SAND WITH SHELLS DARK GREY/BLACK	1830m	South
GW024616	0.00m-5.63m Sand Water Supply	1849m	East
GW101231	0.00m-7.00m Sand	1854m	East
GW100945	0.00m-7.10m ALL SAND UNCONSOLIDATED	1860m	East
GW101161	0.00m-6.10m UNCONSOLIDATED, ALL SAND	1862m	East
GW102800	0.00m-6.10m CONSOLIDATED ALL SANDS	1886m	East
GW110907	0.00m-0.30m ROADBASE GREY 0.30m-0.90m SILTY SAND 0.90m-1.20m SAND,SILTY GREY BROWN 1.20m-3.50m SAND DARK GREY 3.50m-5.80m SAND LIGHT GREY	1892m	South
GW100997	0.00m-8.23m UNCONSOLIDATED SAND	1893m	East
GW017782	0.00m-1.82m Made Ground 1.82m-4.26m Peat 4.26m-4.87m Sand Peaty 4.87m-9.44m Sand 9.44m-10.36m Clay Sandy 10.36m-11.88m Sand Clay 11.88m-14.63m Sand 14.63m-15.54m Sand Clay	1901m	North East
GW110908	0.00m-0.30m ROAD BASE GREY 0.30m-1.00m SAND WITH GRAVEL GREY 1.00m-4.00m SAND DARK GREY 4.00m-6.00m SAND LIGHT GREY,BROWN	1913m	South
GW100993	0.00m-5.49m UNCONSOLIDATED ALL SANDS	1917m	East
GW023967	0.00m-1.82m Sand White 1.82m-2.43m Sand Grey Water Supply 2.43m-2.74m Mud Black	1919m	East
GW072328	0.00m-1.00m FELT 1.00m-8.00m PEATY WHITE SAND 8.00m-9.50m BROWN PEATY SAND 9.50m-10.80m PEAT ON CLAY 10.80m-13.00m BROWN PEATY SAND 13.00m-14.00m SHALEY GREY CLAY	1921m	North East
GW101813	0.00m-8.54m UNCONSOLIDATED SAND	1922m	East
GW100975	0.00m-6.10m UNCONSOLIDATED ALL SANDS	1938m	North East

Groundwater No	Drillers Log	Distance	Direction
GW023408	0.00m-1.52m Soil Black Hard 1.52m-7.01m Sand Water Supply	1947m	East
GW101221	0.00m-6.10m Unconsolidated - all sand.	1950m	North East
GW109255	0.00m-0.30m FILL, SAND AND GRAVEL 0.30m-2.90m SILTY SAND,WET @ 1.55m BGL 2.90m-7.30m SAND	1950m	South East
GW023600	0.00m-0.60m Sand Grey 0.60m-7.31m Sand Yellow Water Supply	1970m	East
GW072214		1971m	East
GW114562	0.00m-0.05m ASPHALT 0.05m-0.18m CONCRETE 0.18m-0.58m SILTY SAND DARK BROWN MG.SOFT 0.58m-0.75m SAND, LIGHT BROWN, soft 0.75m-0.95m SILTY SAND DARK BROWN MG.SOFT 0.95m-1.05m SAND,WHITE ORANGE MOTTLED,SOFT 1.05m-1.55m GRAVELLY SAND, LIGHT BEOWN SOFT 1.55m-1.75m SAND ORANGE SOFT 1.75m-2.25m CLAY DARK BROWN FG, SOFT 2.25m-2.70m SILTY CLAY DARK BROWN FG SOFT	1972m	North
GW109254	0.00m-0.30m FILL, SAND AND GRAVEL 0.30m-2.60m SILTY SAND WET @ 1.0 m 2.60m-9.70m SAND	1975m	South East
GW114561	0.00m-0.15m ASPHALT 0.15m-0.21m CONCRETE 0.22m-0.50m SILTY SAND BLACK ,CG,SOFT 0.50m-1.00m SAND GREY BROWN CG BROWN 1.00m-1.50m SAND WHITE CG SOFT 1.50m-1.60m SANDY CLAY BLACK SOFT 1.60m-2.15m SAND GREY CG SOFT 2.15m-2.70m SAND BROWN,CG,SOFT	1976m	North
GW109253	0.00m-0.60m FILL, SAND 0.60m-2.80m SILTY SAND 2.80m-10.30m SAND WET BELOW 1.4 m	1978m	South East
GW114563	0.00m-0.08m ASPHALT 0.08m-0.21m CONCRETE 0.21m-0.31m SAND LIGHT BROWN, SOFT 0.31m-0.99m SILTY SAND,DARK BROWN MG SOFT 0.99m-1.23m SANDY CLAY BROWN SOFT FG 1.23m-1.31m SANDY CLAY BROWN SOFT FG 1.31m-1.95m SAND LIGHT BROWN SOFT 1.95m-2.52m CLAYEY SAND,DARK BROWN SOFT 2.52m-2.80m CLAY DARK BROWN SOFT 2.80m-3.34m CLAYEY SAND, DADRK BROWN SOFT 3.34m-3.54m CLAY, DARK BROWN SOFT 3.54m-3.90m CLAY, DARK BROWN SOFT	1989m	North
GW100367	0.00m-6.00m ALL SAND - UNCONSOLIDATED	1996m	East

Drill Log Data Source: NSW Department of Primary Industries - Office of Water / Water Administration Ministerial Corp
Creative Commons 3.0 © Commonwealth of Australia http://creativecommons.org/licenses/by/3.0/au/deed.en

Geology 1:100,000

297 King Street, Mascot, NSW 2020



Geology

297 King Street, Mascot, NSW 2020

Geological Units

What are the Geological Units onsite?

Symbol	Description	Unit Name	Group	Sub Group	Age	Dom Lith	Map Sheet	Dataset
Qhd	Medium to fine-grained marine sand with podsols				Quaternary		Sydney	1:100,000
Qhs	Peat, sandy peat, and mud.				Quaternary		Sydney	1:100,000

What are the Geological Units within the dataset buffer?

Symbol	Description	Unit Name	Group	Sub Group	Age	Dom Lith	Map Sheet	Dataset
mf/Qhs							Sydney	1:100,000
Qhd	Medium to fine-grained marine sand with podsols				Quaternary		Sydney	1:100,000
Qhs	Peat, sandy peat, and mud.				Quaternary		Sydney	1:100,000
water							Sydney	1:100,000

Geological Structures

What are the Geological Structures onsite?

Feature	Name	Description	Map Sheet	Dataset
No features				1:100,000

What are the Geological Structures within the dataset buffer?

Feature	Name	Description	Map Sheet	Dataset
No features				1:100,000

Geological Data Source : NSW Department of Industry, Resources & Energy
© State of New South Wales through the NSW Department of Industry, Resources & Energy

Naturally Occurring Asbestos Potential

297 King Street, Mascot, NSW 2020

Naturally Occurring Asbestos Potential

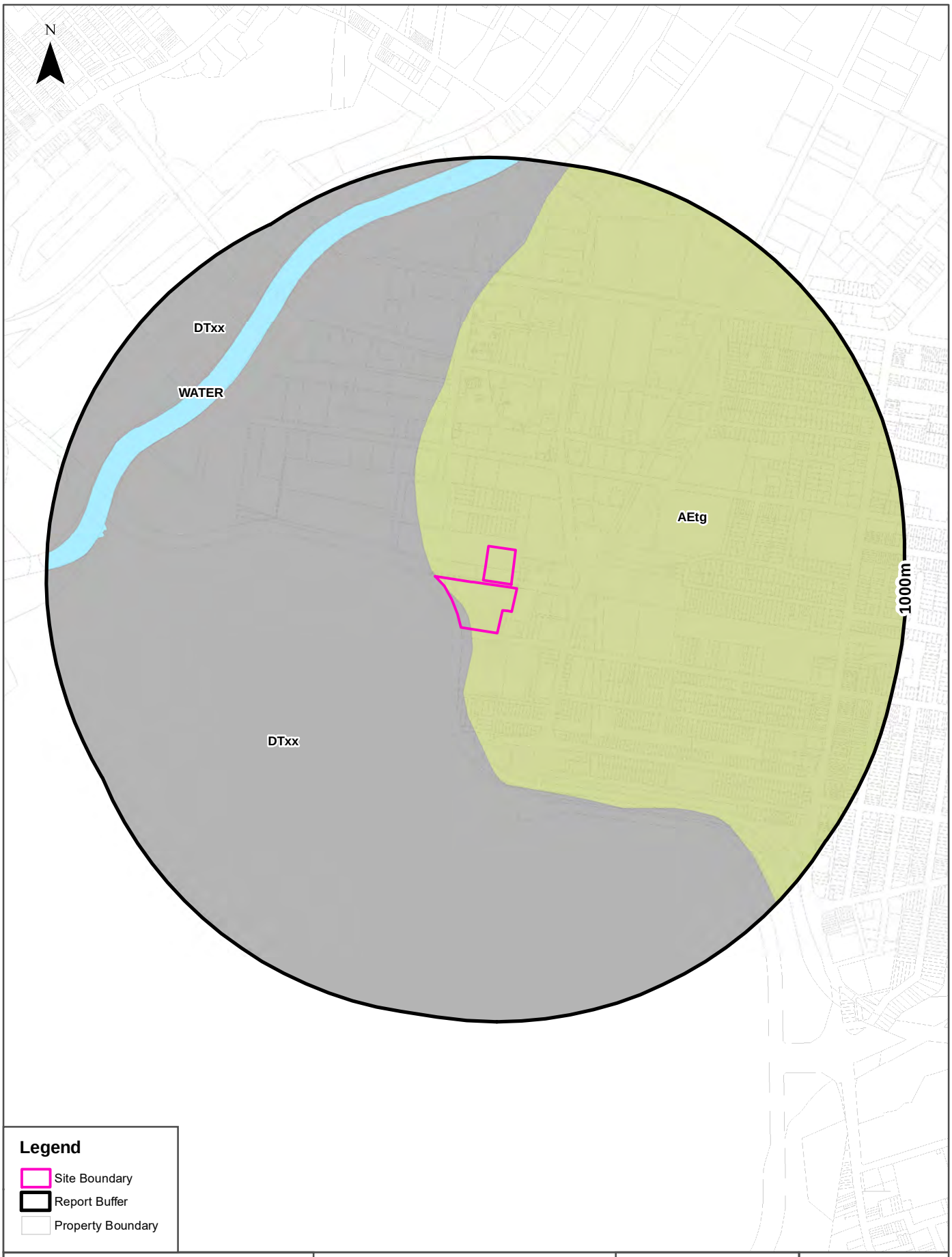
Naturally Occurring Asbestos Potential within the dataset buffer:

Potential	Sym	Strat Name	Group	Formation	Scale	Min Age	Max Age	Rock Type	Dom Lith	Description	Dist	Dir
No records in buffer												

Mining Subsidence District Data Source: © State of New South Wales through NSW Department of Industry, Resources & Energy

Soil Landscapes

297 King Street, Mascot, NSW 2020



Soils

297 King Street, Mascot, NSW 2020

Soil Landscapes

What are the onsite Soil Landscapes?

Soil Code	Name	Group	Process	Map Sheet	Scale
AEtg	TUGGERAH		AEOLIAN	Sydney	1:100,000
DTxx	DISTURBED TERRAIN		DISTURBED TERRAIN	Sydney	1:100,000

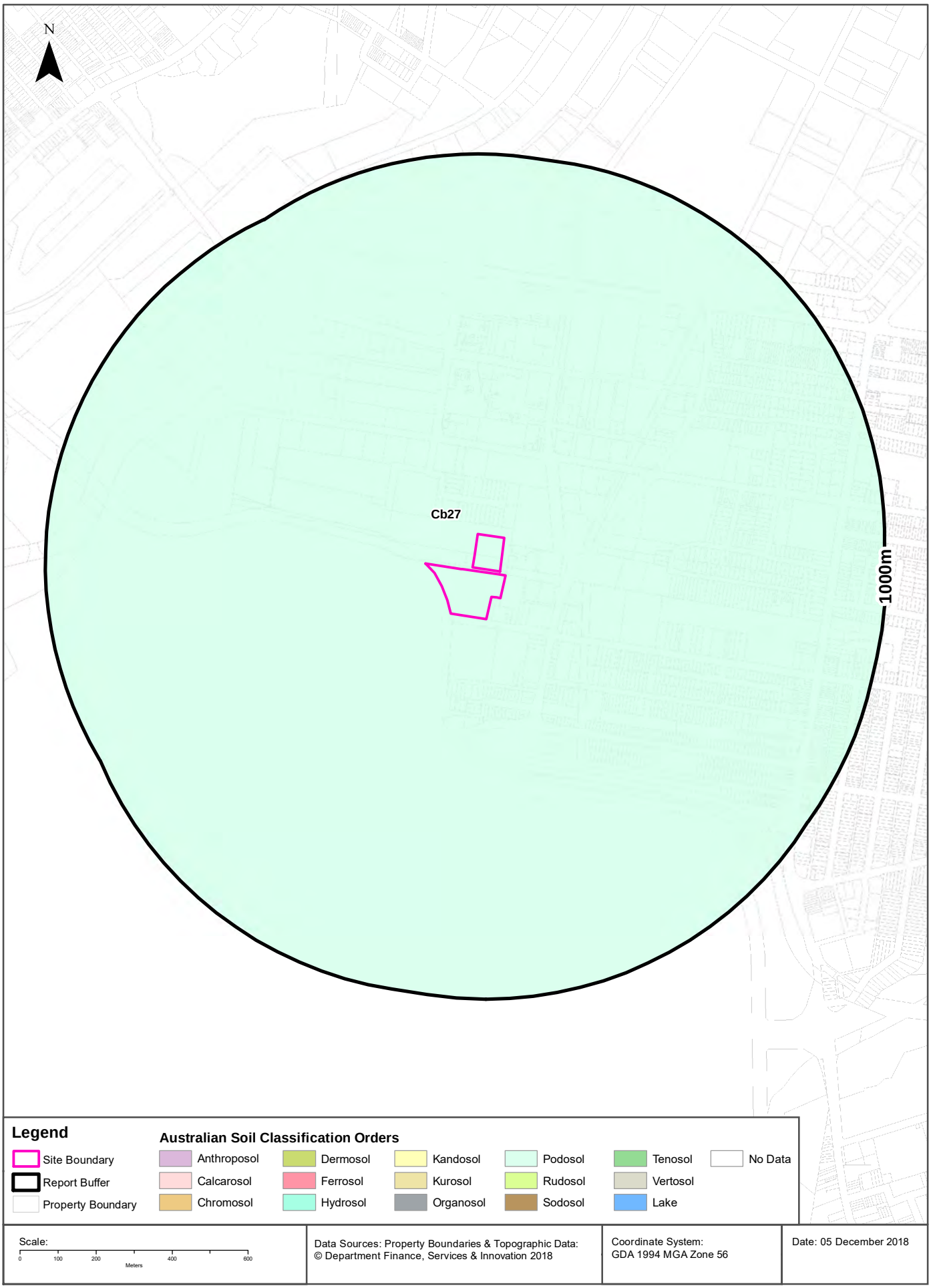
What are the Soil Landscapes within the dataset buffer?

Soil Code	Name	Group	Process	Map Sheet	Scale
AEtg	TUGGERAH		AEOLIAN	Sydney	1:100,000
DTxx	DISTURBED TERRAIN		DISTURBED TERRAIN	Sydney	1:100,000
WATER	WATER		WATER	Sydney	1:100,000

Soils Landscapes Data Source : NSW Office of Environment and Heritage
Creative Commons 3.0 © Commonwealth of Australia http://creativecommons.org/licenses/by/3.0/au/deed.en

Atlas of Australian Soils

297 King Street, Mascot, NSW 2020



Soils

297 King Street, Mascot, NSW 2020

Atlas of Australian Soils

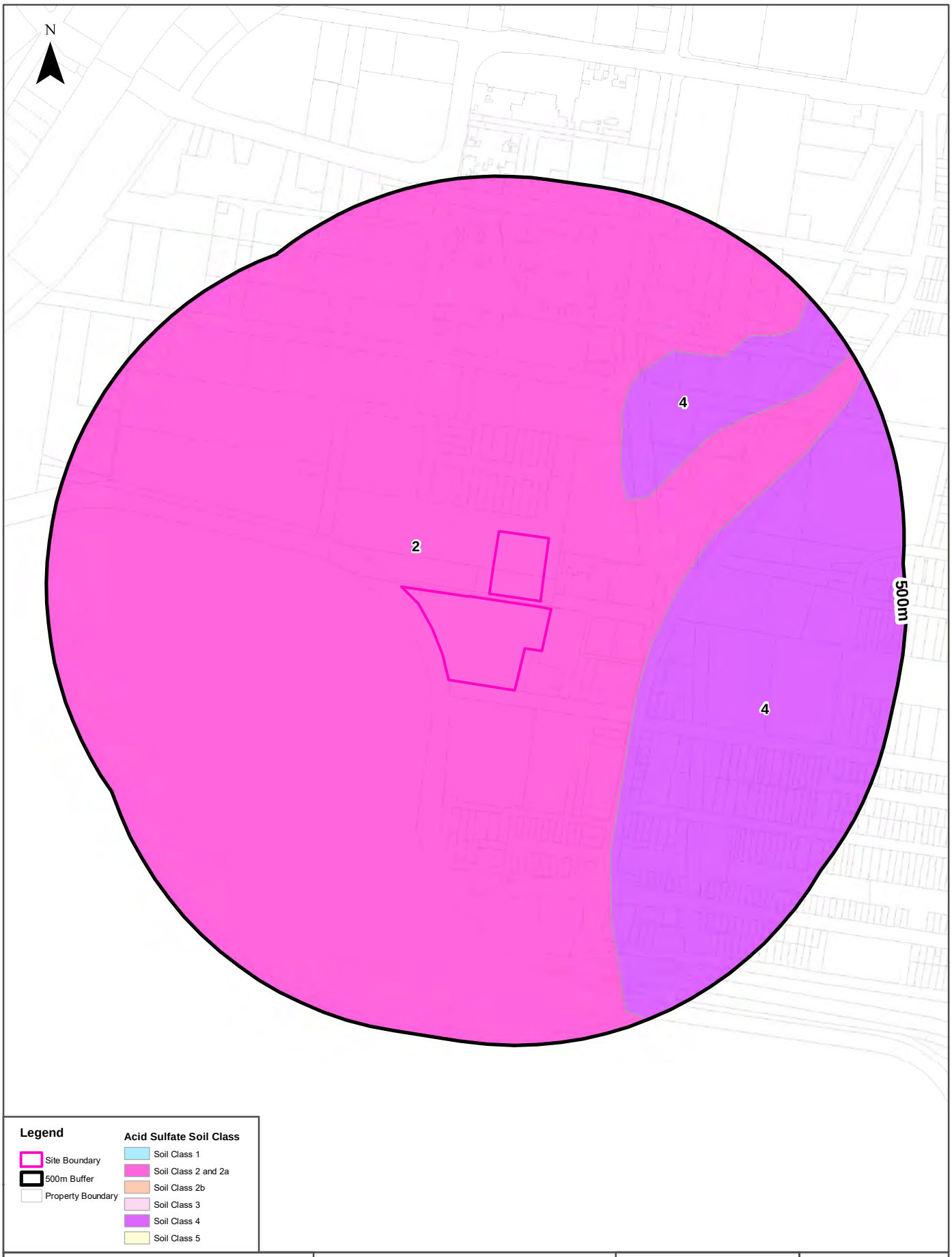
Soil mapping units and Australian Soil Classification orders within the dataset buffer:

Map Unit Code	Soil Order	Map Unit Description	Distance
Cb27	Podosol	Coastal sand plains and dunes, lagoons, and swampy areas: chief soils are leached sands (Uc2.3 and Uc2.2). Associated are dunes of siliceous sands (Uc1.2) and/or calcareous sands (Uc1.l) fringing the coastline; and swampy areas of (Uf6) soils and (Uc1.2) soils with peaty surfaces. Unit Cb27 has similarities with units Cb28 and Ca6.	0m

Atlas of Australian Soils Data Source: CSIRO
Creative Commons 4.0 © Commonwealth of Australia http://creativecommons.org/licenses/by/4.0/au/deed.en

Acid Sulfate Soils

297 King Street, Mascot, NSW 2020



Scale:	Data Sources: Property Boundaries & Topographic Data: © Department Finance, Services & Innovation 2018	Coordinate System: GDA 1994 MGA Zone 56	Date: 05 December 2018

Acid Sulfate Soils

297 King Street, Mascot, NSW 2020

Environmental Planning Instrument - Acid Sulfate Soils

What is the on-site Acid Sulfate Soil Plan Class that presents the largest environmental risk?

Soil Class	Description	EPI
2	Works below natural ground surface present an environmental risk; Works by which the watertable is likely to be lowered present an environmental risk	Botany Bay Local Environmental Plan 2013

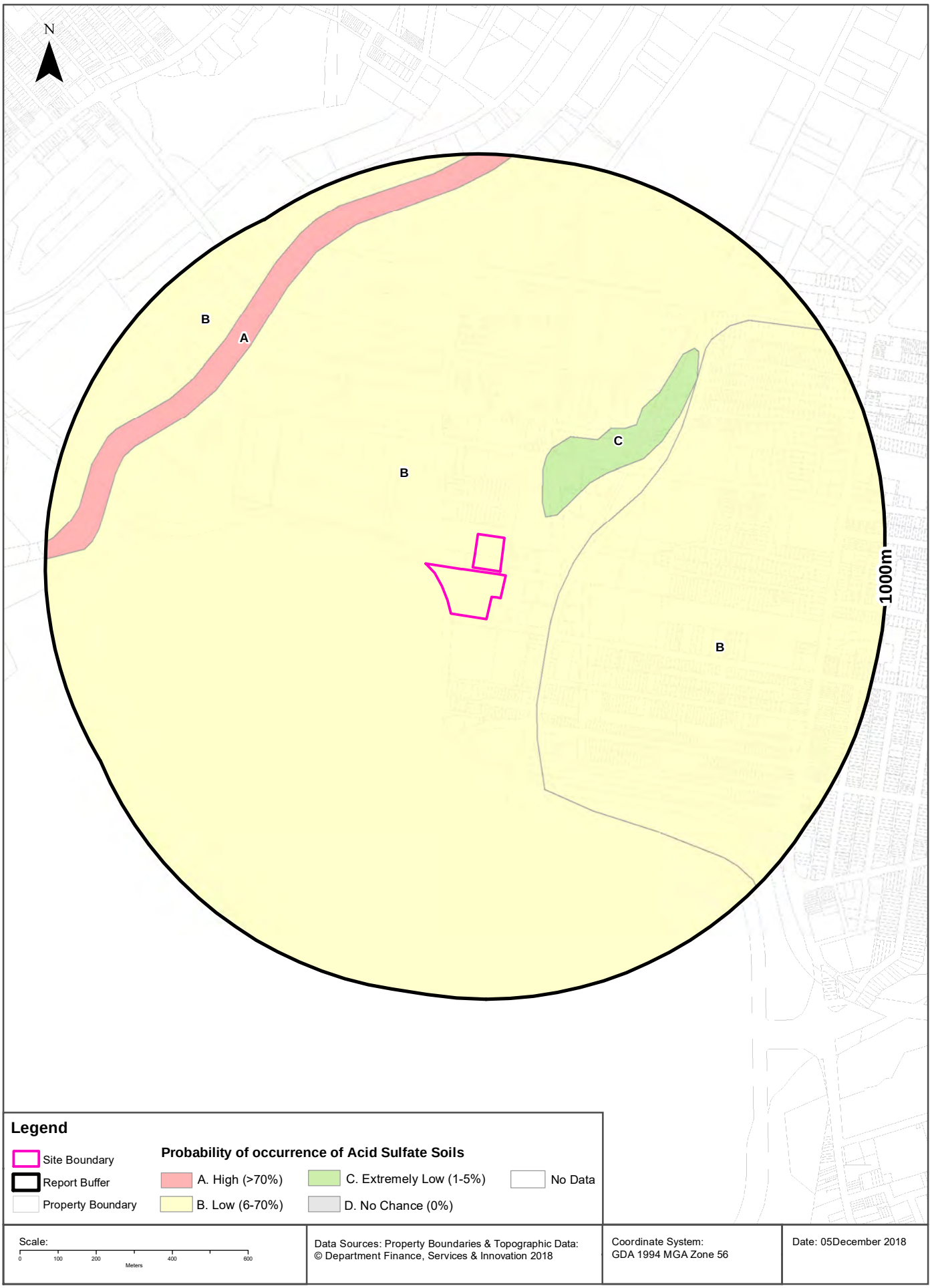
If the on-site Soil Class is 5, what other soil classes exist within 500m?

Soil Class	Description	EPI	Distance	Direction
N/A				

Acid Sulfate Data Source Accessed 23/10/2018: NSW Crown Copyright - Planning and Environment
Creative Commons 4.0 © Commonwealth of Australia https://creativecommons.org/licenses/by/4.0/

Atlas of Australian Acid Sulfate Soils

297 King Street, Mascot, NSW 2020



Acid Sulfate Soils

297 King Street, Mascot, NSW 2020

Atlas of Australian Acid Sulfate Soils

Atlas of Australian Acid Sulfate Soil categories within the dataset buffer:

Class	Description	Distance
B	Low Probability of occurrence. 6-70% chance of occurrence.	0m
C	Extremely low probability of occurrence. 1-5% chance of occurrence with occurrences in small localised areas.	121m
A	High Probability of occurrence. >70% chance of occurrence.	717m

Atlas of Australian Acid Sulfate Soils Data Source: CSIRO
Creative Commons 3.0 © Commonwealth of Australia http://creativecommons.org/licenses/by/3.0/au/deed.en

Dryland Salinity

297 King Street, Mascot, NSW 2020

Dryland Salinity - National Assessment

Is there Dryland Salinity - National Assessment data onsite?

No

Is there Dryland Salinity - National Assessment data within the dataset buffer?

No

What Dryland Salinity assessments are given?

Assessment 2000	Assessment 2020	Assessment 2050	Distance	Direction
N/A	N/A	N/A	N/A	N/A

Dryland Salinity Data Source : National Land and Water Resources Audit
The Commonwealth and all suppliers of source data used to derive the maps of "Australia, Forecast Areas Containing Land of High Hazard or Risk of Dryland Salinity from 2000 to 2050" do not warrant the accuracy or completeness of information in this product. Any person using or relying upon such information does so on the basis that the Commonwealth and data suppliers shall bear no responsibility or liability whatsoever for any errors, faults, defects or omissions in the information. Any persons using this information do so at their own risk.
In many cases where a high risk is indicated, less than 100% of the area will have a high hazard or risk.

Dryland Salinity Potential of Western Sydney

Dryland Salinity Potential of Western Sydney within the dataset buffer?

Feature Id	Classification	Description	Distance	Direction
N/A	Outside Data Coverage			

Dryland Salinity Potential of Western Sydney Data Source : NSW Office of Environment and Heritage
Creative Commons 3.0 © Commonwealth of Australia http://creativecommons.org/licenses/by/3.0/au/deed.en

Mining Subsidence Districts

297 King Street, Mascot, NSW 2020

Mining Subsidence Districts

Mining Subsidence Districts within the dataset buffer:

District	Distance	Direction
There are no Mining Subsidence Districts within the report buffer		

Mining Subsidence District Data Source: © Land and Property Information (2016)
Creative Commons 3.0 © Commonwealth of Australia http://creativecommons.org/licenses/by/3.0/au/deed.en

Environmental Zoning

297 King Street, Mascot, NSW 2020

State Environmental Planning Policy Protected Areas

Are there any State Environmental Planning Policy Protected Areas onsite or within the dataset buffer?

Dataset	Onsite	Within Site Buffer	Distance
SEPP14 - Coastal Wetlands	No	No	N/A
SEPP26 - Littoral Rainforests	No	No	N/A
SEPP71 - Coastal Protection Zone	No	No	N/A

SEPP Protected Areas Data Source: NSW Department of Planning & Environment
Creative Commons 3.0 © Commonwealth of Australia http://creativecommons.org/licenses/by/3.0/au/deed.en

State Environmental Planning Policy Major Developments (2005)

State Environmental Planning Policy Major Developments within the dataset buffer:

Map Id	Feature	Effective Date	Distance	Direction
N/A	No records within buffer			

SEPP Major Development Data Source: NSW Department of Planning & Environment
Creative Commons 3.0 © Commonwealth of Australia http://creativecommons.org/licenses/by/3.0/au/deed.en

State Environmental Planning Policy Strategic Land Use Areas

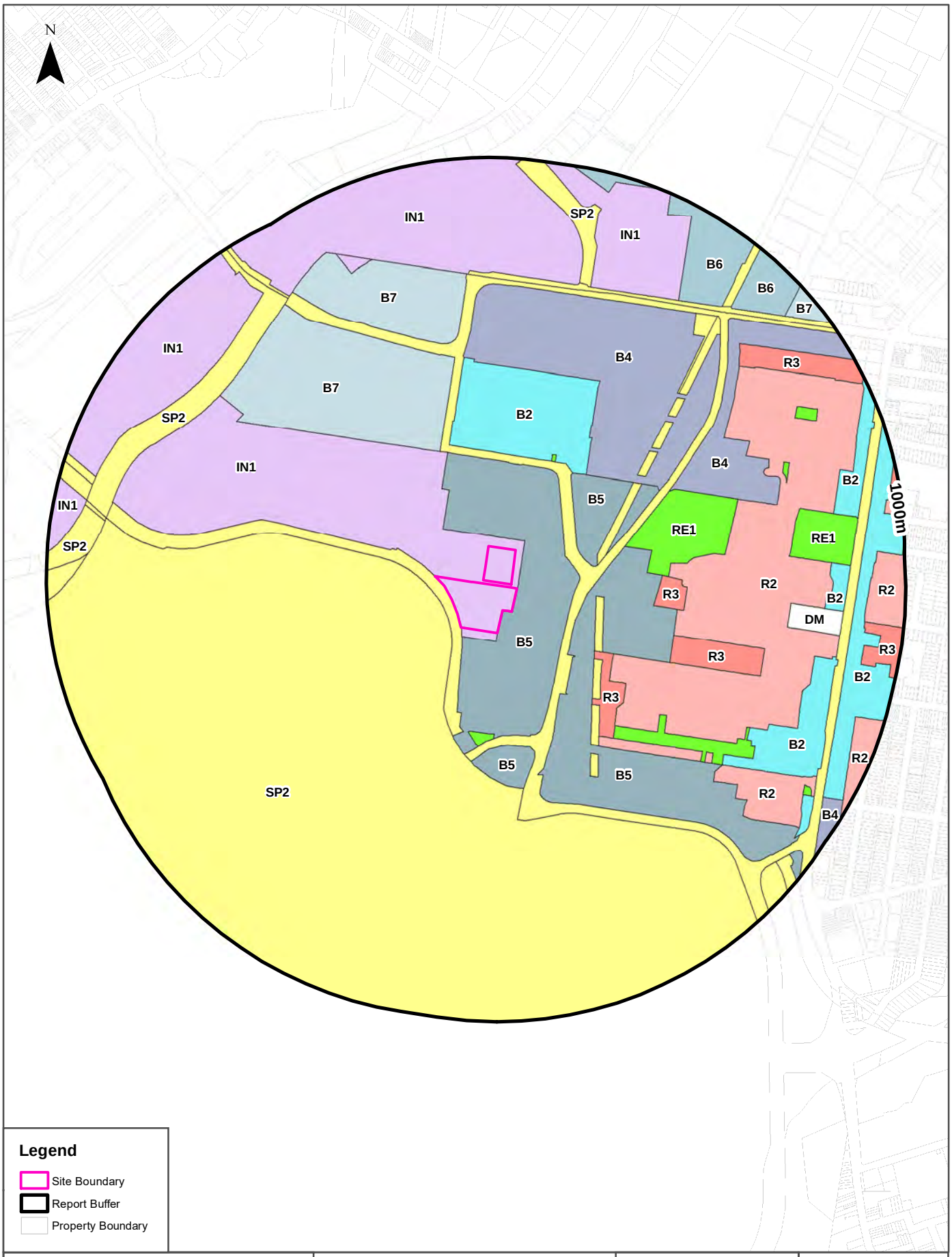
State Environmental Planning Policy Strategic Land Use Areas onsite or within the dataset buffer:

Strategic Land Use	SEPPNo	Effective Date	Amendment	Amendment Year	Distance	Direction
No records within buffer						

SEPP Strategic Land Use Data Source: NSW Department of Planning & Environment
Creative Commons 3.0 © Commonwealth of Australia http://creativecommons.org/licenses/by/3.0/au/deed.en

EPI Planning Zones

297 King Street, Mascot, NSW 2020



Environmental Planning Instrument

297 King Street, Mascot, NSW 2020

Land Zoning

What Environmental Planning Instrument Land Zones exist within the dataset buffer?

Zone	Description	Purpose	LEP or SEPP	Published Date	Commenced Date	Currency Date	Amendment	Distance	Direction
IN1	General Industrial		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		0m	Onsite
B5	Business Development		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		0m	East
SP2	Infrastructure	Railway	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		0m	West
SP2	Infrastructure	Airport	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		27m	South West
SP2	Infrastructure	Classified Road	Botany Bay Local Environmental Plan 2013	09/10/2015	09/10/2015	19/02/2016	Amendment No 4	124m	South East
B5	Business Development		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		156m	North East
B5	Business Development		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		162m	South East
SP2	Infrastructure	Sewerage	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		204m	East
SP2	Infrastructure	Sewerage	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		210m	North East
B5	Business Development		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		230m	North East
R3	Medium Density Residential	<Null>	Botany Bay Local Environmental Plan 2013	09/10/2015	09/10/2015	19/02/2016		234m	South East
B2	Local Centre		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		239m	North
SP2	Infrastructure	Sewerage	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		242m	South East
RE1	Public Recreation		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		245m	North East
RE1	Public Recreation		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		259m	South
B4	Mixed Use		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		264m	North East
B7	Business Park		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		274m	North West
RE1	Public Recreation		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		278m	East
R2	Low Density Residential		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		282m	East
B5	Business Development		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		290m	South
SP2	Infrastructure	Sewerage	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		303m	South East
R3	Medium Density Residential		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		353m	East
SP2	Infrastructure	Sewerage	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		366m	North East
R2	Low Density Residential		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		371m	South East
RE1	Public Recreation		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		384m	South East
SP2	Infrastructure	Sewerage	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		391m	South East
R3	Medium Density Residential		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		418m	East
B4	Mixed Use		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		421m	North East

Zone	Description	Purpose	LEP or SEPP	Published Date	Commenced Date	Currency Date	Amendment	Distance	Direction
SP2	Infrastructure	Sewerage	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		436m	North East
SP2	Infrastructure	Sewerage	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		521m	North East
B7	Business Park		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		531m	North
SP2	Infrastructure	Electricity Substation	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		578m	North East
SP2	Infrastructure	Sewerage	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		581m	North East
R2	Low Density Residential		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		616m	South East
B2	Local Centre		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		656m	South East
R2	Low Density Residential		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		663m	South East
SP2	Infrastructure	Classified Road	Sydney Local Environmental Plan 2012	14/12/2012	14/12/2012	16/12/2016		685m	North East
IN1	General Industrial		Sydney Local Environmental Plan 2012	12/06/2015	12/06/2015	16/12/2016	Amendment No 17	698m	North
DM	Deferred Matter		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		701m	East
RE1	Public Recreation		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		702m	East
SP2	Infrastructure		Sydney Local Environmental Plan 2012	12/06/2015	12/06/2015	16/12/2016	Amendment No 17	703m	North
RE1	Public Recreation		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		713m	East
SP2	Infrastructure	Classified Road	Marrickville Local Environmental Plan 2011	12/12/2011	12/12/2011	06/12/2017		724m	North West
R3	Medium Density Residential		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		743m	North East
B6	Enterprise Corridor		Sydney Local Environmental Plan 2012	12/06/2015	12/06/2015	16/12/2016	Amendment No 17	766m	North East
IN1	General Industrial		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		785m	North
IN1	General Industrial		Marrickville Local Environmental Plan 2011	12/12/2011	12/12/2011	06/12/2017		785m	North West
B2	Local Centre		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		791m	East
RE1	Public Recreation		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		793m	North East
SP2	Infrastructure	Classified Road	Sydney Local Environmental Plan 2012	14/12/2012	14/12/2012	16/12/2016		810m	North
B2	Local Centre		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		821m	North East
SP2	Infrastructure	Classified Road	Sydney Local Environmental Plan 2012	14/12/2012	14/12/2012	16/12/2016		822m	North East
B6	Enterprise Corridor		Sydney Local Environmental Plan 2012	12/06/2015	12/06/2015	16/12/2016	Amendment No 17	833m	North East
SP2	Infrastructure	Air Transport Facilities	Marrickville Local Environmental Plan 2011	12/12/2011	12/12/2011	06/12/2017		860m	West
SP2	Infrastructure	Stormwater Management Systems	Marrickville Local Environmental Plan 2011	12/12/2011	12/12/2011	06/12/2017		861m	West
B2	Local Centre		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		863m	East
RE1	Public Recreation		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		874m	South East
B2	Local Centre		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	10/02/2017		884m	South East
R2	Low Density Residential		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		895m	East
SP2	Infrastructure	Air Transport Facilities	Marrickville Local Environmental Plan 2011	12/12/2011	12/12/2011	06/12/2017		895m	West
R3	Medium Density Residential		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		896m	East
SP2	Infrastructure	Air Transport Facilities	Marrickville Local Environmental Plan 2011	12/12/2011	12/12/2011	06/12/2017		910m	West

Zone	Description	Purpose	LEP or SEPP	Published Date	Commenced Date	Currency Date	Amendment	Distance	Direction
SP2	Infrastructure	Air Transport Facilities	Marrickville Local Environmental Plan 2011	12/12/2011	12/12/2011	06/12/2017		913m	West
SP2	Infrastructure	Airport	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		915m	South East
B7	Business Park		Sydney Local Environmental Plan 2012	12/06/2015	12/06/2015	16/12/2016	Amendment No 17	916m	North East
IN1	General Industrial		Marrickville Local Environmental Plan 2011	12/12/2011	12/12/2011	06/12/2017		918m	West
SP2	Infrastructure	Railway	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		926m	South East
B4	Mixed Use		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		930m	South East
B5	Business Development		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		941m	South East
R3	Medium Density Residential		Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	19/02/2016		976m	East

Environmental Planning Instrument Data Source: NSW Crown Copyright - Planning & Environment
Creative Commons 4.0 © Commonwealth of Australia https://creativecommons.org/licenses/by/4.0/

Environmental Planning Instrument

297 King Street, Mascot, NSW 2020

Minimum Lot Size

What are the onsite Environmental Planning Instrument Minimum Lot Sizes?

Symbol	Minimum Lot Size	LEP or SEPP	Published Date	Commenced Date	Currency Date	Amendment	Percentage of Site Area
No Data							

Maximum Height of Buildings

What are the onsite Environmental Planning Instrument Maximum Height of Buildings?

Symbol	Maximum Height of Building	LEP or SEPP	Published Date	Commenced Date	Currency Date	Amendment	Percentage of Site Area
23	44.00 m	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015		100

Floor Space Ratio

What are the onsite Environmental Planning Instrument Floor Space Ratios?

Symbol	Floor Space Ratio	LEP or SEPP	Published Date	Commenced Date	Currency Date	Amendment	Percentage of Site Area
16	1.20	LEP	10/07/2015	10/07/2015	09/10/2015	Amendment No 1	99.8
84	3.00	LEP	21/06/2013	21/06/2013	09/10/2015		0.2

Land Application

What are the onsite Environmental Planning Instrument Land Applications?

Application Type	LEP or SEPP	Published Date	Commenced Date	Currency Date	Amendment	Percentage of Site Area
Included	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	21/06/2013		100

Land Reservation Acquisition

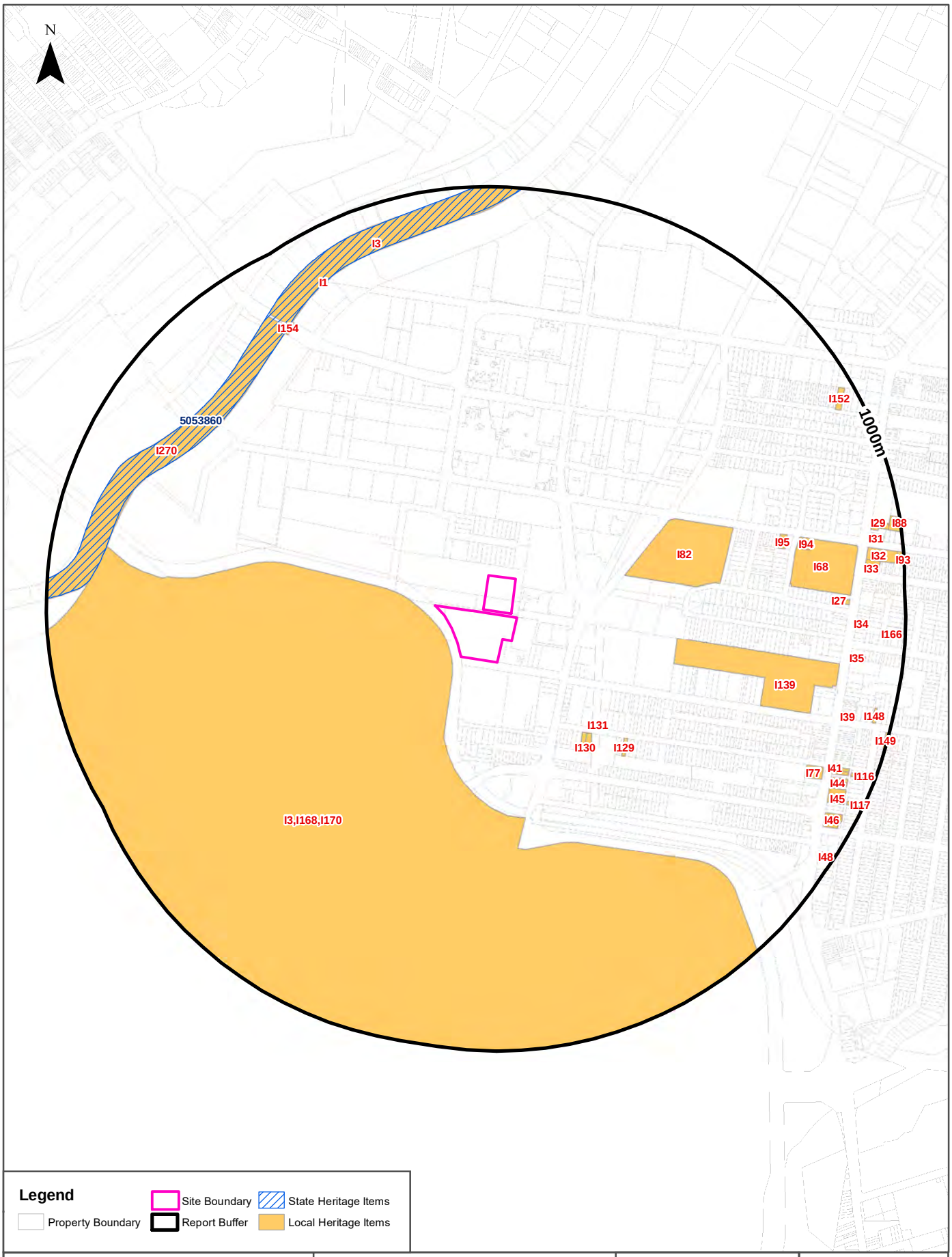
What are the onsite Environmental Planning Instrument Land Reservation Acquisitions?

Reservation	LEP or SEPP	Published Date	Commenced Date	Currency Date	Amendment	Comments	Percentage of Site Area
No Data							

Environmental Planning Instrument Data Source: NSW Crown Copyright - Planning & Environment
Creative Commons 4.0 © Commonwealth of Australia https://creativecommons.org/licenses/by/4.0/

Heritage Items

297 King Street, Mascot, NSW 2020



Heritage

297 King Street, Mascot, NSW 2020

State Heritage Register - Curtilages

What are the State Heritage Register Items located within the dataset buffer?

Map Id	Name	Address	LGA	Listing Date	Listing No	Plan No	Distance	Direction
5053860	Alexandra Canal	Alexandria	Botany Bay	15/11/2002	01621	2038	725m	North West

Heritage Data Source: NSW Crown Copyright - Office of Environment & Heritage
Creative Commons 4.0 © Commonwealth of Australia https://creativecommons.org/licenses/by/4.0/

Environmental Planning Instrument - Heritage

What are the EPI Heritage Items located within the dataset buffer?

Map Id	Name	Classification	Significance	EPI	Published Date	Commenced Date	Currency Date	Distance	Direction
I3,I168,I170	Commonwealth Water Pumping Station and Sewerage Pumping Station	Item - General	State	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	25m	South West
I82	Mascot Park	Item - Landscape	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	278m	East
I131	House - "Daktari"	Item - General	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	282m	South East
I130	Mature Ficus	Item - Landscape	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	292m	South East
I129	House group	Item - General	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	379m	South East
I139	Mascot Public School Building Group	Item - General	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	414m	East
I95	M.B.W.S. Pumping Station	Item - General	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	678m	East
I68	Memorial Park	Item - Landscape	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	703m	East
I270	Alexandra Canal	Item - General	State	Marrickville Local Environmental Plan 2011	12/12/2011	12/12/2011	22/12/2017	724m	West
I1	Alexandra Canal (incl sandstone embankment)	Item - General	State	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	725m	North West
I94	Botany Family Day Care	Item - General	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	738m	East
I154	Ricketty Street Bridge	Item - General	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	792m	North West
I27	Mature Ficus	Item - Landscape	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	806m	East
I3	Alexandra Canal	Item - General	State	Sydney Local Environmental Plan 2012	14/12/2012	14/12/2012	06/05/2016	813m	North

Map Id	Name	Classification	Significance	EPI	Published Date	Commenced Date	Currency Date	Distance	Direction
I77	Former Tennyson Hotel	Item - General	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	821m	South East
I35	House	Item - General	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	863m	East
I39	Commercial Building Group	Item - General	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	868m	East
I34	Mature Hoop Pine	Item - Landscape	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	871m	East
I41	Commercial Building Group	Item - General	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	886m	South East
I42	Commercial Building Group	Item - General	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	888m	South East
I43	Commercial Building Group	Item - General	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	892m	South East
I44	Commercial Building Group	Item - General	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	894m	South East
I33	Commercial Building Group	Item - General	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	895m	East
I45	Commercial Building Group	Item - General	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	899m	South East
I32	Coronation Hall	Item - General	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	901m	East
I31	Former National Bank of Australasia	Item - General	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	914m	East
I46	Commercial Building Group	Item - General	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	918m	South East
I30	Electricity Substation No.147	Item - General	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	921m	East
I29	House Group	Item - General	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	923m	East
I152	House	Item - General	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	929m	North East
I116	House	Item - General	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	935m	East
I148	House	Item - General	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	947m	East
I166	House	Item - General	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	947m	East
I117	House	Item - General	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	954m	South East
I48	Single Storey Terrace Group	Item - General	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	958m	South East
I88	Uniting Church and Rectory	Item - General	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	965m	East
I93	Fire Station	Item - General	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	976m	East
I149	Terrace Group	Item - General	Local	Botany Bay Local Environmental Plan 2013	21/06/2013	21/06/2013	09/10/2015	989m	East

Heritage Data Source: NSW Crown Copyright - Planning & Environment
Creative Commons 4.0 © Commonwealth of Australia https://creativecommons.org/licenses/by/4.0/

Natural Hazards

297 King Street, Mascot, NSW 2020

Bush Fire Prone Land

What are the nearest Bush Fire Prone Land Categories that exist within the dataset buffer?

Bush Fire Prone Land Category	Distance	Direction
No records within buffer		

NSW Bush Fire Prone Land - © NSW Rural Fire Service under Creative Commons 4.0 International Licence

Ecological Constraints - Native Vegetation & RAMSAR Wetlands

297 King Street, Mascot, NSW 2020



Ecological Constraints

297 King Street, Mascot, NSW 2020

Native Vegetation

What native vegetation exists within the dataset buffer?

Map ID	Map Unit Name	Threatened Ecological Community NSW	Threatened Ecological Community EPBC Act	Understorey	Disturbance	Disturbance Index	Dominant Species	Dist	Direction
Urban_E/N	Urban_E/N: Urban Exotic/Native			00: Not assessed	00: Not assessed	0: Not assessed	Urban Exotic/Native	0m	Onsite
Weed_Ex	Weed_Ex: Weeds and Exotics			00: Not assessed	00: Not assessed	0: Not assessed	Exotic Species >90%cover	899m	South East
S_SW01	S_SW01: Estuarine Mangrove Forest			00: Not assessed	00: Not assessed	0: Not assessed	Mangroves	931m	North

Native Vegetation of the Sydney Metropolitan Area : NSW Office of Environment and Heritage
Creative Commons 3.0 © Commonwealth of Australia http://creativecommons.org/licenses/by/3.0/au/deed.en

Ramsar Wetlands

What Ramsar Wetland areas exist within the dataset buffer?

Map Id	Ramsar Name	Wetland Name	Designation Date	Source	Distance	Direction
N/A	No records in buffer					

Ramsar Wetlands Data Source: © Commonwealth of Australia - Department of Environment

Ecological Constraints

297 King Street, Mascot, NSW 2020

Groundwater Dependent Ecosystems Atlas

Type	GDE Potential	Geomorphology	Ecosystem Type	Aquifer Geology	Distance
N/A	No records within buffer				

Groundwater Dependent Ecosystems Atlas Data Source: The Bureau of Meteorology
Creative Commons 3.0 © Commonwealth of Australia http://creativecommons.org/licenses/by/3.0/au/deed.en

Ecological Constraints

297 King Street, Mascot, NSW 2020

Inflow Dependent Ecosystems Likelihood

Type	IDE Likelihood	Geomorphology	Ecosystem Type	Aquifer Geology	Distance
N/A	No records within buffer				

Inflow Dependent Ecosystems Likelihood Data Source: The Bureau of Meteorology
Creative Commons 3.0 © Commonwealth of Australia http://creativecommons.org/licenses/by/3.0/au/deed.en

Ecological Constraints

297 King Street, Mascot, NSW 2020

NSW BioNet Atlas

Species on the NSW BioNet Atlas that have a NSW or federal conservation status, a NSW sensitivity status, or are listed under a migratory species agreement, and are within 10km of the site?

Kingdom	Class	Scientific	Common	NSW Conservation Status	NSW Sensitivity Class	Federal Conservation Status	Migratory Species Agreements
Animalia	Amphibia	Crinia tinnula	Wallum Froglet	Vulnerable	Not Sensitive	Not Listed	
Animalia	Amphibia	Litoria aurea	Green and Golden Bell Frog	Endangered	Not Sensitive	Vulnerable	
Animalia	Amphibia	Pseudophryne australis	Red-crowned Toadlet	Vulnerable	Not Sensitive	Not Listed	
Animalia	Aves	Actitis hypoleucos	Common Sandpiper	Not Listed	Not Sensitive	Not Listed	ROKAMBA;CAMBA;JAMBA
Animalia	Aves	Anseranas semipalmata	Magpie Goose	Vulnerable	Not Sensitive	Not Listed	
Animalia	Aves	Anthochaera phrygia	Regent Honeyeater	Critically Endangered	Not Sensitive	Critically Endangered	
Animalia	Aves	Apus pacificus	Fork-tailed Swift	Not Listed	Not Sensitive	Not Listed	ROKAMBA;CAMBA;JAMBA
Animalia	Aves	Ardea ibis	Cattle Egret	Not Listed	Not Sensitive	Not Listed	CAMBA;JAMBA
Animalia	Aves	Ardenna carneipes	Flesh-footed Shearwater	Vulnerable	Not Sensitive	Not Listed	ROKAMBA;JAMBA
Animalia	Aves	Ardenna pacificus	Wedge-tailed Shearwater	Not Listed	Not Sensitive	Not Listed	JAMBA
Animalia	Aves	Ardenna tenuirostris	Short-tailed Shearwater	Not Listed	Not Sensitive	Not Listed	ROKAMBA;JAMBA
Animalia	Aves	Arenaria interpres	Ruddy Turnstone	Not Listed	Not Sensitive	Not Listed	ROKAMBA;CAMBA;JAMBA
Animalia	Aves	Artamus cyanopterus cyanopterus	Dusky Woodswallow	Vulnerable	Not Sensitive	Not Listed	
Animalia	Aves	Botaurus poiciloptilus	Australasian Bittern	Endangered	Not Sensitive	Endangered	
Animalia	Aves	Burhinus grallarius	Bush Stone-curlew	Endangered	Not Sensitive	Not Listed	
Animalia	Aves	Calidris acuminata	Sharp-tailed Sandpiper	Not Listed	Not Sensitive	Not Listed	ROKAMBA;CAMBA;JAMBA
Animalia	Aves	Calidris alba	Sanderling	Vulnerable	Not Sensitive	Not Listed	ROKAMBA;CAMBA;JAMBA
Animalia	Aves	Calidris bairdii	Baird's Sandpiper	Not Listed	Not Sensitive	Not Listed	ROKAMBA;JAMBA
Animalia	Aves	Calidris canutus	Red Knot	Not Listed	Not Sensitive	Endangered	ROKAMBA;CAMBA;JAMBA
Animalia	Aves	Calidris ferruginea	Curlew Sandpiper	Endangered	Not Sensitive	Critically Endangered	ROKAMBA;CAMBA;JAMBA
Animalia	Aves	Calidris melanotos	Pectoral Sandpiper	Not Listed	Not Sensitive	Not Listed	ROKAMBA;JAMBA
Animalia	Aves	Calidris ruficollis	Red-necked Stint	Not Listed	Not Sensitive	Not Listed	ROKAMBA;CAMBA;JAMBA
Animalia	Aves	Calidris tenuirostris	Great Knot	Vulnerable	Not Sensitive	Critically Endangered	ROKAMBA;CAMBA;JAMBA
Animalia	Aves	Callocephalon fimbriatum	Gang-gang Cockatoo	Vulnerable	Category 3	Not Listed	
Animalia	Aves	Calyptorhynchus lathami	Glossy Black-Cockatoo	Vulnerable	Category 2	Not Listed	
Animalia	Aves	Charadrius leschenaultii	Greater Sand-plover	Vulnerable	Not Sensitive	Vulnerable	ROKAMBA;CAMBA;JAMBA
Animalia	Aves	Charadrius mongolus	Lesser Sand-plover	Vulnerable	Not Sensitive	Endangered	ROKAMBA;CAMBA;JAMBA

Kingdom	Class	Scientific	Common	NSW Conservation Status	NSW Sensitivity Class	Federal Conservation Status	Migratory Species Agreements
Animalia	Aves	Charadrius veredus	Oriental Plover	Not Listed	Not Sensitive	Not Listed	ROKAMBA;JAMBA
Animalia	Aves	Chlidonias leucopterus	White-winged Black Tern	Not Listed	Not Sensitive	Not Listed	ROKAMBA;CAMBA; JAMBA
Animalia	Aves	Dasyornis brachypterus	Eastern Bristlebird	Endangered	Category 2	Endangered	
Animalia	Aves	Diomedea exulans	Wandering Albatross	Endangered	Not Sensitive	Endangered	JAMBA
Animalia	Aves	Diomedea gibsoni	Gibson's Albatross	Vulnerable	Not Sensitive	Vulnerable	
Animalia	Aves	Egretta sacra	Eastern Reef Egret	Not Listed	Not Sensitive	Not Listed	CAMBA
Animalia	Aves	Epthianura albifrons	White-fronted Chat	Endangered Population, Vulnerable	Not Sensitive	Not Listed	
Animalia	Aves	Erythrotriorchis radiatus	Red Goshawk	Critically Endangered	Category 2	Vulnerable	
Animalia	Aves	Esacus magnirostris	Beach Stone-curlew	Critically Endangered	Not Sensitive	Not Listed	
Animalia	Aves	Fregata ariel	Lesser Frigatebird	Not Listed	Not Sensitive	Not Listed	ROKAMBA;CAMBA; JAMBA
Animalia	Aves	Gallinago hardwickii	Latham's Snipe	Not Listed	Not Sensitive	Not Listed	ROKAMBA;CAMBA; JAMBA
Animalia	Aves	Gelochelidon nilotica	Gull-billed Tern	Not Listed	Not Sensitive	Not Listed	CAMBA
Animalia	Aves	Haematopus fuliginosus	Sooty Oystercatcher	Vulnerable	Not Sensitive	Not Listed	
Animalia	Aves	Haematopus longirostris	Pied Oystercatcher	Endangered	Not Sensitive	Not Listed	
Animalia	Aves	Haliaeetus leucogaster	White-bellied Sea-Eagle	Vulnerable	Not Sensitive	Not Listed	CAMBA
Animalia	Aves	Hieraaetus morphnoides	Little Eagle	Vulnerable	Not Sensitive	Not Listed	
Animalia	Aves	Hirundapus caudacutus	White-throated Needletail	Not Listed	Not Sensitive	Not Listed	ROKAMBA;CAMBA; JAMBA
Animalia	Aves	Hydroprogne caspia	Caspian Tern	Not Listed	Not Sensitive	Not Listed	CAMBA;JAMBA
Animalia	Aves	Ixobrychus flavicollis	Black Bittern	Vulnerable	Not Sensitive	Not Listed	
Animalia	Aves	Lathamus discolor	Swift Parrot	Endangered	Category 3	Critically Endangered	
Animalia	Aves	Limicola falcinellus	Broad-billed Sandpiper	Vulnerable	Not Sensitive	Not Listed	ROKAMBA;CAMBA; JAMBA
Animalia	Aves	Limosa lapponica	Bar-tailed Godwit	Not Listed	Not Sensitive	Not Listed	ROKAMBA;CAMBA; JAMBA
Animalia	Aves	Limosa limosa	Black-tailed Godwit	Vulnerable	Not Sensitive	Not Listed	ROKAMBA;CAMBA; JAMBA
Animalia	Aves	Lophochroa leadbeateri	Major Mitchell's Cockatoo	Vulnerable	Category 2	Not Listed	
Animalia	Aves	Lophoictinia isura	Square-tailed Kite	Vulnerable	Category 3	Not Listed	
Animalia	Aves	Macronectes giganteus	Southern Giant Petrel	Endangered	Not Sensitive	Endangered	
Animalia	Aves	Macronectes halli	Northern Giant-Petrel	Vulnerable	Not Sensitive	Vulnerable	
Animalia	Aves	Merops ornatus	Rainbow Bee-eater	Not Listed	Not Sensitive	Not Listed	JAMBA
Animalia	Aves	Neochmia ruficauda	Star Finch	Presumed Extinct	Not Sensitive	Endangered	
Animalia	Aves	Neophema chrysogaster	Orange-bellied Parrot	Critically Endangered	Category 3	Critically Endangered	
Animalia	Aves	Neophema pulchella	Turquoise Parrot	Vulnerable	Category 3	Not Listed	
Animalia	Aves	Ninox strenua	Powerful Owl	Vulnerable	Category 3	Not Listed	
Animalia	Aves	Numenius madagascariensis	Eastern Curlew	Not Listed	Not Sensitive	Critically Endangered	ROKAMBA;CAMBA; JAMBA

Kingdom	Class	Scientific	Common	NSW Conservation Status	NSW Sensitivity Class	Federal Conservation Status	Migratory Species Agreements
Animalia	Aves	Numenius minutus	Little Curlew	Not Listed	Not Sensitive	Not Listed	ROKAMBA;CAMBA; JAMBA
Animalia	Aves	Numenius phaeopus	Whimbrel	Not Listed	Not Sensitive	Not Listed	ROKAMBA;CAMBA; JAMBA
Animalia	Aves	Onychoprion fuscata	Sooty Tern	Vulnerable	Not Sensitive	Not Listed	
Animalia	Aves	Pandion cristatus	Eastern Osprey	Vulnerable	Category 3	Not Listed	
Animalia	Aves	Petroica boodang	Scarlet Robin	Vulnerable	Not Sensitive	Not Listed	
Animalia	Aves	Petroica phoenicea	Flame Robin	Vulnerable	Not Sensitive	Not Listed	
Animalia	Aves	Pezoporus wallicus wallicus	Eastern Ground Parrot	Vulnerable	Category 3	Not Listed	
Animalia	Aves	Phaethon lepturus	White-tailed Tropicbird	Not Listed	Not Sensitive	Not Listed	CAMBA;JAMBA
Animalia	Aves	Pluvialis fulva	Pacific Golden Plover	Not Listed	Not Sensitive	Not Listed	ROKAMBA;CAMBA; JAMBA
Animalia	Aves	Pluvialis squatarola	Grey Plover	Not Listed	Not Sensitive	Not Listed	ROKAMBA;CAMBA; JAMBA
Animalia	Aves	Polytelis swainsonii	Superb Parrot	Vulnerable	Category 3	Vulnerable	
Animalia	Aves	Procelsterna cerulea	Grey Ternlet	Vulnerable	Not Sensitive	Not Listed	
Animalia	Aves	Ptilinopus regina	Rose-crowned Fruit-Dove	Vulnerable	Not Sensitive	Not Listed	
Animalia	Aves	Ptilinopus superbus	Superb Fruit-Dove	Vulnerable	Not Sensitive	Not Listed	
Animalia	Aves	Rostratula australis	Australian Painted Snipe	Endangered	Not Sensitive	Endangered	
Animalia	Aves	Stagonopleura guttata	Diamond Firetail	Vulnerable	Not Sensitive	Not Listed	
Animalia	Aves	Stercorarius parasiticus	Arctic Jaeger	Not Listed	Not Sensitive	Not Listed	ROKAMBA;JAMBA
Animalia	Aves	Stercorarius pomarinus	Pomarine Jaeger	Not Listed	Not Sensitive	Not Listed	CAMBA;JAMBA
Animalia	Aves	Sterna hirundo	Common Tern	Not Listed	Not Sensitive	Not Listed	ROKAMBA;CAMBA; JAMBA
Animalia	Aves	Sternula albifrons	Little Tern	Endangered	Not Sensitive	Not Listed	ROKAMBA;CAMBA; JAMBA
Animalia	Aves	Stictonetta naevosa	Freckled Duck	Vulnerable	Not Sensitive	Not Listed	
Animalia	Aves	Sula dactylatra	Masked Booby	Vulnerable	Not Sensitive	Not Listed	ROKAMBA;JAMBA
Animalia	Aves	Thalassarche cauta	Shy Albatross	Vulnerable	Not Sensitive	Vulnerable	
Animalia	Aves	Thalassarche chrysostoma	Grey-headed Albatross	Not Listed	Not Sensitive	Endangered	
Animalia	Aves	Thalassarche melanophris	Black-browed Albatross	Vulnerable	Not Sensitive	Vulnerable	
Animalia	Aves	Tringa brevipes	Grey-tailed Tattler	Not Listed	Not Sensitive	Not Listed	ROKAMBA;CAMBA; JAMBA
Animalia	Aves	Tringa glareola	Wood Sandpiper	Not Listed	Not Sensitive	Not Listed	ROKAMBA;CAMBA; JAMBA
Animalia	Aves	Tringa incana	Wandering Tattler	Not Listed	Not Sensitive	Not Listed	JAMBA
Animalia	Aves	Tringa nebularia	Common Greenshank	Not Listed	Not Sensitive	Not Listed	ROKAMBA;CAMBA; JAMBA
Animalia	Aves	Tringa stagnatilis	Marsh Sandpiper	Not Listed	Not Sensitive	Not Listed	ROKAMBA;CAMBA; JAMBA
Animalia	Aves	Tryngites subruficollis	Buff-breasted Sandpiper	Not Listed	Not Sensitive	Not Listed	ROKAMBA;JAMBA
Animalia	Aves	Tyto novaehollandiae	Masked Owl	Vulnerable	Category 3	Not Listed	
Animalia	Aves	Xenus cinereus	Terek Sandpiper	Vulnerable	Not Sensitive	Not Listed	ROKAMBA;CAMBA; JAMBA
Animalia	Mammalia	Aepyprymnus rufescens	Rufous Bettong	Vulnerable	Not Sensitive	Not Listed	

Kingdom	Class	Scientific	Common	NSW Conservation Status	NSW Sensitivity Class	Federal Conservation Status	Migratory Species Agreements
Animalia	Mammalia	Arctocephalus forsteri	New Zealand Fur-seal	Vulnerable	Not Sensitive	Not Listed	
Animalia	Mammalia	Arctocephalus pusillus doriferus	Australian Fur-seal	Vulnerable	Not Sensitive	Not Listed	
Animalia	Mammalia	Dasyurus maculatus	Spotted-tailed Quoll	Vulnerable	Not Sensitive	Endangered	
Animalia	Mammalia	Dasyurus viverrinus	Eastern Quoll	Endangered	Not Sensitive	Endangered	
Animalia	Mammalia	Dugong dugon	Dugong	Endangered	Not Sensitive	Not Listed	
Animalia	Mammalia	Eubalaena australis	Southern Right Whale	Endangered	Not Sensitive	Endangered	
Animalia	Mammalia	Megaptera novaeangliae	Humpback Whale	Vulnerable	Not Sensitive	Vulnerable	
Animalia	Mammalia	Miniopterus australis	Little Bentwing-bat	Vulnerable	Not Sensitive	Not Listed	
Animalia	Mammalia	Miniopterus schreibersii oceanensis	Eastern Bentwing-bat	Vulnerable	Not Sensitive	Not Listed	
Animalia	Mammalia	Mormopterus norfolkensis	Eastern Freetail-bat	Vulnerable	Not Sensitive	Not Listed	
Animalia	Mammalia	Myotis macropus	Southern Myotis	Vulnerable	Not Sensitive	Not Listed	
Animalia	Mammalia	Perameles nasuta	Long-nosed Bandicoot	Endangered Population	Not Sensitive	Not Listed	
Animalia	Mammalia	Pteropus poliocephalus	Grey-headed Flying-fox	Vulnerable	Not Sensitive	Vulnerable	
Animalia	Mammalia	Saccolaimus flaviventris	Yellow-bellied Sheathtail-bat	Vulnerable	Not Sensitive	Not Listed	
Animalia	Mammalia	Scoteanax rueppellii	Greater Broad-nosed Bat	Vulnerable	Not Sensitive	Not Listed	
Animalia	Reptilia	Chelonia mydas	Green Turtle	Vulnerable	Not Sensitive	Vulnerable	
Animalia	Reptilia	Dermochelys coriacea	Leatherback Turtle	Endangered	Not Sensitive	Endangered	
Plantae	Flora	Acacia bynoeana	Bynoe's Wattle	Endangered	Not Sensitive	Vulnerable	
Plantae	Flora	Acacia gordonii		Endangered	Not Sensitive	Endangered	
Plantae	Flora	Acacia prominens	Gosford Wattle	Endangered Population	Not Sensitive	Not Listed	
Plantae	Flora	Acacia pubescens	Downy Wattle	Vulnerable	Not Sensitive	Vulnerable	
Plantae	Flora	Acacia terminalis subsp. terminalis	Sunshine Wattle	Endangered	Not Sensitive	Endangered	
Plantae	Flora	Amperea xiphoclada var. pedicellata		Presumed Extinct	Not Sensitive	Extinct	
Plantae	Flora	Caladenia tessellata	Thick Lip Spider Orchid	Endangered	Category 2	Vulnerable	
Plantae	Flora	Callistemon linearifolius	Netted Bottle Brush	Vulnerable	Category 3	Not Listed	
Plantae	Flora	Dichanthium setosum	Bluegrass	Vulnerable	Not Sensitive	Vulnerable	
Plantae	Flora	Diuris arenaria	Sand Doubletail	Endangered	Category 2	Not Listed	
Plantae	Flora	Doryanthes palmeri	Giant Spear Lily	Vulnerable	Not Sensitive	Not Listed	
Plantae	Flora	Eucalyptus camfieldii	Camfield's Stringybark	Vulnerable	Not Sensitive	Vulnerable	
Plantae	Flora	Eucalyptus fracta	Broken Back Ironbark	Vulnerable	Not Sensitive	Not Listed	
Plantae	Flora	Eucalyptus leucoxylon subsp. pruinosa	Yellow Gum	Vulnerable	Not Sensitive	Not Listed	
Plantae	Flora	Eucalyptus nicholii	Narrow-leaved Black Peppermint	Vulnerable	Not Sensitive	Vulnerable	
Plantae	Flora	Eucalyptus pulverulenta	Silver-leafed Gum	Vulnerable	Not Sensitive	Vulnerable	

Kingdom	Class	Scientific	Common	NSW Conservation Status	NSW Sensitivity Class	Federal Conservation Status	Migratory Species Agreements
Plantae	Flora	Eucalyptus scoparia	Wallangarra White Gum	Endangered	Not Sensitive	Vulnerable	
Plantae	Flora	Hibbertia puberula		Endangered	Not Sensitive	Not Listed	
Plantae	Flora	Macadamia integrifolia	Macadamia Nut	Not Listed	Not Sensitive	Vulnerable	
Plantae	Flora	Maundia triglochinoides		Vulnerable	Not Sensitive	Not Listed	
Plantae	Flora	Melaleuca deanei	Deane's Paperbark	Vulnerable	Not Sensitive	Vulnerable	
Plantae	Flora	Persoonia hirsuta	Hairy Geebung	Endangered	Category 3	Endangered	
Plantae	Flora	Pimelea curviflora subsp. curviflora		Vulnerable	Not Sensitive	Vulnerable	
Plantae	Flora	Pomaderris prunifolia	Plum-leaf Pomaderris	Endangered Population	Not Sensitive	Not Listed	
Plantae	Flora	Prostanthera marifolia	Seaforth Mintbush	Critically Endangered	Category 3	Critically Endangered	
Plantae	Flora	Senecio spathulatus	Coast Groundsel	Endangered	Not Sensitive	Not Listed	
Plantae	Flora	Senna acclinis	Rainforest Cassia	Endangered	Not Sensitive	Not Listed	
Plantae	Flora	Syzygium paniculatum	Magenta Lilly Pilly	Endangered	Not Sensitive	Vulnerable	
Plantae	Flora	Tetratheca glandulosa		Vulnerable	Not Sensitive	Not Listed	
Plantae	Flora	Tetratheca juncea	Black-eyed Susan	Vulnerable	Not Sensitive	Vulnerable	
Plantae	Flora	Thesium australe	Austral Toadflax	Vulnerable	Not Sensitive	Vulnerable	
Plantae	Flora	Wilsonia backhousei	Narrow-leafed Wilsonia	Vulnerable	Not Sensitive	Not Listed	

Data does not include NSW category 1 sensitive species.
NSW BioNet: © State of NSW and Office of Environment and Heritage
Data obtained 05/12/2018

USE OF REPORT - APPLICABLE TERMS

The following terms apply to any person (End User) who is given the Report by the person who purchased the Report from Lotsearch Pty Ltd (ABN: 89 600 168 018) (Lotsearch) or who otherwise has access to the Report (Terms). The contract terms that apply between Lotsearch and the purchaser of the Report are specified in the order form pursuant to which the Report was ordered and the terms set out below are of no effect as between Lotsearch and the purchaser of the Report.

1. End User acknowledges and agrees that:
   (a) the Report is compiled from or using content (**Third Party Content**) which is comprised of:
      (i) content provided to Lotsearch by third party content suppliers with whom Lotsearch has contractual arrangements or content which is freely available or methodologies licensed to Lotsearch by third parties with whom Lotsearch has contractual arrangements (**Third Party Content Suppliers**); and
      (ii) content which is derived from content described in paragraph (i);
   (b) Neither Lotsearch nor Third Party Content Suppliers takes any responsibility for or give any warranty in relation to the accuracy or completeness of any Third Party Content included in the Report including any contaminated land assessment or other assessment included as part of a Report;
   (c) the Third Party Content Suppliers do not constitute an exhaustive set of all repositories or sources of information available in relation to the property which is the subject of the Report (**Property**) and accordingly neither Lotsearch nor Third Party Content Suppliers gives any warranty in relation to the accuracy or completeness of the Third Party Content incorporated into the report including any contaminated land assessment or other assessment included as part of a Report;
   (d) Reports are generated at a point in time (as specified by the date/time stamp appearing on the Report) and accordingly the Report is based on the information available at that point in time and Lotsearch is not obliged to undertake any additional reporting to take into consideration any information that may become available between the point in time specified by the date/time stamp and the date on which the Report was provided by Lotsearch to the purchaser of the Report;
   (e) Reports must be used or reproduced in their entirety and End User must not reproduce or make available to other persons only parts of the Report;
   (f) Lotsearch has not undertaken any physical inspection of the property;
   (g) neither Lotsearch nor Third Party Content Suppliers warrants that all land uses or features whether past or current are identified in the Report;
   (h) the Report does not include any information relating to the actual state or condition of the Property;
   (i) the Report should not be used or taken to indicate or exclude actual fitness or unfitness of Land or Property for any particular purpose
   (j) the Report should not be relied upon for determining saleability or value or making any other decisions in relation to the Property and in particular should not be taken to be a rating or assessment of the desirability or market value of the property or its features; and
   (k) the End User should undertake its own inspections of the Land or Property to satisfy itself that there are no defects or failures
2. The End User may not make the Report or any copies or extracts of the report or any part of it available to any other person. If End User wishes to provide the Report to any other person or make extracts or copies of the Report, it must contact the purchaser of the Report before doing so to ensure the proposed use is consistent with the contract terms between Lotsearch and the purchaser.
3. Neither Lotsearch (nor any of its officers, employees or agents) nor any of its Third Party Content Suppliers will have any liability to End User or any person to whom End User provides the Report and End User must not represent that Lotsearch or any of its Third Party Content Suppliers accepts liability to any such person or make any other representation to any such person on behalf of Lotsearch or any Third Party Content Supplier.
4. The End User hereby to the maximum extent permitted by law:
   (a) acknowledges that the Lotsearch (nor any of its officers, employees or agents), nor any of its Third Party Content Supplier have any liability to it under or in connection with the

Report or these Terms;

(b) waives any right it may have to claim against Third Party Content Supplier in connection with the Report, or the negotiation of, entry into, performance of, or termination of these Terms; and

(c) releases each Third Party Content Supplier from any claim it may have otherwise had in connection with the Report, or the negotiation of, entry into, performance of, or termination of these Terms.

5. The End User acknowledges that any Third Party Supplier shall be entitled to plead the benefits conferred on it under clause 4, despite not being a party to these terms.
6. End User must not remove any copyright notices, trade marks, digital rights management information, other embedded information, disclaimers or limitations from the Report or authorise any person to do so.
7. End User acknowledges and agrees that Lotsearch and Third Party Content Suppliers retain ownership of all copyright, patent, design right (registered or unregistered), trade marks (registered or unregistered), database right or other data right, moral right or know how or any other intellectual property right in any Report or any other item, information or data included in or provided as part of a Report.
8. To the extent permitted by law and subject to paragraph 9, all implied terms, representations and warranties whether statutory or otherwise relating to the subject matter of these Terms other than as expressly set out in these Terms are excluded.
9. Subject to paragraph 6, Lotsearch excludes liability to End User for loss or damage of any kind, however caused, due to Lotsearch's negligence, breach of contract, breach of any law, in equity, under indemnities or otherwise, arising out of all acts, omissions and events whenever occurring.
10. Lotsearch acknowledges that if, under applicable State, Territory or Commonwealth law, End User is a consumer certain rights may be conferred on End User which cannot be excluded, restricted or modified. If so, and if that law applies to Lotsearch, then, Lotsearch's liability is limited to the greater of an amount equal to the cost of resupplying the Report and the maximum extent permitted under applicable laws.
11. Subject to paragraph 9, neither Lotsearch nor the End User is liable to the other for:
    (a) any indirect, incidental, consequential, special or exemplary damages arising out of or in relation to the Report or these Terms; or
    (b) any loss of profit, loss of revenue, loss of interest, loss of data, loss of goodwill or loss of business opportunities, business interruption arising directly or indirectly out of or in relation to the Report or these Terms,

    irrespective of how that liability arises including in contract or tort, liability under indemnity or for any other common law, equitable or statutory cause of action or otherwise.
12. These Terms are subject to New South Wales law.

APPENDIX D **TITLE SEARCH**

ADVANCE LEGAL SEARCHERS PTY LTD

(ACN 147 943 842)
ABN 82 147 943 842

18/36 Osborne Road,
Manly NSW 2095

Telephone: +612 9977 6713
Mobile: 0412 169 809
Email: search@alsearchers.com.au

06th December 2018

LOTSEARCH PTY LTD
Level 3, 68 Alfred Street,
MILSONS POINT, NSW 2061

Attention: Rosemary Hulak,

RE: **297 King Street,**
Mascot
Reference: LS004752_EP

Note 1:	**Lot 4 DP 234489**	(Page 1)
Note 2:	**Lot B DP 164829**	(Page 6)
Note 3:	**Lot 133 DP 659434**	(Page 8)

Note 1:

Current Search

Folio Identifier 4/234489 (title attached)
DP 234489 (plan attached)
Dated 05th December 2018
Registered Proprietor:
QANTAS AIRWAYS LIMITED

Title Tree
Lot 4 DP 234489

Folio Identifier 4/234489

Certificate of Title Volume 11089 Folio 159

(a)

Certificate of Title Volume 8429 Folio 186

Certificate of Title Volume 5739 Folio 26

Certificate of Title Volume 5321 Folio 108

PA 35054

Conveyance Book 799 No. 256

****

(b)

Certificate of Title Volume 5321 Folio 109

PA 35055

Conveyance Book 1104 No. 874

Conveyance Book 799 No. 256

****

Subject land within Portion 133 **Parish Botany**
Granted to Thomas Stubbs 29th April 1837

****

Summary of proprietor(s)
Lot 4 DP 234489

Year	Proprietor(s)
	(Lot 4 DP 234489)
1988 – todate	Qantas Airways Limited
(2017 – todate)	*(current lease of lease to Blue Asset Partner Pty Ltd, Eric Alpha Asset Corporation 1 Pty Ltd, Eric Alpha Asset Corporation 2 Pty Ltd, Eric Alpha Asset Corporation 3 Pty Ltd, Eric Alpha Asset Corporation 4 Pty Ltd shown on Folio Identifier 4/234489)*
(2017 – todate)	*(current lease of lease to Blue Asset Partner Pty Ltd, Eric Alpha Asset Corporation 1 Pty Ltd, Eric Alpha Asset Corporation 2 Pty Ltd, Eric Alpha Asset Corporation 3 Pty Ltd, Eric Alpha Asset Corporation 4 Pty Ltd shown on Folio Identifier 4/234489)*
(2017 – todate)	*(current lease change of name now Alpha Distribution Ministerial Holding Corporation shown on Folio Identifier 4/234489)*
(1992 – todate)	*(current lease to Sydney Electricity of substation no. 2485 shown on Folio Identifier 4/234489)*
	(Lot 4 DP 234489 – CTVol 11089 Fol 159)
1980 – 1988	Qantas Airways Limited
1969 – 1980	A.C.I. Operations Pty. Limited.
(1969 – 1988)	*(lease to Sydney Electricity of substation no. 2485)*

See Notes (a) & (b)

Note (a)

	(Part Portion 133 Parish Botany – Area 3 Acres 1 Rood 24 Perches – CTVol 8429 Fol 186)
1964 – 1969	A.C.I. Operations Pty. Limited.
1963 – 1964	Thomas Playfair Proprietary Limited
	(Part Portion 133 Parish Botany – Area 3 Acres 3 Roods 21 ¼ Perches – CTVol 5739 Fol 26)
1956 – 1963	Thomas Playfair Proprietary Limited
1952 – 1956	The Commonwealth of Australia
1947 – 1952	Hector William Westlake Hamble, engineer Leslie Theodore Westlake Hambly, retired poultry farmer
	(Part Portion 133 Parish Botany – Area 4 Acres 0 Roods 19 ¾ Perches – CTVol 5321 Fol 108)
1946 – 1947	Hector William Westlake Hamble, engineer Leslie Theodore Westlake Hambly, retired poultry farmer
1942 – 1946	Catherine Grace Hambly, widow Leslie Theodore Westlake Hambly, retired poultry farmer
(1942 – 1944)	*(lease to Ching Tip, Sue Jarng and Man Hung, market gardeners)*
	(Part Portion 133 Parish Botany – Area 5 Acres 0 Roods 16 ½ Perches – PA35054)
1916 – 1942	Catherine Grace Hambly, widow / executrix / life estate Ethel May Hambly, executrix Harold William Thomas Hambly, executor Leslie Theodore Westlake Hambly, retired poultry farmer / executor William Hambly, estate
	(Part Portion 133 Parish Botany – Area 5 Acres 0 Roods 16 ½ Perches – Conv Book 799 No. 256)
1906 – 1916	William Hambly, market gardener

****

Note (b)

	(Part Portion 133 Parish Botany – Area 1 Acre – CTVol 5321 Fol 109)
1964 – 1969	A.C.I. Operations Pty. Limited.
(1967 – 1969)	*(lease to Sydney Electricity of substation no. 2485)*
1956 – 1964	Thomas Playfair Proprietary Limited
(1942 – 1967)	*(lease to Ching Tip, Sue Jarng and Man Hung, market gardeners)*
1942 – 1956	Leslie Theodore Westlake Hambly, retired poultry farmer
	(Part Portion 133 Parish Botany – Area 1 Acre – Conv Book 1104 No. 874)
1917 – 1942	Leslie Theodore Westlake Hambly, gardener
1917 – 1917	Catherine Grace Hambly, widow / executrix Ethel May Hambly, executrix Harold William Thomas Hambly, executor Leslie Theodore Westlake Hambly, retired poultry farmer / executor William Hambly, estate
	(Part Portion 133 Parish Botany – Area 5 Acres 0 Roods 16 ½ Perches – Conv Book 799 No. 256)
1916 – 1917	William Hambly, market gardener

****

Note 2:

Current Search

Folio Identifier B/164829 (title attached)
DP 164829 (plan attached)
Dated 05th December 2018
Registered Proprietor:
QANTAS AIRWAYS LIMITED

Title Tree
Lot B DP 164829

Folio Identifier B/164829

Certificate of Title Volume 13477 Folio 64

IVA 25595

Conveyance Book 3288 No. 903

Conveyance Book 2417 No. 163

Conveyance Book 2040 No. 175

Conveyance Book 1797 No. 455

Conveyance Book 1213 No. 5

Conveyance Book 1197 No. 939

Conveyance Book 797 No. 764

****

Subject land within Portion 133 **Parish Botany**
Granted to Thomas Stubbs 29th April 1837

****

Summary of proprietor(s)
Lot B DP 164829

Year	Proprietor(s)
	(Lot B DP 164829)
1991 – todate	Qantas Airways Limited
1989 – 1991	F.G.S. Storage Pty Limited
	(Lot B DP 164829 – CTVol 13477 Fol 64)
1980 – 1989	F.G.S. Storage Pty Limited
1977 – 1980	Thiess Properties Pty. Limited
	(Lot B DP 164829 – Area 1 Acre – Conv Book 3288 No. 903)
1976 – 1977	F.G.S. Storage Pty Limited
	(Lot B DP 164829 and other land – Conv Book 2417 No. 163)
1957 – 1976	Heavy Equipment (NSW) Pty. Limited
	(Part Portion 133 Parish Botany – Area 3 Acres 0 Roods 23 ¼ Perches – Conv Book 2040 No. 175)
1947 – 1957	John Samuel Baker, smelter
	(Part Portion 133 Parish Botany – Area 3 Acres 0 Roods 23 ¼ Perches – Conv Book 1797 No. 455)
1937 – 1947	Ernest Whittaker, market gardener
	(Part Portion 133 Parish Botany – Area 3 Acres 0 Roods 23 ¼ Perches – Conv Book 1213 No. 5)
1920 – 1937	Emily May Bridge, wife of Spencer William Bridge, market gardener
	(Part Portion 133 Parish Botany – Area 3 Acres 0 Roods 23 ¼ Perches – Conv Book 1197 No. 939)
1920 – 1920	Arthur Jackson, market gardener
1915 – 1920	Sarah Ann Collins, spinster / executrix Henry Tasker / executor William Collins, estate
	(Part Portion 133 Parish Botany – Area 23 Acres 1 Roods 32 Perches – Conv Book 797 No. 764)
1906 – 1915	William Collins, market gardener

****

Note 3:

Current Search

Folio Identifier 133/659434 (title attached)
DP 659434 (plan attached)
Dated 05th December 2018
Registered Proprietor:
QANTAS AIRWAYS LIMITED

Title Tree
Lot 133 DP 659434

Folio Identifier 133/659434

Certificate of Title Volume 8432 Folio 166

Certificate of Title Volume 7781 Folio 206

PA 40571

Conveyance Book 2178 No. 823

Conveyance Book 1195 No. 191

Conveyance Book 797 No. 764

****

Subject land within Portion 133 **Parish Botany**
Granted to Thomas Stubbs 29th April 1837

****

Summary of proprietor(s)
Lot 133 DP 659434

Year	Proprietor(s)
	(Lot 133 DP 659434)
1991 – todate	Qantas Airways Limited
	(Part Portion 133 Parish Botany – Area 6 Acres 0 Roods 39 ¾ Perches – CTVol 8432 Fol 166)
1971 – 1991	Qantas Airways Limited
1963 – 1971	The Commonwealth of Australia
	(Part Portion 133 Parish Botany – Area 6 Acres 1 Rood 16 Perches – Conv Book 2178 No. 823)
1957 – 1963	The Commonwealth of Australia
	(Part Portion 133 Parish Botany – Area 6 Acres 1 Roods 16 Perches – Conv Book 1195 No. 191)
1920 – 1957	Percy Edwin Tasker, market gardener
(1942 – 1951)	*(lease to Chong Yow, market gardener)*
1915 – 1920	Sarah Ann Collins, spinster / executrix Henry Tasker / executor William Collins, estate
	(Part Portion 133 Parish Botany – Area 23 Acres 1 Roods 32 Perches – Conv Book 797 No. 764)
1906 – 1915	William Collins, market gardener

****

APPENDIX E **LABORATORY REPORTS**

Envirolab Services Pty Ltd
ABN 37 112 535 645
12 Ashley St Chatswood NSW 2067
ph 02 9910 6200 fax 02 9910 6201
customerservice@envirolab.com.au
www.envirolab.com.au

CERTIFICATE OF ANALYSIS 208526

Client Details

Client	Arcadis Australia Pacific Pty Ltd
Attention	Caitlain Regena, Dean Stafford
Address	Level 16, 580 George St, Sydney, NSW, 2000

Sample Details

Your Reference	**10026439, King St North ESA**
Number of Samples	3 Soil
Date samples received	19/12/2018
Date completed instructions received	19/12/2018

Analysis Details

Please refer to the following pages for results, methodology summary and quality control data.

Samples were analysed as received from the client. Results relate specifically to the samples as received.

Results are reported on a dry weight basis for solids and on an as received basis for other matrices.

Please refer to the last page of this report for any comments relating to the results.

Report Details

Date results requested by	04/01/2019
Date of Issue	31/12/2018

NATA Accreditation Number 2901. This document shall not be reproduced except in full.

Accredited for compliance with ISO/IEC 17025 - Testing. **Tests not covered by NATA are denoted with ***

Asbestos Approved By
Analysed by Asbestos Approved Identifier: Lucy Zhu
Authorised by Asbestos Approved Signatory: Lucy Zhu

Results Approved By
Jeremy Faircloth, Organics Supervisor
Leon Ow, Chemist
Lucy Zhu, Asbestos Analyst
Steven Luong, Senior Chemist

Authorised By



Jacinta Hurst, Laboratory Manager

VOCs in soil		
Our Reference		208526-1
Your Reference	UNITS	TRIP1
Date Sampled		12/12/2018
Type of sample		Soil
Date extracted	-	19/12/2018
Date analysed	-	28/12/2018
Dichlorodifluoromethane	mg/kg	<1
Chloromethane	mg/kg	<1
Vinyl Chloride	mg/kg	<1
Bromomethane	mg/kg	<1
Chloroethane	mg/kg	<1
Trichlorofluoromethane	mg/kg	<1
1,1-Dichloroethene	mg/kg	<1
trans-1,2-dichloroethene	mg/kg	<1
1,1-dichloroethane	mg/kg	<1
cis-1,2-dichloroethene	mg/kg	<1
bromochloromethane	mg/kg	<1
chloroform	mg/kg	<1
2,2-dichloropropane	mg/kg	<1
1,2-dichloroethane	mg/kg	<1
1,1,1-trichloroethane	mg/kg	<1
1,1-dichloropropene	mg/kg	<1
Cyclohexane	mg/kg	<1
carbon tetrachloride	mg/kg	<1
Benzene	mg/kg	<0.2
dibromomethane	mg/kg	<1
1,2-dichloropropane	mg/kg	<1
trichloroethene	mg/kg	<1
bromodichloromethane	mg/kg	<1
trans-1,3-dichloropropene	mg/kg	<1
cis-1,3-dichloropropene	mg/kg	<1
1,1,2-trichloroethane	mg/kg	<1
Toluene	mg/kg	<0.5
1,3-dichloropropane	mg/kg	<1
dibromochloromethane	mg/kg	<1
1,2-dibromoethane	mg/kg	<1
tetrachloroethene	mg/kg	<1
1,1,1,2-tetrachloroethane	mg/kg	<1
chlorobenzene	mg/kg	<1
Ethylbenzene	mg/kg	<1
bromoform	mg/kg	<1

VOCs in soil		
Our Reference		208526-1
Your Reference	UNITS	TRIP1
Date Sampled		12/12/2018
Type of sample		Soil
m+p-xylene	mg/kg	<2
styrene	mg/kg	<1
1,1,2,2-tetrachloroethane	mg/kg	<1
o-Xylene	mg/kg	<1
1,2,3-trichloropropane	mg/kg	<1
isopropylbenzene	mg/kg	<1
bromobenzene	mg/kg	<1
n-propyl benzene	mg/kg	<1
2-chlorotoluene	mg/kg	<1
4-chlorotoluene	mg/kg	<1
1,3,5-trimethyl benzene	mg/kg	<1
tert-butyl benzene	mg/kg	<1
1,2,4-trimethyl benzene	mg/kg	<1
1,3-dichlorobenzene	mg/kg	<1
sec-butyl benzene	mg/kg	<1
1,4-dichlorobenzene	mg/kg	<1
4-isopropyl toluene	mg/kg	<1
1,2-dichlorobenzene	mg/kg	<1
n-butyl benzene	mg/kg	<1
1,2-dibromo-3-chloropropane	mg/kg	<1
1,2,4-trichlorobenzene	mg/kg	<1
hexachlorobutadiene	mg/kg	<1
1,2,3-trichlorobenzene	mg/kg	<1
Surrogate Dibromofluorometha	%	100
Surrogate aaa-Trifluorotoluene	%	80
Surrogate Toluene-d_8	%	99
Surrogate 4-Bromofluorobenzene	%	99

vTRH(C6-C10)/BTEXN in Soil				
Our Reference	UNITS	208526-1	208526-2	208526-3
Your Reference		TRIP1	TB	TS
Date Sampled		12/12/2018	-	-
Type of sample		Soil	Soil	Soil
Date extracted	-	19/12/2018	20/12/2018	20/12/2018
Date analysed	-	28/12/2018	27/12/2018	27/12/2018
TRH C_6 - C_9	mg/kg	<25	[NA]	[NA]
TRH C_6 - C_{10}	mg/kg	<25	[NA]	[NA]
vTPH C_6 - C_{10} less BTEX (F1)	mg/kg	<25	[NA]	[NA]
Benzene	mg/kg	<0.2	<0.2	5
Toluene	mg/kg	<0.5	<0.5	5
Ethylbenzene	mg/kg	<1	<1	5
m+p-xylene	mg/kg	<2	<2	11
o-Xylene	mg/kg	<1	<1	7
naphthalene	mg/kg	<1	[NA]	[NA]
Total +ve Xylenes	mg/kg	<1	[NA]	[NA]
Surrogate aaa-Trifluorotoluene	%	80	106	82

svTRH (C10-C40) in Soil		
Our Reference		208526-1
Your Reference	UNITS	TRIP1
Date Sampled		12/12/2018
Type of sample		Soil
Date extracted	-	20/12/2018
Date analysed	-	20/12/2018
TRH C_{10} - C_{14}	mg/kg	<50
TRH C_{15} - C_{28}	mg/kg	<100
TRH C_{29} - C_{36}	mg/kg	<100
TRH >C_{10} -C_{16}	mg/kg	<50
TRH >C_{10} - C_{16} less Naphthalene (F2)	mg/kg	<50
TRH >C_{16} -C_{34}	mg/kg	<100
TRH >C_{34} -C_{40}	mg/kg	<100
Total +ve TRH (>C10-C40)	mg/kg	<50
Surrogate o-Terphenyl	%	98

PAHs in Soil		
Our Reference	UNITS	208526-1
Your Reference		TRIP1
Date Sampled		12/12/2018
Type of sample		Soil
Date extracted	-	20/12/2018
Date analysed	-	21/12/2018
Naphthalene	mg/kg	<0.1
Acenaphthylene	mg/kg	<0.1
Acenaphthene	mg/kg	<0.1
Fluorene	mg/kg	<0.1
Phenanthrene	mg/kg	<0.1
Anthracene	mg/kg	<0.1
Fluoranthene	mg/kg	<0.1
Pyrene	mg/kg	<0.1
Benzo(a)anthracene	mg/kg	<0.1
Chrysene	mg/kg	<0.1
Benzo(b,j+k)fluoranthene	mg/kg	<0.2
Benzo(a)pyrene	mg/kg	<0.05
Indeno(1,2,3-c,d)pyrene	mg/kg	<0.1
Dibenzo(a,h)anthracene	mg/kg	<0.1
Benzo(g,h,i)perylene	mg/kg	<0.1
Total +ve PAH's	mg/kg	<0.05
Benzo(a)pyrene TEQ calc (zero)	mg/kg	<0.5
Benzo(a)pyrene TEQ calc(half)	mg/kg	<0.5
Benzo(a)pyrene TEQ calc(PQL)	mg/kg	<0.5
Surrogate p-Terphenyl-d14	%	111

Organochlorine Pesticides in soil		
Our Reference		208526-1
Your Reference	UNITS	TRIP1
Date Sampled		12/12/2018
Type of sample		Soil
Date extracted	-	20/12/2018
Date analysed	-	20/12/2018
HCB	mg/kg	<0.1
alpha-BHC	mg/kg	<0.1
gamma-BHC	mg/kg	<0.1
beta-BHC	mg/kg	<0.1
Heptachlor	mg/kg	<0.1
delta-BHC	mg/kg	<0.1
Aldrin	mg/kg	<0.1
Heptachlor Epoxide	mg/kg	<0.1
gamma-Chlordane	mg/kg	<0.1
alpha-chlordane	mg/kg	<0.1
Endosulfan I	mg/kg	<0.1
pp-DDE	mg/kg	<0.1
Dieldrin	mg/kg	<0.1
Endrin	mg/kg	<0.1
pp-DDD	mg/kg	<0.1
Endosulfan II	mg/kg	<0.1
pp-DDT	mg/kg	<0.1
Endrin Aldehyde	mg/kg	<0.1
Endosulfan Sulphate	mg/kg	<0.1
Methoxychlor	mg/kg	<0.1
Total +ve DDT+DDD+DDE	mg/kg	<0.1
Surrogate TCMX	%	112

Organophosphorus Pesticides		
Our Reference		208526-1
Your Reference	UNITS	TRIP1
Date Sampled		12/12/2018
Type of sample		Soil
Date extracted	-	20/12/2018
Date analysed	-	20/12/2018
Azinphos-methyl (Guthion)	mg/kg	<0.1
Bromophos-ethyl	mg/kg	<0.1
Chlorpyriphos	mg/kg	<0.1
Chlorpyriphos-methyl	mg/kg	<0.1
Diazinon	mg/kg	<0.1
Dichlorvos	mg/kg	<0.1
Dimethoate	mg/kg	<0.1
Ethion	mg/kg	<0.1
Fenitrothion	mg/kg	<0.1
Malathion	mg/kg	<0.1
Parathion	mg/kg	<0.1
Ronnel	mg/kg	<0.1
Surrogate TCMX	%	112

PCBs in Soil		
Our Reference		208526-1
Your Reference	UNITS	TRIP1
Date Sampled		12/12/2018
Type of sample		Soil
Date extracted	-	20/12/2018
Date analysed	-	20/12/2018
Aroclor 1016	mg/kg	<0.1
Aroclor 1221	mg/kg	<0.1
Aroclor 1232	mg/kg	<0.1
Aroclor 1242	mg/kg	<0.1
Aroclor 1248	mg/kg	<0.1
Aroclor 1254	mg/kg	<0.1
Aroclor 1260	mg/kg	<0.1
Total +ve PCBs (1016-1260)	mg/kg	<0.1
Surrogate TCLMX	%	112

SVOCs in Soil		
Our Reference		208526-1
Your Reference	UNITS	TRIP1
Date Sampled		12/12/2018
Type of sample		Soil
Date extracted	-	20/12/2018
Date analysed	-	21/12/2018
Phenol	mg/kg	<0.5
Bis-(2-chloroethyl) ether	mg/kg	<1
2-Chlorophenol	mg/kg	<0.5
1,3-Dichlorobenzene	mg/kg	<0.5
1,4-Dichlorobenzene	mg/kg	<0.5
2-Methylphenol	mg/kg	<0.5
1,2-Dichlorobenzene	mg/kg	<0.5
Bis (2-chloroisopropyl) ether	mg/kg	<1
3/4-Methylphenol	mg/kg	<1
N-nitrosodi-n-propylamine	mg/kg	<1
Hexachloroethane	mg/kg	<0.5
Nitrobenzene	mg/kg	<1
Isophorone	mg/kg	<1
2,4-Dimethylphenol	mg/kg	<0.5
2-Nitrophenol	mg/kg	<0.5
Bis(2-chloroethoxy)methane	mg/kg	<1
2,4-Dichlorophenol	mg/kg	<0.5
1,2,4-Trichlorobenzene	mg/kg	<0.5
Naphthalene	mg/kg	<0.5
4-Chloroaniline	mg/kg	<1
Hexachlorobutadiene	mg/kg	<0.5
4-Chloro-3-methylphenol	mg/kg	<5
2-Methylnaphthalene	mg/kg	<0.5
Hexachlorocyclopentadiene	mg/kg	<2
2,4,6-trichlorophenol	mg/kg	<0.5
2,4,5-trichlorophenol	mg/kg	<0.5
2-Chloronaphthalene	mg/kg	<0.5
2-nitroaniline	mg/kg	<1
Dimethylphthalate	mg/kg	<1
2,6-Dinitrotoluene	mg/kg	<1
Acenaphthylene	mg/kg	<0.5
3-Nitroaniline	mg/kg	<1
Acenaphthene	mg/kg	<0.5
2,4-dinitrophenol	mg/kg	<10
4-nitrophenol	mg/kg	<10

SVOCs in Soil		
Our Reference		208526-1
Your Reference	UNITS	TRIP1
Date Sampled		12/12/2018
Type of sample		Soil
Dibenzofuran	mg/kg	<1
diethylphthalate	mg/kg	<1
4-chlorophenylphenylether	mg/kg	<1
4-nitroaniline	mg/kg	<1
Fluorene	mg/kg	<0.5
2-methyl-4,6-dinitrophenol	mg/kg	<10
azobenzene	mg/kg	<1
4-bromophenylphenylether	mg/kg	<1
hexachlorobenzene	mg/kg	<0.5
pentachlorophenol	mg/kg	<5
Phenanthrene	mg/kg	<0.5
Anthracene	mg/kg	<0.5
carbazole	mg/kg	<1
di-n-butylphthalate	mg/kg	<1
Fluoranthene	mg/kg	<0.5
Pyrene	mg/kg	<0.5
butylbenzylphthalate	mg/kg	<1
bis(2-ethylhexyl)phthalate	mg/kg	<1
Benzo(a)anthracene	mg/kg	<0.5
Chrysene	mg/kg	<0.5
di-n-octylphthalate	mg/kg	<1
Benzo(b+j+k)fluoranthene	mg/kg	<1
Benzo(a)pyrene	mg/kg	<0.5
Indeno(1,2,3-c,d)pyrene	mg/kg	<0.5
Dibenzo(a,h)anthracene	mg/kg	<0.5
Benzo(g,h,i)perylene	mg/kg	<0.5
ethylmethanesulfonate	mg/kg	<1
aniline	mg/kg	<1
pentachloroethane	mg/kg	<0.5
benzyl alcohol	mg/kg	<1
acetophenone	mg/kg	<1
N-nitrosomorpholine	mg/kg	<1
N-nitrosopiperidine	mg/kg	<1
2,6-dichlorophenol	mg/kg	<0.5
hexachloropropene-1	mg/kg	<0.5
N-nitroso-n-butylamine	mg/kg	<1
safrole	mg/kg	<1
1,2,4,5-tetrachlorobenzene	mg/kg	<0.5

SVOCs in Soil		
Our Reference		208526-1
Your Reference	UNITS	TRIP1
Date Sampled		12/12/2018
Type of sample		Soil
cis and trans iso-safrole	mg/kg	<1
1,3-dinitrobenzene	mg/kg	<1
pentachlorobenzene	mg/kg	<0.5
1-naphthylamine	mg/kg	<1
2,3,4,6-tetrachlorophenol	mg/kg	<0.5
2-naphthylamine	mg/kg	<1
5-nitro-o-toluidine	mg/kg	<1
diphenylamine	mg/kg	<1
phenacetin	mg/kg	<1
pentachloronitrobenzene	mg/kg	<1
dinoseb	mg/kg	<1
methapyrilene	mg/kg	<1
p-dimethylaminoazobenzene	mg/kg	<1
2-acetylaminofluorene	mg/kg	<0.5
7,12-dimethylbenz(a)anthracene	mg/kg	<0.5
3-methylcholanthrene	mg/kg	<0.5
a-BHC	mg/kg	<0.5
b-BHC	mg/kg	<0.5
g-BHC	mg/kg	<0.5
d-BHC	mg/kg	<0.5
Heptachlor	mg/kg	<0.5
Aldrin	mg/kg	<0.5
Heptachlor Epoxide	mg/kg	<0.5
g-Chlordane	mg/kg	<0.5
a-Chlordane	mg/kg	<0.5
Endosulfan I	mg/kg	<0.5
p,p'-DDE	mg/kg	<0.5
Dieldrin	mg/kg	<0.5
Endrin	mg/kg	<0.5
p,p'-DDD	mg/kg	<0.5
Endosulfan II	mg/kg	<0.5
Endrin Aldehyde	mg/kg	<0.5
p,p'-DDT	mg/kg	<0.5
Endrin Ketone	mg/kg	<0.5
Endosulfan Sulphate	mg/kg	<0.5
Methoxychlor	mg/kg	<1
Surrogate 2-fluorophenol	%	97
Surrogate Phenol-d_6	%	83

SVOCs in Soil		
Our Reference		208526-1
Your Reference	UNITS	TRIP1
Date Sampled		12/12/2018
Type of sample		Soil
Surrogate Nitrobenzene-d_5	%	85
Surrogate 2-fluorobiphenyl	%	94
Surrogate 2,4,6-Tribromophenol	%	124
Surrogate *p*-Terphenyl-d_{14}	%	99

Acid Extractable metals in soil		
Our Reference		208526-1
Your Reference	UNITS	TRIP1
Date Sampled		12/12/2018
Type of sample		Soil
Date prepared	-	20/12/2018
Date analysed	-	20/12/2018
Arsenic	mg/kg	12
Cadmium	mg/kg	<0.4
Chromium	mg/kg	2
Copper	mg/kg	4
Lead	mg/kg	25
Mercury	mg/kg	0.2
Nickel	mg/kg	<1
Zinc	mg/kg	19

Moisture		
Our Reference		208526-1
Your Reference	UNITS	TRIP1
Date Sampled		12/12/2018
Type of sample		Soil
Date prepared	-	20/12/2018
Date analysed	-	21/12/2018
Moisture	%	33

Asbestos ID - soils		
Our Reference		208526-1
Your Reference	UNITS	TRIP1
Date Sampled		12/12/2018
Type of sample		Soil
Date analysed	-	21/12/2018
Sample mass tested	g	Approx. 20g
Sample Description	-	Brown fine-grained soil & rocks
Asbestos ID in soil	-	No asbestos detected at reporting limit of 0.1g/kg Organic fibres detected
Trace Analysis	-	No asbestos detected

Method ID	Methodology Summary
ASB-001	Asbestos ID - Qualitative identification of asbestos in bulk samples using Polarised Light Microscopy and Dispersion Staining Techniques including Synthetic Mineral Fibre and Organic Fibre as per Australian Standard 4964-2004.
Inorg-008	Moisture content determined by heating at 105+/-5 °C for a minimum of 12 hours.
Metals-020	Determination of various metals by ICP-AES.
Metals-021	Determination of Mercury by Cold Vapour AAS.
Org-003	Soil samples are extracted with Dichloromethane/Acetone and waters with Dichloromethane and analysed by GC-FID. F2 = (>C10-C16)-Naphthalene as per NEPM B1 Guideline on Investigation Levels for Soil and Groundwater (HSLs Tables 1A (3, 4)). Note Naphthalene is determined from the VOC analysis.
Org-003	Soil samples are extracted with Dichloromethane/Acetone and waters with Dichloromethane and analysed by GC-FID. F2 = (>C10-C16)-Naphthalene as per NEPM B1 Guideline on Investigation Levels for Soil and Groundwater (HSLs Tables 1A (3, 4)). Note Naphthalene is determined from the VOC analysis. Note, the Total +ve TRH PQL is reflective of the lowest individual PQL and is therefore "Total +ve TRH" is simply a sum of the positive individual TRH fractions (>C10-C40).
Org-005	Soil samples are extracted with dichloromethane/acetone and waters with dichloromethane and analysed by GC with dual ECD's.
Org-005	Soil samples are extracted with dichloromethane/acetone and waters with dichloromethane and analysed by GC with dual ECD's. Note, the Total +ve reported DDD+DDE+DDT PQL is reflective of the lowest individual PQL and is therefore simply a sum of the positive individually report DDD+DDE+DDT.
Org-006	Soil samples are extracted with dichloromethane/acetone and waters with dichloromethane and analysed by GC-ECD.
Org-006	Soil samples are extracted with dichloromethane/acetone and waters with dichloromethane and analysed by GC-ECD. Note, the Total +ve PCBs PQL is reflective of the lowest individual PQL and is therefore" Total +ve PCBs" is simply a sum of the positive individual PCBs.
Org-008	Soil samples are extracted with dichloromethane/acetone and waters with dichloromethane and analysed by GC with dual ECD's.
Org-012	Soil samples are extracted with Dichloromethane/Acetone and waters with Dichloromethane and analysed by GC-MS.

Method ID	Methodology Summary
Org-012	Soil samples are extracted with Dichloromethane/Acetone and waters with Dichloromethane and analysed by GC-MS. Benzo(a)pyrene TEQ as per NEPM B1 Guideline on Investigation Levels for Soil and Groundwater - 2013. For soil results:- 1. 'EQ PQL'values are assuming all contributing PAHs reported as <PQL are actually at the PQL. This is the most conservative approach and can give false positive TEQs given that PAHs that contribute to the TEQ calculation may not be present. 2. 'EQ zero'values are assuming all contributing PAHs reported as <PQL are zero. This is the least conservative approach and is more susceptible to false negative TEQs when PAHs that contribute to the TEQ calculation are present but below PQL. 3. 'EQ half PQL'values are assuming all contributing PAHs reported as <PQL are half the stipulated PQL. Hence a mid-point between the most and least conservative approaches above. Note, the Total +ve PAHs PQL is reflective of the lowest individual PQL and is therefore "Total +ve PAHs" is simply a sum of the positive individual PAHs.
Org-014	Soil samples are extracted with methanol and spiked into water prior to analysing by purge and trap GC-MS.
Org-016	Soil samples are extracted with methanol and spiked into water prior to analysing by purge and trap GC-MS. Water samples are analysed directly by purge and trap GC-MS. F1 = (C6-C10)-BTEX as per NEPM B1 Guideline on Investigation Levels for Soil and Groundwater.
Org-016	Soil samples are extracted with methanol and spiked into water prior to analysing by purge and trap GC-MS. Water samples are analysed directly by purge and trap GC-MS. F1 = (C6-C10)-BTEX as per NEPM B1 Guideline on Investigation Levels for Soil and Groundwater. Note, the Total +ve Xylene PQL is reflective of the lowest individual PQL and is therefore "Total +ve Xylenes" is simply a sum of the positive individual Xylenes.

QUALITY CONTROL: VOCs in soil						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-10	[NT]
Date extracted	-			19/12/2018	1	19/12/2018	19/12/2018		19/12/2018	[NT]
Date analysed	-			28/12/2018	1	28/12/2018	28/12/2018		28/12/2018	[NT]
Dichlorodifluoromethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Chloromethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Vinyl Chloride	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Bromomethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Chloroethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Trichlorofluoromethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,1-Dichloroethene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
trans-1,2-dichloroethene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,1-dichloroethane	mg/kg	1	Org-014	<1	1	<1	<1	0	98	[NT]
cis-1,2-dichloroethene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
bromochloromethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
chloroform	mg/kg	1	Org-014	<1	1	<1	<1	0	86	[NT]
2,2-dichloropropane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,2-dichloroethane	mg/kg	1	Org-014	<1	1	<1	<1	0	80	[NT]
1,1,1-trichloroethane	mg/kg	1	Org-014	<1	1	<1	<1	0	94	[NT]
1,1-dichloropropene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Cyclohexane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
carbon tetrachloride	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Benzene	mg/kg	0.2	Org-014	<0.2	1	<0.2	<0.2	0	[NT]	[NT]
dibromomethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,2-dichloropropane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
trichloroethene	mg/kg	1	Org-014	<1	1	<1	<1	0	88	[NT]
bromodichloromethane	mg/kg	1	Org-014	<1	1	<1	<1	0	88	[NT]
trans-1,3-dichloropropene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
cis-1,3-dichloropropene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,1,2-trichloroethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Toluene	mg/kg	0.5	Org-014	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
1,3-dichloropropane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
dibromochloromethane	mg/kg	1	Org-014	<1	1	<1	<1	0	81	[NT]
1,2-dibromoethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
tetrachloroethene	mg/kg	1	Org-014	<1	1	<1	<1	0	99	[NT]
1,1,1,2-tetrachloroethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
chlorobenzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Ethylbenzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
bromoform	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
m+p-xylene	mg/kg	2	Org-014	<2	1	<2	<2	0	[NT]	[NT]
styrene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,1,2,2-tetrachloroethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
o-Xylene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]

QUALITY CONTROL: VOCs in soil						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-10	[NT]
1,2,3-trichloropropane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
isopropylbenzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
bromobenzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
n-propyl benzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
2-chlorotoluene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
4-chlorotoluene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,3,5-trimethyl benzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
tert-butyl benzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,2,4-trimethyl benzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,3-dichlorobenzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
sec-butyl benzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,4-dichlorobenzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
4-isopropyl toluene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,2-dichlorobenzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
n-butyl benzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,2-dibromo-3-chloropropane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,2,4-trichlorobenzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
hexachlorobutadiene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,2,3-trichlorobenzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Surrogate Dibromofluorometha	%		Org-014	95	1	100	101	1	[NT]	[NT]
Surrogate aaa-Trifluorotoluene	%		Org-014	84	1	80	81	1	86	[NT]
Surrogate Toluene-d_8	%		Org-014	100	1	99	98	1	102	[NT]
Surrogate 4-Bromofluorobenzene	%		Org-014	101	1	99	100	1	98	[NT]

QUALITY CONTROL: vTRH(C6-C10)/BTEXN in Soil						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-1	[NT]
Date extracted	-			19/12/2018	1	19/12/2018	19/12/2018		20/12/2018	[NT]
Date analysed	-			28/12/2018	1	28/12/2018	28/12/2018		27/12/2018	[NT]
TRH C_6 - C_9	mg/kg	25	Org-016	<25	1	<25	<25	0	113	[NT]
TRH C_6 - C_{10}	mg/kg	25	Org-016	<25	1	<25	<25	0	113	[NT]
Benzene	mg/kg	0.2	Org-016	<0.2	1	<0.2	<0.2	0	113	[NT]
Toluene	mg/kg	0.5	Org-016	<0.5	1	<0.5	<0.5	0	114	[NT]
Ethylbenzene	mg/kg	1	Org-016	<1	1	<1	<1	0	115	[NT]
m+p-xylene	mg/kg	2	Org-016	<2	1	<2	<2	0	112	[NT]
o-Xylene	mg/kg	1	Org-016	<1	1	<1	<1	0	116	[NT]
naphthalene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Surrogate aaa-Trifluorotoluene	%		Org-016	84	1	80	81	1	110	[NT]

QUALITY CONTROL: svTRH (C10-C40) in Soil						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-1	[NT]
Date extracted	-			20/12/2018	1	20/12/2018	20/12/2018		20/12/2018	[NT]
Date analysed	-			20/12/2018	1	20/12/2018	20/12/2018		20/12/2018	[NT]
TRH C_{10} - C_{14}	mg/kg	50	Org-003	<50	1	<50	<50	0	92	[NT]
TRH C_{15} - C_{28}	mg/kg	100	Org-003	<100	1	<100	<100	0	80	[NT]
TRH C_{29} - C_{36}	mg/kg	100	Org-003	<100	1	<100	<100	0	130	[NT]
TRH >C_{10} -C_{16}	mg/kg	50	Org-003	<50	1	<50	<50	0	92	[NT]
TRH >C_{16} -C_{34}	mg/kg	100	Org-003	<100	1	<100	<100	0	80	[NT]
TRH >C_{34} -C_{40}	mg/kg	100	Org-003	<100	1	<100	<100	0	130	[NT]
Surrogate o-Terphenyl	%		Org-003	101	1	98	94	4	111	[NT]

QUALITY CONTROL: PAHs in Soil						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-1	[NT]
Date extracted	-			20/12/2018	1	20/12/2018	20/12/2018		20/12/2018	[NT]
Date analysed	-			21/12/2018	1	21/12/2018	21/12/2018		21/12/2018	[NT]
Naphthalene	mg/kg	0.1	Org-012	<0.1	1	<0.1	<0.1	0	95	[NT]
Acenaphthylene	mg/kg	0.1	Org-012	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Acenaphthene	mg/kg	0.1	Org-012	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Fluorene	mg/kg	0.1	Org-012	<0.1	1	<0.1	<0.1	0	93	[NT]
Phenanthrene	mg/kg	0.1	Org-012	<0.1	1	<0.1	<0.1	0	94	[NT]
Anthracene	mg/kg	0.1	Org-012	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Fluoranthene	mg/kg	0.1	Org-012	<0.1	1	<0.1	<0.1	0	92	[NT]
Pyrene	mg/kg	0.1	Org-012	<0.1	1	<0.1	<0.1	0	94	[NT]
Benzo(a)anthracene	mg/kg	0.1	Org-012	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Chrysene	mg/kg	0.1	Org-012	<0.1	1	<0.1	<0.1	0	107	[NT]
Benzo(b,j+k)fluoranthene	mg/kg	0.2	Org-012	<0.2	1	<0.2	<0.2	0	[NT]	[NT]
Benzo(a)pyrene	mg/kg	0.05	Org-012	<0.05	1	<0.05	<0.05	0	106	[NT]
Indeno(1,2,3-c,d)pyrene	mg/kg	0.1	Org-012	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Dibenzo(a,h)anthracene	mg/kg	0.1	Org-012	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Benzo(g,h,i)perylene	mg/kg	0.1	Org-012	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Surrogate p-Terphenyl-d14	%		Org-012	98	1	111	93	18	95	[NT]

QUALITY CONTROL: Organochlorine Pesticides in soil						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-1	[NT]
Date extracted	-			20/12/2018	1	20/12/2018	20/12/2018		20/12/2018	[NT]
Date analysed	-			20/12/2018	1	20/12/2018	20/12/2018		20/12/2018	[NT]
HCB	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
alpha-BHC	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	130	[NT]
gamma-BHC	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
beta-BHC	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	104	[NT]
Heptachlor	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	108	[NT]
delta-BHC	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Aldrin	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	95	[NT]
Heptachlor Epoxide	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	98	[NT]
gamma-Chlordane	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
alpha-chlordane	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Endosulfan I	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
pp-DDE	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	105	[NT]
Dieldrin	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	112	[NT]
Endrin	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	104	[NT]
pp-DDD	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	97	[NT]
Endosulfan II	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
pp-DDT	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Endrin Aldehyde	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Endosulfan Sulphate	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	117	[NT]
Methoxychlor	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Surrogate TCMX	%		Org-005	110	1	112	110	2	123	[NT]

QUALITY CONTROL: Organophosphorus Pesticides						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-1	[NT]
Date extracted	-			20/12/2018	1	20/12/2018	20/12/2018		20/12/2018	[NT]
Date analysed	-			20/12/2018	1	20/12/2018	20/12/2018		20/12/2018	[NT]
Azinphos-methyl (Guthion)	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Bromophos-ethyl	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Chlorpyriphos	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	100	[NT]
Chlorpyriphos-methyl	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Diazinon	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Dichlorvos	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	93	[NT]
Dimethoate	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Ethion	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	100	[NT]
Fenitrothion	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	102	[NT]
Malathion	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	91	[NT]
Parathion	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	100	[NT]
Ronnel	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	110	[NT]
Surrogate TCMX	%		Org-008	110	1	112	110	2	112	[NT]

QUALITY CONTROL: PCBs in Soil						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-1	[NT]
Date extracted	-			20/12/2018	1	20/12/2018	20/12/2018		20/12/2018	[NT]
Date analysed	-			20/12/2018	1	20/12/2018	20/12/2018		20/12/2018	[NT]
Aroclor 1016	mg/kg	0.1	Org-006	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Aroclor 1221	mg/kg	0.1	Org-006	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Aroclor 1232	mg/kg	0.1	Org-006	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Aroclor 1242	mg/kg	0.1	Org-006	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Aroclor 1248	mg/kg	0.1	Org-006	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Aroclor 1254	mg/kg	0.1	Org-006	<0.1	1	<0.1	<0.1	0	109	[NT]
Aroclor 1260	mg/kg	0.1	Org-006	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Surrogate TCLMX	%		Org-006	110	1	112	110	2	112	[NT]

QUALITY CONTROL: SVOCs in Soil						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-1	208526-1
Date extracted	-			20/12/2018	1	20/12/2018	20/12/2018		20/12/2018	20/12/2018
Date analysed	-			21/12/2018	1	21/12/2018	21/12/2018		21/12/2018	21/12/2018
Phenol	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	80	93
Bis-(2-chloroethyl) ether	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
2-Chlorophenol	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	85	97
1,3-Dichlorobenzene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
1,4-Dichlorobenzene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	85	84
2-Methylphenol	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
1,2-Dichlorobenzene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Bis (2-chloroisopropyl) ether	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
3/4-Methylphenol	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
N-nitrosodi-n-propylamine	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Hexachloroethane	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Nitrobenzene	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Isophorone	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
2,4-Dimethylphenol	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
2-Nitrophenol	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Bis(2-chloroethoxy)methane	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
2,4-Dichlorophenol	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
1,2,4-Trichlorobenzene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Naphthalene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
4-Chloroaniline	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Hexachlorobutadiene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
4-Chloro-3-methylphenol	mg/kg	5	Org-012	<5	1	<5	<5	0	[NT]	[NT]
2-Methylnaphthalene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Hexachlorocyclopentadiene	mg/kg	2	Org-012	<2	1	<2	<2	0	[NT]	[NT]
2,4,6-trichlorophenol	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
2,4,5-trichlorophenol	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
2-Chloronaphthalene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
2-nitroaniline	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Dimethylphthalate	mg/kg	1	Org-012	<1	1	<1	<1	0	96	94
2,6-Dinitrotoluene	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Acenaphthylene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
3-Nitroaniline	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Acenaphthene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	93	93
2,4-dinitrophenol	mg/kg	10	Org-012	<10	1	<10	<10	0	[NT]	[NT]
4-nitrophenol	mg/kg	10	Org-012	<10	1	<10	<10	0	89	69
Dibenzofuran	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
diethylphthalate	mg/kg	1	Org-012	<1	1	<1	<1	0	94	95
4-chlorophenylphenylether	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
4-nitroaniline	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]

QUALITY CONTROL: SVOCs in Soil						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-1	208526-1
Fluorene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
2-methyl-4,6-dinitrophenol	mg/kg	10	Org-012	<10	1	<10	<10	0	[NT]	[NT]
azobenzene	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
4-bromophenylphenylether	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
hexachlorobenzene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
pentachlorophenol	mg/kg	5	Org-012	<5	1	<5	<5	0	[NT]	[NT]
Phenanthrene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Anthracene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
carbazole	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
di-n-butylphthalate	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Fluoranthene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Pyrene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	95	94
butylbenzylphthalate	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
bis(2-ethylhexyl)phthalate	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Benzo(a)anthracene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Chrysene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
di-n-octylphthalate	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Benzo(b+j+k)fluoranthene	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Benzo(a)pyrene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Indeno(1,2,3-c,d)pyrene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Dibenzo(a,h)anthracene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Benzo(g,h,i)perylene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
ethylmethanesulfonate	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
aniline	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
pentachloroethane	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
benzyl alcohol	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
acetophenone	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
N-nitrosomorpholine	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
N-nitrosopiperidine	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
2,6-dichlorophenol	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
hexachloropropene-1	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
N-nitroso-n-butylamine	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
safrole	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
1,2,4,5-tetrachlorobenzene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
cis and trans iso-safrole	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
1,3-dinitrobenzene	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
pentachlorobenzene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
1-naphthylamine	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
2,3,4,6-tetrachlorophenol	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
2-naphthylamine	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
5-nitro-o-toluidine	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]

QUALITY CONTROL: SVOCs in Soil						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-1	208526-1
diphenylamine	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
phenacetin	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
pentachloronitrobenzene	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
dinoseb	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
methapyrilene	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
p-dimethylaminoazobenzene	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
2-acetylaminofluorene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
7,12-dimethylbenz(a)anthracene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
3-methylcholanthrene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
a-BHC	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
b-BHC	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
g-BHC	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
d-BHC	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Heptachlor	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Aldrin	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	107	111
Heptachlor Epoxide	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
g-Chlordane	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
a-Chlordane	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Endosulfan I	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
p,p'-DDE	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Dieldrin	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	113	118
Endrin	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
p,p'-DDD	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Endosulfan II	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Endrin Aldehyde	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
p,p'-DDT	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Endrin Ketone	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Endosulfan Sulphate	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Methoxychlor	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Surrogate 2-fluorophenol	%		Org-012	86	1	97	93	4	85	89
Surrogate Phenol-d_6	%		Org-012	78	1	83	100	19	75	100
Surrogate Nitrobenzene-d_5	%		Org-012	76	1	85	82	4	80	85
Surrogate 2-fluorobiphenyl	%		Org-012	93	1	94	86	9	89	87
Surrogate 2,4,6-Tribromophenol	%		Org-012	83	1	124	116	7	105	112
Surrogate p-Terphenyl-d_{14}	%		Org-012	96	1	99	92	7	96	92

QUALITY CONTROL: Acid Extractable metals in soil						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-1	[NT]
Date prepared	-			20/12/2018	1	20/12/2018	20/12/2018		20/12/2018	[NT]
Date analysed	-			20/12/2018	1	20/12/2018	20/12/2018		20/12/2018	[NT]
Arsenic	mg/kg	4	Metals-020	<4	1	12	10	18	110	[NT]
Cadmium	mg/kg	0.4	Metals-020	<0.4	1	<0.4	<0.4	0	105	[NT]
Chromium	mg/kg	1	Metals-020	<1	1	2	2	0	109	[NT]
Copper	mg/kg	1	Metals-020	<1	1	4	3	29	107	[NT]
Lead	mg/kg	1	Metals-020	<1	1	25	17	38	107	[NT]
Mercury	mg/kg	0.1	Metals-021	<0.1	1	0.2	0.1	67	113	[NT]
Nickel	mg/kg	1	Metals-020	<1	1	<1	<1	0	105	[NT]
Zinc	mg/kg	1	Metals-020	<1	1	19	15	24	107	[NT]

Result Definitions

NT	Not tested
NA	Test not required
INS	Insufficient sample for this test
PQL	Practical Quantitation Limit
<	Less than
>	Greater than
RPD	Relative Percent Difference
LCS	Laboratory Control Sample
NS	Not specified
NEPM	National Environmental Protection Measure
NR	Not Reported

Quality Control Definitions

Blank	This is the component of the analytical signal which is not derived from the sample but from reagents, glassware etc, can be determined by processing solvents and reagents in exactly the same manner as for samples.
Duplicate	This is the complete duplicate analysis of a sample from the process batch. If possible, the sample selected should be one where the analyte concentration is easily measurable.
Matrix Spike	A portion of the sample is spiked with a known concentration of target analyte. The purpose of the matrix spike is to monitor the performance of the analytical method used and to determine whether matrix interferences exist.
LCS (Laboratory Control Sample)	This comprises either a standard reference material or a control matrix (such as a blank sand or water) fortified with analytes representative of the analyte class. It is simply a check sample.
Surrogate Spike	Surrogates are known additions to each sample, blank, matrix spike and LCS in a batch, of compounds which are similar to the analyte of interest, however are not expected to be found in real samples.

Australian Drinking Water Guidelines recommend that Thermotolerant Coliform, Faecal Enterococci, & E.Coli levels are less than 1cfu/100mL. The recommended maximums are taken from "Australian Drinking Water Guidelines", published by NHMRC & ARMC 2011.

Laboratory Acceptance Criteria

Duplicate sample and matrix spike recoveries may not be reported on smaller jobs, however, were analysed at a frequency to meet or exceed NEPM requirements. All samples are tested in batches of 20. The duplicate sample RPD and matrix spike recoveries for the batch were within the laboratory acceptance criteria.

Filters, swabs, wipes, tubes and badges will not have duplicate data as the whole sample is generally extracted during sample extraction.

Spikes for Physical and Aggregate Tests are not applicable.

For VOCs in water samples, three vials are required for duplicate or spike analysis.

Duplicates: >10xPQL - RPD acceptance criteria will vary depending on the analytes and the analytical techniques but is typically in the range 20%-50% – see ELN-P05 QA/QC tables for details; <10xPQL - RPD are higher as the results approach PQL and the estimated measurement uncertainty will statistically increase.

Matrix Spikes, LCS and Surrogate recoveries: Generally 70-130% for inorganics/metals; 60-140% for organics (+/-50% surrogates) and 10-140% for labile SVOCs (including labile surrogates), ultra trace organics and speciated phenols is acceptable.

In circumstances where no duplicate and/or sample spike has been reported at 1 in 10 and/or 1 in 20 samples respectively, the sample volume submitted was insufficient in order to satisfy laboratory QA/QC protocols.

When samples are received where certain analytes are outside of recommended technical holding times (THTs), the analysis has proceeded. Where analytes are on the verge of breaching THTs, every effort will be made to analyse within the THT or as soon as practicable.

Where sampling dates are not provided, Envirolab are not in a position to comment on the validity of the analysis where recommended technical holding times may have been breached.

Measurement Uncertainty estimates are available for most tests upon request.

Report Comments

Asbestos: A portion of the supplied sample was sub-sampled for asbestos analysis according to Envirolab procedures. We cannot guarantee that this sub-sample is indicative of the entire sample. Envirolab recommends supplying 40-50g of sample in its own container.
Note: Sample 208526-1 was sub-sampled from a jar provided by the client.

BTEX in soil: On column results for trip spike reported.

CHAIN OF CUSTODY

ALS Laboratory: please tick →

ADELAIDE 21 Burma Road Pooraka SA 5095 Ph: 08 8359 0890 E: adelaide@alsglobal.com

BRISBANE 32 Shand Street Stafford QLD 4053 Ph: 07 3243 7222 E: samples.brisbane@alsglobal.com

GLADSTONE 36 Callemondah Drive Clinton QLD 4680 Ph: 07 4971 6900 E: gladstone@alsglobal.com

MACKAY 78 Harbour Road Mackay QLD 4740 Ph: 07 4944 0177 E: mackay@alsglobal.com

MELBOURNE 24 Westall Road Springvale VIC 3171 Ph: 03 8549 9600 E: melbourne@alsglobal.com

MUDGEE 27 Sydney Road Mudgee NSW 2850 Ph: 02 6372 6735 E: mudgee@alsglobal.com

NEWCASTLE 5/585 Maitland Rd Mayfield West NSW 2304 Ph: 02 4014 2500 E: newcastle@alsglobal.com

TOWNSVILLE 14-15 Desma Court Bohle QLD 4818 Ph: 07 4796 0600 E: townsville@alsglobal.com

PERTH 10 Hod Way Malaga WA 6090 Ph: 08 9209 7655 E: perth@alsglobal.com

SYDNEY 277-289 Woodpark Road Smithfield NSW 2164 Ph: 02 8784 8555 E: sydney@alsglobal.com

WOLLONGONG 99 Kenny Street Wollongong NSW 2500 Ph: 02 4225 3125 E: wollongong@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	TURNAROUND REQUIREMENTS : (Standard TAT may be longer for some tests e.g. Ultra Trace Organics)	☒ Standard TAT (List due date):	FOR LABORATORY USE ONLY (Circle)
OFFICE:		☐ Non Standard or urgent TAT (List due date):	Custody Seal Intact? Yes No N/A
PROJECT: King St North ESA	ALS QUOTE NO.:	COC SEQUENCE NUMBER (Circle)	Free Ice / frozen Ice bricks present upon receipt? Yes No N/A
ORDER NUMBER: 10026439		COC: 1 2 3 4 5 6 7	Random Sample Temperature on Receipt: °C
PROJECT MANAGER: Dean Stafford	CONTACT PH: 0434 657 155	OF: 1 2 3 4 5 6 7	Other comment: S-7
SAMPLER: Caitlain Regena	SAMPLER MOBILE: 0438 263 112		
COC emailed to ALS? (NO)	EDD FORMAT (or default):		
Email Reports to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com			
Email Invoice to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com			

RELINQUISHED BY:	RECEIVED BY:	RELINQUISHED BY:	RECEIVED BY: T.Nguyen 4ECS
Caitlain Regena	Stacy Hyde ALS		
DATE/TIME: 17/12/18	DATE/TIME: 17/12/18 1730	DATE/TIME:	DATE/TIME: 19/12/18 15:06

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)			CONTAINER INFORMATION		ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).								Additional Information
LAB ID	SAMPLE ID	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	TOTAL CONTAINERS	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Analytes)				Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
5	BH03@2.00	12-12-18	S		1	x	x	x						
6	BH01@0.50	12-12-18	S		1	x	x	x	x					
7	BH01@1.00	12-12-18	S		1									
8	BH01@2.00	12-12-18	S		1	x	x	x						
9	DUP1	12-12-18	S		1	x	x	x						
1-	TRIP1	12-12-18	S		1	x	x	x						
10	BH02@1.00	12-12-18	S		1	x	x	x	x					
11	BH02@1.50	12-12-18	S		1									
12	BH02@2.50	12-12-18	S		1	x	x	x						
13	MW02@1.00	12-12-18	S		1	x	x	x	x					
14	MW02@3.00	12-12-18	S		1									
15	MW02@6.00	12-12-18	S		1	x	x	x						
					12									

Please send to ~~ALS~~ ENVIROLAB

ENVIROLAB Envirolab Services 12 Ashley St Chatswood NSW 2067 Ph: (02) 9910 6200

Job No: 208526

Date Received: 19/12/18

Time Received: 15:06

Received By: TN

Temp: Cool/Ambient

Cooling: Ice/Icepack

Security: Intact/Broken/None

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP = Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass;
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

2 TB
3 TS -eAras.

Ellen Wandala Gamage

From: Regena, Caitlain <Caitlain.Regena@arcadis.com>
Sent: Wednesday, 19 December 2018 4:53 PM
To: Ellen Wandala Gamage
Cc: Stafford, Dean
Subject: Re: 10026439, King St North ESA - 208526

Hi Ellen,

Yes the TB and TS require BTEX analysis.

Thanks,
Caitlain

Get Outlook for iOS

From: Ellen Wandala Gamage <ewandalagamage@envirolab.com.au>
Sent: Wednesday, December 19, 2018 4:50 pm
To: Regena, Caitlain
Cc: Stafford, Dean
Subject: 10026439, King St North ESA - 208526

Hi Caitlain,
There was a TB/TS was received with the Trip1, are these conducted for any analysis?
Thanks
Ellen

Regards,

Ellen Wandala Gamage | Customer Service (12pm - 8pm) | Envirolab Services Pty Ltd

Great Science, Great Service.

Chatswood NSW 2067

E EWandalaGamage@envirolab.com.au | **W**

Envirolab Services Pty Ltd
ABN 37 112 535 645
12 Ashley St Chatswood NSW 2067
ph 02 9910 6200 fax 02 9910 6201
customerservice@envirolab.com.au
www.envirolab.com.au

CERTIFICATE OF ANALYSIS 208720

Client Details

Client	Arcadis Australia Pacific Pty Ltd
Attention	Dean Stafford
Address	Level 16, 580 George St, Sydney, NSW, 2000

Sample Details

Your Reference	**10026439, King St North ESA**
Number of Samples	2 SOIL
Date samples received	21/12/2018
Date completed instructions received	21/12/2018

Analysis Details

Please refer to the following pages for results, methodology summary and quality control data.

Samples were analysed as received from the client. Results relate specifically to the samples as received.

Results are reported on a dry weight basis for solids and on an as received basis for other matrices.

Please refer to the last page of this report for any comments relating to the results.

Report Details

Date results requested by	08/01/2019
Date of Issue	02/01/2019

NATA Accreditation Number 2901. This document shall not be reproduced except in full.

Accredited for compliance with ISO/IEC 17025 - Testing. **Tests not covered by NATA are denoted with ***

Asbestos Approved By
Analysed by Asbestos Approved Identifier: Matt Tang
Authorised by Asbestos Approved Signatory: Lucy Zhu

Results Approved By
Jeremy Faircloth, Organics Supervisor
Leon Ow, Chemist
Lucy Zhu, Asbestos Analyst
Steven Luong, Senior Chemist

Authorised By



Jacinta Hurst, Laboratory Manager

VOCs in soil			
Our Reference		208720-1	208720-2
Your Reference	UNITS	TRIP 4	TRIP 3
Date Sampled		19/12/2018	19/12/2018
Type of sample		SOIL	SOIL
Date extracted	-	27/12/2018	27/12/2018
Date analysed	-	02/01/2019	02/01/2019
Dichlorodifluoromethane	mg/kg	<1	<1
Chloromethane	mg/kg	<1	<1
Vinyl Chloride	mg/kg	<1	<1
Bromomethane	mg/kg	<1	<1
Chloroethane	mg/kg	<1	<1
Trichlorofluoromethane	mg/kg	<1	<1
1,1-Dichloroethene	mg/kg	<1	<1
trans-1,2-dichloroethene	mg/kg	<1	<1
1,1-dichloroethane	mg/kg	<1	<1
cis-1,2-dichloroethene	mg/kg	<1	<1
bromochloromethane	mg/kg	<1	<1
chloroform	mg/kg	<1	<1
2,2-dichloropropane	mg/kg	<1	<1
1,2-dichloroethane	mg/kg	<1	<1
1,1,1-trichloroethane	mg/kg	<1	<1
1,1-dichloropropene	mg/kg	<1	<1
Cyclohexane	mg/kg	<1	<1
carbon tetrachloride	mg/kg	<1	<1
Benzene	mg/kg	<0.2	<0.2
dibromomethane	mg/kg	<1	<1
1,2-dichloropropane	mg/kg	<1	<1
trichloroethene	mg/kg	<1	<1
bromodichloromethane	mg/kg	<1	<1
trans-1,3-dichloropropene	mg/kg	<1	<1
cis-1,3-dichloropropene	mg/kg	<1	<1
1,1,2-trichloroethane	mg/kg	<1	<1
Toluene	mg/kg	<0.5	<0.5
1,3-dichloropropane	mg/kg	<1	<1
dibromochloromethane	mg/kg	<1	<1
1,2-dibromoethane	mg/kg	<1	<1
tetrachloroethene	mg/kg	<1	<1
1,1,1,2-tetrachloroethane	mg/kg	<1	<1
chlorobenzene	mg/kg	<1	<1
Ethylbenzene	mg/kg	<1	<1
bromoform	mg/kg	<1	<1

VOCs in soil			
Our Reference	UNITS	208720-1	208720-2
Your Reference		TRIP 4	TRIP 3
Date Sampled		19/12/2018	19/12/2018
Type of sample		SOIL	SOIL
m+p-xylene	mg/kg	<2	<2
styrene	mg/kg	<1	<1
1,1,2,2-tetrachloroethane	mg/kg	<1	<1
o-Xylene	mg/kg	<1	<1
1,2,3-trichloropropane	mg/kg	<1	<1
isopropylbenzene	mg/kg	<1	<1
bromobenzene	mg/kg	<1	<1
n-propyl benzene	mg/kg	<1	<1
2-chlorotoluene	mg/kg	<1	<1
4-chlorotoluene	mg/kg	<1	<1
1,3,5-trimethyl benzene	mg/kg	<1	<1
tert-butyl benzene	mg/kg	<1	<1
1,2,4-trimethyl benzene	mg/kg	<1	<1
1,3-dichlorobenzene	mg/kg	<1	<1
sec-butyl benzene	mg/kg	<1	<1
1,4-dichlorobenzene	mg/kg	<1	<1
4-isopropyl toluene	mg/kg	<1	<1
1,2-dichlorobenzene	mg/kg	<1	<1
n-butyl benzene	mg/kg	<1	<1
1,2-dibromo-3-chloropropane	mg/kg	<1	<1
1,2,4-trichlorobenzene	mg/kg	<1	<1
hexachlorobutadiene	mg/kg	<1	<1
1,2,3-trichlorobenzene	mg/kg	<1	<1
Surrogate Dibromofluorometha	%	108	108
Surrogate aaa-Trifluorotoluene	%	72	74
Surrogate Toluene-d_8	%	100	101
Surrogate 4-Bromofluorobenzene	%	101	101

vTRH(C6-C10)/BTEXN in Soil			
Our Reference	UNITS	208720-1	208720-2
Your Reference		TRIP 4	TRIP 3
Date Sampled		19/12/2018	19/12/2018
Type of sample		SOIL	SOIL
Date extracted	-	27/12/2018	27/12/2018
Date analysed	-	02/01/2019	02/01/2019
TRH C_6 - C_9	mg/kg	<25	<25
TRH C_6 - C_{10}	mg/kg	<25	<25
vTPH C_6 - C_{10} less BTEX (F1)	mg/kg	<25	<25
Benzene	mg/kg	<0.2	<0.2
Toluene	mg/kg	<0.5	<0.5
Ethylbenzene	mg/kg	<1	<1
m+p-xylene	mg/kg	<2	<2
o-Xylene	mg/kg	<1	<1
naphthalene	mg/kg	<1	<1
Total +ve Xylenes	mg/kg	<1	<1
Surrogate aaa-Trifluorotoluene	%	72	74

svTRH (C10-C40) in Soil			
Our Reference		208720-1	208720-2
Your Reference	UNITS	TRIP 4	TRIP 3
Date Sampled		19/12/2018	19/12/2018
Type of sample		SOIL	SOIL
Date extracted	-	27/12/2018	27/12/2018
Date analysed	-	27/12/2018	28/12/2018
TRH C_{10} - C_{14}	mg/kg	<50	<50
TRH C_{15} - C_{28}	mg/kg	<100	<100
TRH C_{29} - C_{36}	mg/kg	<100	<100
TRH >C_{10} -C_{16}	mg/kg	<50	<50
TRH >C_{10} - C_{16} less Naphthalene (F2)	mg/kg	<50	<50
TRH >C_{16} -C_{34}	mg/kg	<100	<100
TRH >C_{34} -C_{40}	mg/kg	<100	<100
Total +ve TRH (>C10-C40)	mg/kg	<50	<50
Surrogate o-Terphenyl	%	79	106

SVOCs in Soil			
Our Reference	UNITS	208720-1	208720-2
Your Reference		TRIP 4	TRIP 3
Date Sampled		19/12/2018	19/12/2018
Type of sample		SOIL	SOIL
Date extracted	-	27/12/2018	27/12/2018
Date analysed	-	28/12/2018	28/12/2018
Phenol	mg/kg	<0.5	<0.5
Bis-(2-chloroethyl) ether	mg/kg	<1	<1
2-Chlorophenol	mg/kg	<0.5	<0.5
1,3-Dichlorobenzene	mg/kg	<0.5	<0.5
1,4-Dichlorobenzene	mg/kg	<0.5	<0.5
2-Methylphenol	mg/kg	<0.5	<0.5
1,2-Dichlorobenzene	mg/kg	<0.5	<0.5
Bis (2-chloroisopropyl) ether	mg/kg	<1	<1
3/4-Methylphenol	mg/kg	<1	<1
N-nitrosodi-n-propylamine	mg/kg	<1	<1
Hexachloroethane	mg/kg	<0.5	<0.5
Nitrobenzene	mg/kg	<1	<1
Isophorone	mg/kg	<1	<1
2,4-Dimethylphenol	mg/kg	<0.5	<0.5
2-Nitrophenol	mg/kg	<0.5	<0.5
Bis(2-chloroethoxy)methane	mg/kg	<1	<1
2,4-Dichlorophenol	mg/kg	<0.5	<0.5
1,2,4-Trichlorobenzene	mg/kg	<0.5	<0.5
Naphthalene	mg/kg	<0.5	<0.5
4-Chloroaniline	mg/kg	<1	<1
Hexachlorobutadiene	mg/kg	<0.5	<0.5
4-Chloro-3-methylphenol	mg/kg	<5	<5
2-Methylnaphthalene	mg/kg	<0.5	<0.5
Hexachlorocyclopentadiene	mg/kg	<2	<2
2,4,6-trichlorophenol	mg/kg	<0.5	<0.5
2,4,5-trichlorophenol	mg/kg	<0.5	<0.5
2-Chloronaphthalene	mg/kg	<0.5	<0.5
2-nitroaniline	mg/kg	<1	<1
Dimethylphthalate	mg/kg	<1	<1
2,6-Dinitrotoluene	mg/kg	<1	<1
Acenaphthylene	mg/kg	<0.5	<0.5
3-Nitroaniline	mg/kg	<1	<1
Acenaphthene	mg/kg	<0.5	<0.5
2,4-dinitrophenol	mg/kg	<10	<10
4-nitrophenol	mg/kg	<10	<10

SVOCs in Soil			
Our Reference		208720-1	208720-2
Your Reference	UNITS	TRIP 4	TRIP 3
Date Sampled		19/12/2018	19/12/2018
Type of sample		SOIL	SOIL
Dibenzofuran	mg/kg	<1	<1
diethylphthalate	mg/kg	<1	<1
4-chlorophenylphenylether	mg/kg	<1	<1
4-nitroaniline	mg/kg	<1	<1
Fluorene	mg/kg	<0.5	<0.5
2-methyl-4,6-dinitrophenol	mg/kg	<10	<10
azobenzene	mg/kg	<1	<1
4-bromophenylphenylether	mg/kg	<1	<1
hexachlorobenzene	mg/kg	<0.5	<0.5
pentachlorophenol	mg/kg	<5	<5
Phenanthrene	mg/kg	<0.5	0.8
Anthracene	mg/kg	<0.5	<0.5
carbazole	mg/kg	<1	<1
di-n-butylphthalate	mg/kg	<1	<1
Fluoranthene	mg/kg	<0.5	2
Pyrene	mg/kg	<0.5	3
butylbenzylphthalate	mg/kg	<1	<1
bis(2-ethylhexyl)phthalate	mg/kg	<1	<1
Benzo(a)anthracene	mg/kg	<0.5	2
Chrysene	mg/kg	<0.5	1
di-n-octylphthalate	mg/kg	<1	<1
Benzo(b+j+k)fluoranthene	mg/kg	<1	3
Benzo(a)pyrene	mg/kg	<0.5	2
Indeno(1,2,3-c,d)pyrene	mg/kg	<0.5	2
Dibenzo(a,h)anthracene	mg/kg	<0.5	<0.5
Benzo(g,h,i)perylene	mg/kg	<0.5	1
ethylmethanesulfonate	mg/kg	<1	<1
aniline	mg/kg	<1	<1
pentachloroethane	mg/kg	<0.5	<0.5
benzyl alcohol	mg/kg	<1	<1
acetophenone	mg/kg	<1	<1
N-nitrosomorpholine	mg/kg	<1	<1
N-nitrosopiperidine	mg/kg	<1	<1
2,6-dichlorophenol	mg/kg	<0.5	<0.5
hexachloropropene-1	mg/kg	<0.5	<0.5
N-nitroso-n-butylamine	mg/kg	<1	<1
safrole	mg/kg	<1	<1
1,2,4,5-tetrachlorobenzene	mg/kg	<0.5	<0.5

SVOCs in Soil			
Our Reference		208720-1	208720-2
Your Reference	UNITS	TRIP 4	TRIP 3
Date Sampled		19/12/2018	19/12/2018
Type of sample		SOIL	SOIL
cis and trans iso-safrole	mg/kg	<1	<1
1,3-dinitrobenzene	mg/kg	<1	<1
pentachlorobenzene	mg/kg	<0.5	<0.5
1-naphthylamine	mg/kg	<1	<1
2,3,4,6-tetrachlorophenol	mg/kg	<0.5	<0.5
2-naphthylamine	mg/kg	<1	<1
5-nitro-o-toluidine	mg/kg	<1	<1
diphenylamine	mg/kg	<1	<1
phenacetin	mg/kg	<1	<1
pentachloronitrobenzene	mg/kg	<1	<1
dinoseb	mg/kg	<1	<1
methapyrilene	mg/kg	<1	<1
p-dimethylaminoazobenzene	mg/kg	<1	<1
2-acetylaminofluorene	mg/kg	<0.5	<0.5
7,12-dimethylbenz(a)anthracene	mg/kg	<0.5	<0.5
3-methylcholanthrene	mg/kg	<0.5	<0.5
a-BHC	mg/kg	<0.5	<0.5
b-BHC	mg/kg	<0.5	<0.5
g-BHC	mg/kg	<0.5	<0.5
d-BHC	mg/kg	<0.5	<0.5
Heptachlor	mg/kg	<0.5	<0.5
Aldrin	mg/kg	<0.5	<0.5
Heptachlor Epoxide	mg/kg	<0.5	<0.5
g-Chlordane	mg/kg	<0.5	<0.5
a-Chlordane	mg/kg	<0.5	<0.5
Endosulfan I	mg/kg	<0.5	<0.5
p,p'-DDE	mg/kg	<0.5	<0.5
Dieldrin	mg/kg	<0.5	<0.5
Endrin	mg/kg	<0.5	<0.5
p,p'-DDD	mg/kg	<0.5	<0.5
Endosulfan II	mg/kg	<0.5	<0.5
Endrin Aldehyde	mg/kg	<0.5	<0.5
p,p'-DDT	mg/kg	<0.5	<0.5
Endrin Ketone	mg/kg	<0.5	<0.5
Endosulfan Sulphate	mg/kg	<0.5	<0.5
Methoxychlor	mg/kg	<1	<1
Surrogate 2-fluorophenol	%	83	85
Surrogate Phenol-d_6	%	61	72

SVOCs in Soil			
Our Reference		208720-1	208720-2
Your Reference	UNITS	TRIP 4	TRIP 3
Date Sampled		19/12/2018	19/12/2018
Type of sample		SOIL	SOIL
Surrogate Nitrobenzene-d_5	%	73	70
Surrogate 2-fluorobiphenyl	%	86	80
Surrogate 2,4,6-Tribromophenol	%	68	73
Surrogate p-Terphenyl-d_{14}	%	101	92

Organochlorine Pesticides in soil			
Our Reference	UNITS	208720-1	208720-2
Your Reference		TRIP 4	TRIP 3
Date Sampled		19/12/2018	19/12/2018
Type of sample		SOIL	SOIL
Date extracted	-	27/12/2018	27/12/2018
Date analysed	-	27/12/2018	27/12/2018
HCB	mg/kg	<0.1	<0.1
alpha-BHC	mg/kg	<0.1	<0.1
gamma-BHC	mg/kg	<0.1	<0.1
beta-BHC	mg/kg	<0.1	<0.1
Heptachlor	mg/kg	<0.1	<0.1
delta-BHC	mg/kg	<0.1	<0.1
Aldrin	mg/kg	<0.1	<0.1
Heptachlor Epoxide	mg/kg	<0.1	<0.1
gamma-Chlordane	mg/kg	<0.1	<0.1
alpha-chlordane	mg/kg	<0.1	<0.1
Endosulfan I	mg/kg	<0.1	<0.1
pp-DDE	mg/kg	<0.1	<0.1
Dieldrin	mg/kg	<0.1	<0.1
Endrin	mg/kg	<0.1	<0.1
pp-DDD	mg/kg	<0.1	<0.1
Endosulfan II	mg/kg	<0.1	<0.1
pp-DDT	mg/kg	<0.1	<0.1
Endrin Aldehyde	mg/kg	<0.1	<0.1
Endosulfan Sulphate	mg/kg	<0.1	<0.1
Methoxychlor	mg/kg	<0.1	<0.1
Total +ve DDT+DDD+DDE	mg/kg	<0.1	<0.1
Surrogate TCMX	%	100	101

Organophosphorus Pesticides			
Our Reference	UNITS	208720-1	208720-2
Your Reference		TRIP 4	TRIP 3
Date Sampled		19/12/2018	19/12/2018
Type of sample		SOIL	SOIL
Date extracted	-	27/12/2018	27/12/2018
Date analysed	-	27/12/2018	27/12/2018
Azinphos-methyl (Guthion)	mg/kg	<0.1	<0.1
Bromophos-ethyl	mg/kg	<0.1	<0.1
Chlorpyriphos	mg/kg	<0.1	<0.1
Chlorpyriphos-methyl	mg/kg	<0.1	<0.1
Diazinon	mg/kg	<0.1	<0.1
Dichlorvos	mg/kg	<0.1	<0.1
Dimethoate	mg/kg	<0.1	<0.1
Ethion	mg/kg	<0.1	<0.1
Fenitrothion	mg/kg	<0.1	<0.1
Malathion	mg/kg	<0.1	<0.1
Parathion	mg/kg	<0.1	<0.1
Ronnel	mg/kg	<0.1	<0.1
Surrogate TCMX	%	100	101

PCBs in Soil			
Our Reference		208720-1	208720-2
Your Reference	UNITS	TRIP 4	TRIP 3
Date Sampled		19/12/2018	19/12/2018
Type of sample		SOIL	SOIL
Date extracted	-	27/12/2018	27/12/2018
Date analysed	-	27/12/2018	27/12/2018
Aroclor 1016	mg/kg	<0.1	<0.1
Aroclor 1221	mg/kg	<0.1	<0.1
Aroclor 1232	mg/kg	<0.1	<0.1
Aroclor 1242	mg/kg	<0.1	<0.1
Aroclor 1248	mg/kg	<0.1	<0.1
Aroclor 1254	mg/kg	<0.1	<0.1
Aroclor 1260	mg/kg	<0.1	<0.1
Total +ve PCBs (1016-1260)	mg/kg	<0.1	<0.1
Surrogate TCLMX	%	100	101

Acid Extractable metals in soil			
Our Reference		208720-1	208720-2
Your Reference	UNITS	TRIP 4	TRIP 3
Date Sampled		19/12/2018	19/12/2018
Type of sample		SOIL	SOIL
Date prepared	-	27/12/2018	27/12/2018
Date analysed	-	27/12/2018	27/12/2018
Arsenic	mg/kg	<4	5
Cadmium	mg/kg	<0.4	<0.4
Chromium	mg/kg	2	7
Copper	mg/kg	<1	56
Lead	mg/kg	<1	120
Mercury	mg/kg	<0.1	0.2
Nickel	mg/kg	<1	4
Zinc	mg/kg	8	73

Moisture			
Our Reference		208720-1	208720-2
Your Reference	UNITS	TRIP 4	TRIP 3
Date Sampled		19/12/2018	19/12/2018
Type of sample		SOIL	SOIL
Date prepared	-	27/12/2018	27/12/2018
Date analysed	-	28/12/2018	28/12/2018
Moisture	%	21	6.4

Asbestos ID - soils		
Our Reference		208720-2
Your Reference	UNITS	TRIP 3
Date Sampled		19/12/2018
Type of sample		SOIL
Date analysed	-	28/12/2018
Sample mass tested	g	Approx. 30g
Sample Description	-	Brown sandy soil & rocks
Asbestos ID in soil	-	No asbestos detected at reporting limit of 0.1g/kg Organic fibres detected
Trace Analysis	-	No asbestos detected

Method ID	Methodology Summary
ASB-001	Asbestos ID - Qualitative identification of asbestos in bulk samples using Polarised Light Microscopy and Dispersion Staining Techniques including Synthetic Mineral Fibre and Organic Fibre as per Australian Standard 4964-2004.
Inorg-008	Moisture content determined by heating at 105+/-5 °C for a minimum of 12 hours.
Metals-020	Determination of various metals by ICP-AES.
Metals-021	Determination of Mercury by Cold Vapour AAS.
Org-003	Soil samples are extracted with Dichloromethane/Acetone and waters with Dichloromethane and analysed by GC-FID. F2 = (>C10-C16)-Naphthalene as per NEPM B1 Guideline on Investigation Levels for Soil and Groundwater (HSLs Tables 1A (3, 4)). Note Naphthalene is determined from the VOC analysis.
Org-003	Soil samples are extracted with Dichloromethane/Acetone and waters with Dichloromethane and analysed by GC-FID. F2 = (>C10-C16)-Naphthalene as per NEPM B1 Guideline on Investigation Levels for Soil and Groundwater (HSLs Tables 1A (3, 4)). Note Naphthalene is determined from the VOC analysis. Note, the Total +ve TRH PQL is reflective of the lowest individual PQL and is therefore "Total +ve TRH" is simply a sum of the positive individual TRH fractions (>C10-C40).
Org-005	Soil samples are extracted with dichloromethane/acetone and waters with dichloromethane and analysed by GC with dual ECD's.
Org-005	Soil samples are extracted with dichloromethane/acetone and waters with dichloromethane and analysed by GC with dual ECD's. Note, the Total +ve reported DDD+DDE+DDT PQL is reflective of the lowest individual PQL and is therefore simply a sum of the positive individually report DDD+DDE+DDT.
Org-006	Soil samples are extracted with dichloromethane/acetone and waters with dichloromethane and analysed by GC-ECD.
Org-006	Soil samples are extracted with dichloromethane/acetone and waters with dichloromethane and analysed by GC-ECD. Note, the Total +ve PCBs PQL is reflective of the lowest individual PQL and is therefore" Total +ve PCBs" is simply a sum of the positive individual PCBs.
Org-008	Soil samples are extracted with dichloromethane/acetone and waters with dichloromethane and analysed by GC with dual ECD's.
Org-012	Soil samples are extracted with Dichloromethane/Acetone and waters with Dichloromethane and analysed by GC-MS.
Org-014	Soil samples are extracted with methanol and spiked into water prior to analysing by purge and trap GC-MS.
Org-016	Soil samples are extracted with methanol and spiked into water prior to analysing by purge and trap GC-MS. Water samples are analysed directly by purge and trap GC-MS. F1 = (C6-C10)-BTEX as per NEPM B1 Guideline on Investigation Levels for Soil and Groundwater.

Method ID	Methodology Summary
Org-016	Soil samples are extracted with methanol and spiked into water prior to analysing by purge and trap GC-MS. Water samples are analysed directly by purge and trap GC-MS. F1 = (C6-C10)-BTEX as per NEPM B1 Guideline on Investigation Levels for Soil and Groundwater. Note, the Total +ve Xylene PQL is reflective of the lowest individual PQL and is therefore "Total +ve Xylenes" is simply a sum of the positive individual Xylenes.

QUALITY CONTROL: VOCs in soil						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-2	208720-2
Date extracted	-			27/12/2018	1	27/12/2018	27/12/2018		27/12/2018	27/12/2018
Date analysed	-			02/01/2019	1	02/01/2019	02/01/2019		02/01/2019	02/01/2019
Dichlorodifluoromethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Chloromethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Vinyl Chloride	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Bromomethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Chloroethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Trichlorofluoromethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,1-Dichloroethene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
trans-1,2-dichloroethene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,1-dichloroethane	mg/kg	1	Org-014	<1	1	<1	<1	0	92	88
cis-1,2-dichloroethene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
bromochloromethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
chloroform	mg/kg	1	Org-014	<1	1	<1	<1	0	84	80
2,2-dichloropropane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,2-dichloroethane	mg/kg	1	Org-014	<1	1	<1	<1	0	86	82
1,1,1-trichloroethane	mg/kg	1	Org-014	<1	1	<1	<1	0	86	82
1,1-dichloropropene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Cyclohexane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
carbon tetrachloride	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Benzene	mg/kg	0.2	Org-014	<0.2	1	<0.2	<0.2	0	[NT]	[NT]
dibromomethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,2-dichloropropane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
trichloroethene	mg/kg	1	Org-014	<1	1	<1	<1	0	85	81
bromodichloromethane	mg/kg	1	Org-014	<1	1	<1	<1	0	91	87
trans-1,3-dichloropropene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
cis-1,3-dichloropropene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,1,2-trichloroethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Toluene	mg/kg	0.5	Org-014	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
1,3-dichloropropane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
dibromochloromethane	mg/kg	1	Org-014	<1	1	<1	<1	0	87	81
1,2-dibromoethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
tetrachloroethene	mg/kg	1	Org-014	<1	1	<1	<1	0	94	92
1,1,1,2-tetrachloroethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
chlorobenzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Ethylbenzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
bromoform	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
m+p-xylene	mg/kg	2	Org-014	<2	1	<2	<2	0	[NT]	[NT]
styrene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,1,2,2-tetrachloroethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
o-Xylene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]

QUALITY CONTROL: VOCs in soil						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-2	208720-2
1,2,3-trichloropropane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
isopropylbenzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
bromobenzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
n-propyl benzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
2-chlorotoluene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
4-chlorotoluene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,3,5-trimethyl benzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
tert-butyl benzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,2,4-trimethyl benzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,3-dichlorobenzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
sec-butyl benzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,4-dichlorobenzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
4-isopropyl toluene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,2-dichlorobenzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
n-butyl benzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,2-dibromo-3-chloropropane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,2,4-trichlorobenzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
hexachlorobutadiene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,2,3-trichlorobenzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Surrogate Dibromofluorometha	%		Org-014	107	1	108	108	0	108	105
Surrogate aaa-Trifluorotoluene	%		Org-014	87	1	72	76	5	85	80
Surrogate Toluene-d_8	%		Org-014	99	1	100	99	1	101	101
Surrogate 4-Bromofluorobenzene	%		Org-014	101	1	101	99	2	100	101

QUALITY CONTROL: vTRH(C6-C10)/BTEXN in Soil						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-2	208720-2
Date extracted	-			27/12/2018	1	27/12/2018	27/12/2018		27/12/2018	27/12/2018
Date analysed	-			02/01/2019	1	02/01/2019	02/01/2019		02/01/2019	02/01/2019
TRH C_6 - C_9	mg/kg	25	Org-016	<25	1	<25	<25	0	89	85
TRH C_6 - C_{10}	mg/kg	25	Org-016	<25	1	<25	<25	0	89	85
Benzene	mg/kg	0.2	Org-016	<0.2	1	<0.2	<0.2	0	92	88
Toluene	mg/kg	0.5	Org-016	<0.5	1	<0.5	<0.5	0	89	85
Ethylbenzene	mg/kg	1	Org-016	<1	1	<1	<1	0	90	86
m+p-xylene	mg/kg	2	Org-016	<2	1	<2	<2	0	87	83
o-Xylene	mg/kg	1	Org-016	<1	1	<1	<1	0	88	84
naphthalene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Surrogate aaa-Trifluorotoluene	%		Org-016	87	1	72	76	5	85	80

QUALITY CONTROL: svTRH (C10-C40) in Soil						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-2	208720-2
Date extracted	-			27/12/2018	1	27/12/2018	27/12/2018		27/12/2018	27/12/2018
Date analysed	-			27/12/2018	1	27/12/2018	27/12/2018		28/12/2018	28/12/2018
TRH C_{10} - C_{14}	mg/kg	50	Org-003	<50	1	<50	<50	0	101	105
TRH C_{15} - C_{28}	mg/kg	100	Org-003	<100	1	<100	<100	0	95	119
TRH C_{29} - C_{36}	mg/kg	100	Org-003	<100	1	<100	<100	0	93	115
TRH >C_{10} -C_{16}	mg/kg	50	Org-003	<50	1	<50	<50	0	101	105
TRH >C_{16} -C_{34}	mg/kg	100	Org-003	<100	1	<100	<100	0	95	119
TRH >C_{34} -C_{40}	mg/kg	100	Org-003	<100	1	<100	<100	0	93	115
Surrogate o-Terphenyl	%		Org-003	107	1	79	80	1	101	106

QUALITY CONTROL: SVOCs in Soil						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-2	208720-2
Date extracted	-			27/12/2018	1	27/12/2018	27/12/2018		27/12/2018	27/12/2018
Date analysed	-			28/12/2018	1	28/12/2018	28/12/2018		28/12/2018	28/12/2018
Phenol	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	75	84
Bis-(2-chloroethyl) ether	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
2-Chlorophenol	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	75	80
1,3-Dichlorobenzene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
1,4-Dichlorobenzene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	80	81
2-Methylphenol	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
1,2-Dichlorobenzene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Bis (2-chloroisopropyl) ether	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
3/4-Methylphenol	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
N-nitrosodi-n-propylamine	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Hexachloroethane	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Nitrobenzene	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Isophorone	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
2,4-Dimethylphenol	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
2-Nitrophenol	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Bis(2-chloroethoxy)methane	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
2,4-Dichlorophenol	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
1,2,4-Trichlorobenzene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Naphthalene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
4-Chloroaniline	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Hexachlorobutadiene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
4-Chloro-3-methylphenol	mg/kg	5	Org-012	<5	1	<5	<5	0	[NT]	[NT]
2-Methylnaphthalene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Hexachlorocyclopentadiene	mg/kg	2	Org-012	<2	1	<2	<2	0	[NT]	[NT]
2,4,6-trichlorophenol	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
2,4,5-trichlorophenol	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
2-Chloronaphthalene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
2-nitroaniline	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Dimethylphthalate	mg/kg	1	Org-012	<1	1	<1	<1	0	84	73
2,6-Dinitrotoluene	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Acenaphthylene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
3-Nitroaniline	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Acenaphthene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	89	93
2,4-dinitrophenol	mg/kg	10	Org-012	<10	1	<10	<10	0	[NT]	[NT]
4-nitrophenol	mg/kg	10	Org-012	<10	1	<10	<10	0	82	92
Dibenzofuran	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
diethylphthalate	mg/kg	1	Org-012	<1	1	<1	<1	0	84	88
4-chlorophenylphenylether	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
4-nitroaniline	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]

QUALITY CONTROL: SVOCs in Soil						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-2	208720-2
Fluorene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
2-methyl-4,6-dinitrophenol	mg/kg	10	Org-012	<10	1	<10	<10	0	[NT]	[NT]
azobenzene	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
4-bromophenylphenylether	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
hexachlorobenzene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
pentachlorophenol	mg/kg	5	Org-012	<5	1	<5	<5	0	[NT]	[NT]
Phenanthrene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Anthracene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
carbazole	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
di-n-butylphthalate	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Fluoranthene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Pyrene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	89	117
butylbenzylphthalate	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
bis(2-ethylhexyl)phthalate	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Benzo(a)anthracene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Chrysene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
di-n-octylphthalate	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Benzo(b+j+k)fluoranthene	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Benzo(a)pyrene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Indeno(1,2,3-c,d)pyrene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Dibenzo(a,h)anthracene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Benzo(g,h,i)perylene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
ethylmethanesulfonate	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
aniline	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
pentachloroethane	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
benzyl alcohol	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
acetophenone	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
N-nitrosomorpholine	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
N-nitrosopiperidine	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
2,6-dichlorophenol	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
hexachloropropene-1	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
N-nitroso-n-butylamine	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
safrole	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
1,2,4,5-tetrachlorobenzene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
cis and trans iso-safrole	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
1,3-dinitrobenzene	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
pentachlorobenzene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
1-naphthylamine	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
2,3,4,6-tetrachlorophenol	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
2-naphthylamine	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
5-nitro-o-toluidine	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]

QUALITY CONTROL: SVOCs in Soil						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-2	208720-2
diphenylamine	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
phenacetin	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
pentachloronitrobenzene	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
dinoseb	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
methapyrilene	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
p-dimethylaminoazobenzene	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
2-acetylaminofluorene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
7,12-dimethylbenz(a)anthracene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
3-methylcholanthrene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
a-BHC	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
b-BHC	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
g-BHC	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
d-BHC	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Heptachlor	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Aldrin	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	114	115
Heptachlor Epoxide	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
g-Chlordane	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
a-Chlordane	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Endosulfan I	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
p,p'-DDE	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Dieldrin	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	109	115
Endrin	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
p,p'-DDD	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Endosulfan II	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Endrin Aldehyde	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
p,p'-DDT	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Endrin Ketone	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Endosulfan Sulphate	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Methoxychlor	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Surrogate 2-fluorophenol	%		Org-012	78	1	83	81	2	73	91
Surrogate Phenol-d_6	%		Org-012	76	1	61	78	24	71	69
Surrogate Nitrobenzene-d_5	%		Org-012	75	1	73	73	0	72	78
Surrogate 2-fluorobiphenyl	%		Org-012	89	1	86	82	5	86	85
Surrogate 2,4,6-Tribromophenol	%		Org-012	71	1	68	76	11	78	87
Surrogate p-Terphenyl-d_{14}	%		Org-012	99	1	101	95	6	97	97

QUALITY CONTROL: Organochlorine Pesticides in soil						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-2	208720-2
Date extracted	-			27/12/2018	1	27/12/2018	27/12/2018		27/12/2018	27/12/2018
Date analysed	-			27/12/2018	1	27/12/2018	27/12/2018		27/12/2018	27/12/2018
HCB	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
alpha-BHC	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	124	111
gamma-BHC	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
beta-BHC	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	94	85
Heptachlor	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	92	86
delta-BHC	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Aldrin	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	86	78
Heptachlor Epoxide	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	91	82
gamma-Chlordane	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
alpha-chlordane	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Endosulfan I	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
pp-DDE	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	96	87
Dieldrin	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	104	94
Endrin	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	93	87
pp-DDD	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	94	85
Endosulfan II	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
pp-DDT	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Endrin Aldehyde	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Endosulfan Sulphate	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	92	84
Methoxychlor	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Surrogate TCMX	%		Org-005	110	1	100	98	2	115	115

QUALITY CONTROL: Organophosphorus Pesticides						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-2	208720-2
Date extracted	-			27/12/2018	1	27/12/2018	27/12/2018		27/12/2018	27/12/2018
Date analysed	-			27/12/2018	1	27/12/2018	27/12/2018		27/12/2018	27/12/2018
Azinphos-methyl (Guthion)	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Bromophos-ethyl	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Chlorpyriphos	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	105	102
Chlorpyriphos-methyl	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Diazinon	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Dichlorvos	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	96	97
Dimethoate	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Ethion	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	110	104
Fenitrothion	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	105	102
Malathion	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	99	95
Parathion	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	104	100
Ronnel	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	117	112
Surrogate TCMX	%		Org-008	110	1	100	98	2	112	104

QUALITY CONTROL: PCBs in Soil						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-2	208720-2
Date extracted	-			27/12/2018	1	27/12/2018	27/12/2018		27/12/2018	27/12/2018
Date analysed	-			27/12/2018	1	27/12/2018	27/12/2018		27/12/2018	27/12/2018
Aroclor 1016	mg/kg	0.1	Org-006	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Aroclor 1221	mg/kg	0.1	Org-006	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Aroclor 1232	mg/kg	0.1	Org-006	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Aroclor 1242	mg/kg	0.1	Org-006	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Aroclor 1248	mg/kg	0.1	Org-006	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Aroclor 1254	mg/kg	0.1	Org-006	<0.1	1	<0.1	<0.1	0	118	118
Aroclor 1260	mg/kg	0.1	Org-006	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Surrogate TCLMX	%		Org-006	110	1	100	98	2	112	104

QUALITY CONTROL: Acid Extractable metals in soil						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-2	208720-2
Date prepared	-			27/12/2018	1	27/12/2018	27/12/2018		27/12/2018	27/12/2018
Date analysed	-			27/12/2018	1	27/12/2018	27/12/2018		27/12/2018	27/12/2018
Arsenic	mg/kg	4	Metals-020	<4	1	<4	<4	0	109	104
Cadmium	mg/kg	0.4	Metals-020	<0.4	1	<0.4	<0.4	0	101	91
Chromium	mg/kg	1	Metals-020	<1	1	2	3	40	107	104
Copper	mg/kg	1	Metals-020	<1	1	<1	<1	0	106	91
Lead	mg/kg	1	Metals-020	<1	1	<1	<1	0	103	#
Mercury	mg/kg	0.1	Metals-021	<0.1	1	<0.1	<0.1	0	95	121
Nickel	mg/kg	1	Metals-020	<1	1	<1	<1	0	100	102
Zinc	mg/kg	1	Metals-020	<1	1	8	9	12	103	115

Result Definitions

NT	Not tested
NA	Test not required
INS	Insufficient sample for this test
PQL	Practical Quantitation Limit
<	Less than
>	Greater than
RPD	Relative Percent Difference
LCS	Laboratory Control Sample
NS	Not specified
NEPM	National Environmental Protection Measure
NR	Not Reported

Quality Control Definitions

Blank	This is the component of the analytical signal which is not derived from the sample but from reagents, glassware etc, can be determined by processing solvents and reagents in exactly the same manner as for samples.
Duplicate	This is the complete duplicate analysis of a sample from the process batch. If possible, the sample selected should be one where the analyte concentration is easily measurable.
Matrix Spike	A portion of the sample is spiked with a known concentration of target analyte. The purpose of the matrix spike is to monitor the performance of the analytical method used and to determine whether matrix interferences exist.
LCS (Laboratory Control Sample)	This comprises either a standard reference material or a control matrix (such as a blank sand or water) fortified with analytes representative of the analyte class. It is simply a check sample.
Surrogate Spike	Surrogates are known additions to each sample, blank, matrix spike and LCS in a batch, of compounds which are similar to the analyte of interest, however are not expected to be found in real samples.

Australian Drinking Water Guidelines recommend that Thermotolerant Coliform, Faecal Enterococci, & E.Coli levels are less than 1cfu/100mL. The recommended maximums are taken from "Australian Drinking Water Guidelines", published by NHMRC & ARMC 2011.

Laboratory Acceptance Criteria

Duplicate sample and matrix spike recoveries may not be reported on smaller jobs, however, were analysed at a frequency to meet or exceed NEPM requirements. All samples are tested in batches of 20. The duplicate sample RPD and matrix spike recoveries for the batch were within the laboratory acceptance criteria.

Filters, swabs, wipes, tubes and badges will not have duplicate data as the whole sample is generally extracted during sample extraction.

Spikes for Physical and Aggregate Tests are not applicable.

For VOCs in water samples, three vials are required for duplicate or spike analysis.

Duplicates: >10xPQL - RPD acceptance criteria will vary depending on the analytes and the analytical techniques but is typically in the range 20%-50% – see ELN-P05 QA/QC tables for details; <10xPQL - RPD are higher as the results approach PQL and the estimated measurement uncertainty will statistically increase.

Matrix Spikes, LCS and Surrogate recoveries: Generally 70-130% for inorganics/metals; 60-140% for organics (+/-50% surrogates) and 10-140% for labile SVOCs (including labile surrogates), ultra trace organics and speciated phenols is acceptable.

In circumstances where no duplicate and/or sample spike has been reported at 1 in 10 and/or 1 in 20 samples respectively, the sample volume submitted was insufficient in order to satisfy laboratory QA/QC protocols.

When samples are received where certain analytes are outside of recommended technical holding times (THTs), the analysis has proceeded. Where analytes are on the verge of breaching THTs, every effort will be made to analyse within the THT or as soon as practicable.

Where sampling dates are not provided, Envirolab are not in a position to comment on the validity of the analysis where recommended technical holding times may have been breached.

Measurement Uncertainty estimates are available for most tests upon request.

Report Comments

Acid Extractable Metals in Soil:
Percent recovery is not possible to report due to the inhomogeneous nature of the element/s in the sample/s. However an acceptable recovery was obtained for the LCS.

Asbestos: A portion of the supplied sample was sub-sampled for asbestos analysis according to Envirolab procedures. We cannot guarantee that this sub-sample is indicative of the entire sample. Envirolab recommends supplying 40-50g of sample in its own container.
Note: Sample 208720-2 was sub-sampled from a jar provided by the client.

CHAIN OF CUSTODY

ALS Environmental — ALS Laboratory: please tick →

ADELAIDE 21 Burma Road Pooraka SA 5095 Ph: 08 8359 0890 E: adelaide@alsglobal.com
BRISBANE 32 Shand Street Stafford QLD 4053 Ph: 07 3243 7222 E: samples.brisbane@alsglobal.com
GLADSTONE 46 Callemondah Drive Clinton QLD 4680 Ph: 07 7471 5600 E: gladstone@alsglobal.com
MACKAY 78 Harbour Road Mackay QLD 4740 Ph: 07 4944 0177 E: mackay@alsglobal.com
MELBOURNE 2-4 Westall Road Springvale VIC 3171 Ph: 03 8549 9600 E: samples.melbourne@alsglobal.com
MUDGEE 27 Sydney Road Mudgee NSW 2850 Ph: 02 6372 6735 E: mudgee.mail@alsglobal.com
NEWCASTLE 5/585 Maitland Rd Mayfield West NSW 2304 Ph: 02 4014 2500 E: samples.newcastle@alsglobal.com
NOWRA 4/13 Geary Place North Nowra NSW 2541 Ph: 024423 2063 E: nowra@alsglobal.com
PERTH 10 Hod Way Malaga WA 6090 Ph: 08 9209 7655 E: samples.perth@alsglobal.com
SYDNEY 277-289 Woodpark Road Smithfield NSW 2164 Ph: 02 8784 8555 E: samples.sydney@alsglobal.com
TOWNSVILLE 14-15 Desma Court Bohle QLD 4818 Ph: 07 4796 0600 E: townsville.environmental@alsglobal.com
WOLLONGONG 99 Kenny Street Wollongong NSW 2500 Ph: 02 4225 3125 E: portkembla@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	TURNAROUND REQUIREMENTS : (Standard TAT may be longer for some tests e.g. Ultra Trace Organics)	☑ Standard TAT (List due date): ☐ Non Standard or urgent TAT (List due date):
OFFICE:		
PROJECT: King St North ESA	ALS QUOTE NO.:	
ORDER NUMBER: 10026439		COC SEQUENCE NUMBER (Circle) COC: 1 2 3 4 5 6 7 OF: 1 2 3 4 5 6 7
PROJECT MANAGER: Dean Stafford	CONTACT PH: 0434 657 155	
SAMPLER: Caitlain Regena	SAMPLER MOBILE: 0438 263 112	
COC emailed to ALS? (NO)	EDD FORMAT (or default):	
Email Reports to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com		
Email Invoice to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com		

FOR LABORATORY USE ONLY (Circle)
Custody Seal Intact? Yes No N/A
Free ice / frozen ice bricks present upon receipt? Yes No N/A
Random Sample Temperature on Receipt: 8.2 °C
Other comment:

RELINQUISHED BY:	RECEIVED BY:	RELINQUISHED BY:	RECEIVED BY:
Caitlain Regena	JUSTIN		Ray
DATE/TIME: 19/12/18	DATE/TIME: 19/12 5.45pm	DATE/TIME:	DATE/TIME: 21/12/18. 1445

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)			CONTAINER INFORMATION	ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).								Additional Information
LAB ID	SAMPLE ID	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	TOTAL CONTAINERS	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Analytes)			Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
1	DUP4	19-12-18	S		1	x	x	x					
– (1)	TRIP4	19-12-18			1	x	x	x					
2	MW05@1.00	19-12-18			1	x	x	x	x				
3	MW05@2.00	19-12-18			1								
4	MW05@3.00	19-12-18			2	x	x	x					
5	MW05@5.00	19-12-18			1								
6	MW07@0.20	19-12-18			1								
7	MW07@1.00	19-12-18			2	x	x	x	x	x			
8	MW07@3.00	19-12-18	S		1								
9	MW07@4.50	19-12-18	S		1								
10	MW07@6.00	19-12-18	S		1								
		19-12-18	S		1								
				TOTAL	14								

Environmental Division Sydney
Work Order Reference
ES1838498
Telephone : + 61-2-8784 8555

ENVIROLAB — Envirolab Services, 12 Ashley St, Chatswood NSW 2067, Ph: (02) 9910 6200
Please send to Envirolab.
Job No: 208720
Date Received: 21/12/18
Time Received: 1445
Received by: PL
Temp: Cool/Ambient
Cooling: Ice/Icepack
Security: Intact/Broken/None

Subcon / Forward Lab / Split WO
Lab / Analysis: Envirolab - TRIP4
Organised By / Date: Asbestos →
Relinquished By / Date: Newcastle
Connote / Courier:
WO No:
Attach PO / Internal Sheets

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic; V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sodium Bisulphate Preserved Plastic; F = Formaldehyde Preserved Glass; Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

CHAIN OF CUSTODY

ALS Environmental

ALS Laboratory: please tick →

☐ADELAIDE 21 Burma Road Pooraka SA 5095 Ph: 08 8359 0890 E: adelaide@alsglobal.com
☐BRISBANE 32 Shand Street Stafford QLD 4053 Ph: 07 3243 7222 E: samples.brisbane@alsglobal.com
☐GLADSTONE 46 Callemondah Drive Clinton QLD 4680 Ph: 07 7471 5600 E: gladstone@alsglobal.com
☐MACKAY 78 Harbour Road Mackay QLD 4740 Ph: 07 4944 0177 E: mackay@alsglobal.com
☐MELBOURNE 2-4 Westall Road Springvale VIC 3171 Ph: 03 8549 0600 E: samples.melbourne@alsglobal.com
☐MUDGEE 27 Sydney Road Mudgee NSW 2850 Ph: 02 6372 6735 E: mudgee.mail@alsglobal.com
☐NEWCASTLE 5/585 Maitland Rd Mayfield West NSW 2304 Ph: 02 4014 2500 E: samples.newcastle@alsglobal.com
☐NOWRA 4/13 Geary Place North Nowra NSW 2541 Ph: 024423 2063 E: nowra@alsglobal.com
☐PERTH 10 Hod Way Malaga WA 6090 Ph: 08 9209 7655 E: samples.perth@alsglobal.com
☐SYDNEY 277-289 Woodpark Road Smithfield NSW 2164 Ph: 02 8784 8555 E: samples.sydney@alsglobal.com
☐TOWNSVILLE 14-15 Desma Court Bohle QLD 4818 Ph: 07 4796 0600 E: townsville.environmental@alsglobal.com
☐WOLLONGONG 99 Kenny Street Wollongong NSW 2500 Ph: 02 4225 3125 E: portkembla@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	TURNAROUND REQUIREMENTS: ☒ Standard TAT (List due date):	FOR LABORATORY USE ONLY (Circle)
OFFICE:	(Standard TAT may be longer for some tests e.g. Ultra Trace Organics) ☐ Non Standard or urgent TAT (List due date):	Custody Seal Intact? Yes No N/A
PROJECT: King St North ESA	ALS QUOTE NO.:	Free ice / frozen ice bricks present upon receipt? Yes No N/A
ORDER NUMBER: 10026439	COC SEQUENCE NUMBER (Circle) COC: 1 2 3 4 5 6 7	Random Sample Temperature on Receipt: 8.2 °C
PROJECT MANAGER: Dean Stafford CONTACT PH: 0434 657 155	OF: 1 2 3 4 5 6 7	Other comments:

SAMPLER: Caitlain Regena	SAMPLER MOBILE: 0438 263 112	RELINQUISHED BY: Caitlain Regena	RECEIVED BY: JUSTIN	RELINQUISHED BY:
COC emailed to ALS? (NO)	EDD FORMAT (or default):	DATE/TIME: 17/12/18	DATE/TIME: 19/12 5.45pm	DATE/TIME:
Email Reports to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com				
Email Invoice to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com				

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)			CONTAINER INFORMATION		ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).								Additional Information
LAB ID	SAMPLE ID	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	TOTAL CONTAINERS	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Analytes)				Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
11	MW03@0.50	19-12-18	S		1									
12	MW03@1.00	19-12-18	S		1	x	x	x	x					
13	MW03@2.00	19-12-18	S		1									
14	MW03@4.00	19-12-18	S		1									
15	MW03@5.00	19-12-18	S		1									
16	MW04@0.50	19-12-18	S		2	x	x	x	x	x				
17	MW04@1.50	19-12-18	S		1									
18	MW04@3.00	19-12-18	S		1	x	x	x						
19	MW04@5.00	19-12-18	S		1									
20	MW05@0.50	18-12-18	S		1									
21	DUP3	19-12-18	S		1	x	x	x	x					
-	(2) TRIP3	19-12-18	S		1	x	x	x	x					Please send to Envirolab.
	MW03@			TOTAL	13									

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass; Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

208720 R2 21/12/18 14:45

Envirolab Services Pty Ltd
ABN 37 112 535 645
12 Ashley St Chatswood NSW 2067
ph 02 9910 6200 fax 02 9910 6201
customerservice@envirolab.com.au
www.envirolab.com.au

CERTIFICATE OF ANALYSIS 211503

Client Details

Client	Arcadis Australia Pacific Pty Ltd
Attention	Caitlain Regena
Address	Level 16, 580 George St, Sydney, NSW, 2000

Sample Details

Your Reference	**10026439 - Task6**
Number of Samples	3 SOIL
Date samples received	15/02/2019
Date completed instructions received	15/02/2019

Analysis Details

Please refer to the following pages for results, methodology summary and quality control data.

Samples were analysed as received from the client. Results relate specifically to the samples as received.

Results are reported on a dry weight basis for solids and on an as received basis for other matrices.

Please refer to the last page of this report for any comments relating to the results.

Report Details

Date results requested by	19/02/2019
Date of Issue	19/02/2019

NATA Accreditation Number 2901. This document shall not be reproduced except in full.

Accredited for compliance with ISO/IEC 17025 - Testing. **Tests not covered by NATA are denoted with ***

Results Approved By
Giovanni Agosti, Group Technical Manager
Jaimie Loa-Kum-Cheung, Senior Chemist
Jeremy Faircloth, Organics Supervisor

Authorised By



Jacinta Hurst, Laboratory Manager

VOCs in soil			
Our Reference	UNITS	211503-1	211503-3
Your Reference		TRIP2@2.2	TRIP@2.7
Date Sampled		11/02/2019	11/02/2019
Type of sample		SOIL	SOIL
Date extracted	-	18/02/2019	18/02/2019
Date analysed	-	19/02/2019	19/02/2019
Dichlorodifluoromethane	mg/kg	<1	<1
Chloromethane	mg/kg	<1	<1
Vinyl Chloride	mg/kg	<1	<1
Bromomethane	mg/kg	<1	<1
Chloroethane	mg/kg	<1	<1
Trichlorofluoromethane	mg/kg	<1	<1
1,1-Dichloroethene	mg/kg	<1	<1
trans-1,2-dichloroethene	mg/kg	<1	<1
1,1-dichloroethane	mg/kg	<1	<1
cis-1,2-dichloroethene	mg/kg	<1	<1
bromochloromethane	mg/kg	<1	<1
chloroform	mg/kg	<1	<1
2,2-dichloropropane	mg/kg	<1	<1
1,2-dichloroethane	mg/kg	<1	<1
1,1,1-trichloroethane	mg/kg	<1	<1
1,1-dichloropropene	mg/kg	<1	<1
Cyclohexane	mg/kg	<1	<1
carbon tetrachloride	mg/kg	<1	<1
Benzene	mg/kg	<0.2	<0.2
dibromomethane	mg/kg	<1	<1
1,2-dichloropropane	mg/kg	<1	<1
trichloroethene	mg/kg	<1	<1
bromodichloromethane	mg/kg	<1	<1
trans-1,3-dichloropropene	mg/kg	<1	<1
cis-1,3-dichloropropene	mg/kg	<1	<1
1,1,2-trichloroethane	mg/kg	<1	<1
Toluene	mg/kg	<0.5	<0.5
1,3-dichloropropane	mg/kg	<1	<1
dibromochloromethane	mg/kg	<1	<1
1,2-dibromoethane	mg/kg	<1	<1
tetrachloroethene	mg/kg	<1	<1
1,1,1,2-tetrachloroethane	mg/kg	<1	<1
chlorobenzene	mg/kg	<1	<1
Ethylbenzene	mg/kg	<1	<1
bromoform	mg/kg	<1	<1

VOCs in soil			
Our Reference		211503-1	211503-3
Your Reference	UNITS	TRIP2@2.2	TRIP@2.7
Date Sampled		11/02/2019	11/02/2019
Type of sample		SOIL	SOIL
m+p-xylene	mg/kg	<2	<2
styrene	mg/kg	<1	<1
1,1,2,2-tetrachloroethane	mg/kg	<1	<1
o-Xylene	mg/kg	<1	<1
1,2,3-trichloropropane	mg/kg	<1	<1
isopropylbenzene	mg/kg	<1	<1
bromobenzene	mg/kg	<1	<1
n-propyl benzene	mg/kg	<1	<1
2-chlorotoluene	mg/kg	<1	<1
4-chlorotoluene	mg/kg	<1	<1
1,3,5-trimethyl benzene	mg/kg	<1	<1
tert-butyl benzene	mg/kg	<1	<1
1,2,4-trimethyl benzene	mg/kg	3	<1
1,3-dichlorobenzene	mg/kg	<1	<1
sec-butyl benzene	mg/kg	<1	<1
1,4-dichlorobenzene	mg/kg	<1	<1
4-isopropyl toluene	mg/kg	<1	<1
1,2-dichlorobenzene	mg/kg	<1	<1
n-butyl benzene	mg/kg	<1	<1
1,2-dibromo-3-chloropropane	mg/kg	<1	<1
1,2,4-trichlorobenzene	mg/kg	<1	<1
hexachlorobutadiene	mg/kg	<1	<1
1,2,3-trichlorobenzene	mg/kg	<1	<1
Surrogate Dibromofluorometha	%	101	101
Surrogate aaa-Trifluorotoluene	%	97	87
Surrogate Toluene-d_8	%	101	101
Surrogate 4-Bromofluorobenzene	%	112	110

SVOCs in Soil			
Our Reference		211503-1	211503-3
Your Reference	UNITS	TRIP2@2.2	TRIP@2.7
Date Sampled		11/02/2019	11/02/2019
Type of sample		SOIL	SOIL
Date extracted	-	18/02/2019	18/02/2019
Date analysed	-	18/02/2019	18/02/2019
Phenol	mg/kg	<0.5	<0.5
Bis-(2-chloroethyl) ether	mg/kg	<1	<1
2-Chlorophenol	mg/kg	<0.5	<0.5
1,3-Dichlorobenzene	mg/kg	<0.5	<0.5
1,4-Dichlorobenzene	mg/kg	<0.5	<0.5
2-Methylphenol	mg/kg	<0.5	<0.5
1,2-Dichlorobenzene	mg/kg	<0.5	<0.5
Bis (2-chloroisopropyl) ether	mg/kg	<1	<1
3/4-Methylphenol	mg/kg	<1	<1
N-nitrosodi-n-propylamine	mg/kg	<1	<1
Hexachloroethane	mg/kg	<0.5	<0.5
Nitrobenzene	mg/kg	<1	<1
Isophorone	mg/kg	<1	<1
2,4-Dimethylphenol	mg/kg	<0.5	<0.5
2-Nitrophenol	mg/kg	<0.5	<0.5
Bis(2-chloroethoxy)methane	mg/kg	<1	<1
2,4-Dichlorophenol	mg/kg	<0.5	<0.5
1,2,4-Trichlorobenzene	mg/kg	<0.5	<0.5
Naphthalene	mg/kg	<0.5	<0.5
4-Chloroaniline	mg/kg	<1	<1
Hexachlorobutadiene	mg/kg	<0.5	<0.5
4-Chloro-3-methylphenol	mg/kg	<5	<5
2-Methylnaphthalene	mg/kg	<0.5	<0.5
Hexachlorocyclopentadiene	mg/kg	<2	<2
2,4,6-trichlorophenol	mg/kg	<0.5	<0.5
2,4,5-trichlorophenol	mg/kg	<0.5	<0.5
2-Chloronaphthalene	mg/kg	<0.5	<0.5
2-nitroaniline	mg/kg	<1	<1
Dimethylphthalate	mg/kg	<1	<1
2,6-Dinitrotoluene	mg/kg	<1	<1
Acenaphthylene	mg/kg	<0.5	<0.5
3-Nitroaniline	mg/kg	<1	<1
Acenaphthene	mg/kg	<0.5	<0.5
2,4-dinitrophenol	mg/kg	<10	<10
4-nitrophenol	mg/kg	<10	<10

SVOCs in Soil			
Our Reference		211503-1	211503-3
Your Reference	UNITS	TRIP2@2.2	TRIP@2.7
Date Sampled		11/02/2019	11/02/2019
Type of sample		SOIL	SOIL
Dibenzofuran	mg/kg	<1	<1
diethylphthalate	mg/kg	<1	<1
4-chlorophenylphenylether	mg/kg	<1	<1
4-nitroaniline	mg/kg	<1	<1
Fluorene	mg/kg	<0.5	<0.5
2-methyl-4,6-dinitrophenol	mg/kg	<10	<10
azobenzene	mg/kg	<1	<1
4-bromophenylphenylether	mg/kg	<1	<1
hexachlorobenzene	mg/kg	<0.5	<0.5
pentachlorophenol	mg/kg	<5	<5
Phenanthrene	mg/kg	<0.5	<0.5
Anthracene	mg/kg	<0.5	<0.5
carbazole	mg/kg	<1	<1
di-n-butylphthalate	mg/kg	<1	<1
Fluoranthene	mg/kg	<0.5	<0.5
Pyrene	mg/kg	<0.5	<0.5
butylbenzylphthalate	mg/kg	<1	<1
bis(2-ethylhexyl)phthalate	mg/kg	<1	<1
Benzo(a)anthracene	mg/kg	<0.5	<0.5
Chrysene	mg/kg	<0.5	<0.5
di-n-octylphthalate	mg/kg	<1	<1
Benzo(b+j+k)fluoranthene	mg/kg	<1	<1
Benzo(a)pyrene	mg/kg	<0.5	<0.5
Indeno(1,2,3-c,d)pyrene	mg/kg	<0.5	<0.5
Dibenzo(a,h)anthracene	mg/kg	<0.5	<0.5
Benzo(g,h,i)perylene	mg/kg	<0.5	<0.5
ethylmethanesulfonate	mg/kg	<1	<1
aniline	mg/kg	<1	<1
pentachloroethane	mg/kg	<0.5	<0.5
benzyl alcohol	mg/kg	<1	<1
acetophenone	mg/kg	<1	<1
N-nitrosomorpholine	mg/kg	<1	<1
N-nitrosopiperidine	mg/kg	<1	<1
2,6-dichlorophenol	mg/kg	<0.5	<0.5
hexachloropropene-1	mg/kg	<0.5	<0.5
N-nitroso-n-butylamine	mg/kg	<1	<1
safrole	mg/kg	<1	<1
1,2,4,5-tetrachlorobenzene	mg/kg	<0.5	<0.5

SVOCs in Soil			
Our Reference		211503-1	211503-3
Your Reference	UNITS	TRIP2@2.2	TRIP@2.7
Date Sampled		11/02/2019	11/02/2019
Type of sample		SOIL	SOIL
cis and trans iso-safrole	mg/kg	<1	<1
1,3-dinitrobenzene	mg/kg	<1	<1
pentachlorobenzene	mg/kg	<0.5	<0.5
1-naphthylamine	mg/kg	<1	<1
2,3,4,6-tetrachlorophenol	mg/kg	<0.5	<0.5
2-naphthylamine	mg/kg	<1	<1
5-nitro-o-toluidine	mg/kg	<1	<1
diphenylamine	mg/kg	<1	<1
phenacetin	mg/kg	<1	<1
pentachloronitrobenzene	mg/kg	<1	<1
dinoseb	mg/kg	<1	<1
methapyrilene	mg/kg	<1	<1
p-dimethylaminoazobenzene	mg/kg	<1	<1
2-acetylaminofluorene	mg/kg	<0.5	<0.5
7,12-dimethylbenz(a)anthracene	mg/kg	<0.5	<0.5
3-methylcholanthrene	mg/kg	<0.5	<0.5
a-BHC	mg/kg	<0.5	<0.5
b-BHC	mg/kg	<0.5	<0.5
g-BHC	mg/kg	<0.5	<0.5
d-BHC	mg/kg	<0.5	<0.5
Heptachlor	mg/kg	<0.5	<0.5
Aldrin	mg/kg	<0.5	<0.5
Heptachlor Epoxide	mg/kg	<0.5	<0.5
g-Chlordane	mg/kg	<0.5	<0.5
a-Chlordane	mg/kg	<0.5	<0.5
Endosulfan I	mg/kg	<0.5	<0.5
p,p'-DDE	mg/kg	<0.5	<0.5
Dieldrin	mg/kg	<0.5	<0.5
Endrin	mg/kg	<0.5	<0.5
p,p'-DDD	mg/kg	<0.5	<0.5
Endosulfan II	mg/kg	<0.5	<0.5
Endrin Aldehyde	mg/kg	<0.5	<0.5
p,p'-DDT	mg/kg	<0.5	<0.5
Endrin Ketone	mg/kg	<0.5	<0.5
Endosulfan Sulphate	mg/kg	<0.5	<0.5
Methoxychlor	mg/kg	<1	<1
Surrogate 2-fluorophenol	%	77	81
Surrogate Phenol-d_6	%	84	77

SVOCs in Soil			
Our Reference		211503-1	211503-3
Your Reference	UNITS	TRIP2@2.2	TRIP@2.7
Date Sampled		11/02/2019	11/02/2019
Type of sample		SOIL	SOIL
Surrogate Nitrobenzene-d_5	%	100	94
Surrogate 2-fluorobiphenyl	%	98	101
Surrogate 2,4,6-Tribromophenol	%	122	118
Surrogate p-Terphenyl-d_{14}	%	101	96

vTRH(C6-C10)/BTEXN in Soil			
Our Reference	UNITS	211503-1	211503-3
Your Reference		TRIP2@2.2	TRIP@2.7
Date Sampled		11/02/2019	11/02/2019
Type of sample		SOIL	SOIL
Date extracted	-	18/02/2019	18/02/2019
Date analysed	-	19/02/2019	19/02/2019
TRH C_6 - C_9	mg/kg	<25	<25
TRH C_6 - C_{10}	mg/kg	<25	<25
vTPH C_6 - C_{10} less BTEX (F1)	mg/kg	<25	<25
Benzene	mg/kg	<0.2	<0.2
Toluene	mg/kg	<0.5	<0.5
Ethylbenzene	mg/kg	<1	<1
m+p-xylene	mg/kg	<2	<2
o-Xylene	mg/kg	<1	<1
naphthalene	mg/kg	<1	<1
Total +ve Xylenes	mg/kg	<1	<1
Surrogate aaa-Trifluorotoluene	%	97	87

svTRH (C10-C40) in Soil			
Our Reference		211503-1	211503-3
Your Reference	UNITS	TRIP2@2.2	TRIP@2.7
Date Sampled		11/02/2019	11/02/2019
Type of sample		SOIL	SOIL
Date extracted	-	18/02/2019	18/02/2019
Date analysed	-	18/02/2019	18/02/2019
TRH C_{10} - C_{14}	mg/kg	240	<50
TRH C_{15} - C_{28}	mg/kg	580	<100
TRH C_{29} - C_{36}	mg/kg	<100	<100
TRH >C_{10} -C_{16}	mg/kg	450	<50
TRH >C_{10} - C_{16} less Naphthalene (F2)	mg/kg	450	<50
TRH >C_{16} -C_{34}	mg/kg	360	<100
TRH >C_{34} -C_{40}	mg/kg	<100	<100
Total +ve TRH (>C10-C40)	mg/kg	810	<50
Surrogate o-Terphenyl	%	#	89

Organochlorine Pesticides in soil			
Our Reference	UNITS	211503-1	211503-3
Your Reference		TRIP2@2.2	TRIP@2.7
Date Sampled		11/02/2019	11/02/2019
Type of sample		SOIL	SOIL
Date extracted	-	18/02/2019	18/02/2019
Date analysed	-	18/02/2019	18/02/2019
HCB	mg/kg	<0.1	<0.1
alpha-BHC	mg/kg	<0.1	<0.1
gamma-BHC	mg/kg	<0.1	<0.1
beta-BHC	mg/kg	<0.1	<0.1
Heptachlor	mg/kg	<0.1	<0.1
delta-BHC	mg/kg	<0.1	<0.1
Aldrin	mg/kg	<0.1	<0.1
Heptachlor Epoxide	mg/kg	<0.1	<0.1
gamma-Chlordane	mg/kg	<0.1	<0.1
alpha-chlordane	mg/kg	<0.1	<0.1
Endosulfan I	mg/kg	<0.1	<0.1
pp-DDE	mg/kg	<0.1	<0.1
Dieldrin	mg/kg	<0.1	<0.1
Endrin	mg/kg	<0.1	<0.1
pp-DDD	mg/kg	<0.1	<0.1
Endosulfan II	mg/kg	<0.1	<0.1
pp-DDT	mg/kg	<0.1	<0.1
Endrin Aldehyde	mg/kg	<0.1	<0.1
Endosulfan Sulphate	mg/kg	<0.1	<0.1
Methoxychlor	mg/kg	<0.1	<0.1
Total +ve DDT+DDD+DDE	mg/kg	<0.1	<0.1
Surrogate TCMX	%	79	90

Organophosphorus Pesticides			
Our Reference		211503-1	211503-3
Your Reference	UNITS	TRIP2@2.2	TRIP@2.7
Date Sampled		11/02/2019	11/02/2019
Type of sample		SOIL	SOIL
Date extracted	-	18/02/2019	18/02/2019
Date analysed	-	18/02/2019	18/02/2019
Azinphos-methyl (Guthion)	mg/kg	<0.1	<0.1
Bromophos-ethyl	mg/kg	<0.1	<0.1
Chlorpyriphos	mg/kg	<0.1	<0.1
Chlorpyriphos-methyl	mg/kg	<0.1	<0.1
Diazinon	mg/kg	<0.1	<0.1
Dichlorvos	mg/kg	<0.1	<0.1
Dimethoate	mg/kg	<0.1	<0.1
Ethion	mg/kg	<0.1	<0.1
Fenitrothion	mg/kg	<0.1	<0.1
Malathion	mg/kg	<0.1	<0.1
Parathion	mg/kg	<0.1	<0.1
Ronnel	mg/kg	<0.1	<0.1
Surrogate TCMX	%	79	90

PCBs in Soil			
Our Reference		211503-1	211503-3
Your Reference	UNITS	TRIP2@2.2	TRIP@2.7
Date Sampled		11/02/2019	11/02/2019
Type of sample		SOIL	SOIL
Date extracted	-	18/02/2019	18/02/2019
Date analysed	-	18/02/2019	18/02/2019
Aroclor 1016	mg/kg	<0.1	<0.1
Aroclor 1221	mg/kg	<0.1	<0.1
Aroclor 1232	mg/kg	<0.1	<0.1
Aroclor 1242	mg/kg	<0.1	<0.1
Aroclor 1248	mg/kg	<0.1	<0.1
Aroclor 1254	mg/kg	<0.1	<0.1
Aroclor 1260	mg/kg	<0.1	<0.1
Total +ve PCBs (1016-1260)	mg/kg	<0.1	<0.1
Surrogate TCLMX	%	79	90

Acid Extractable metals in soil			
Our Reference	UNITS	211503-1	211503-3
Your Reference		TRIP2@2.2	TRIP@2.7
Date Sampled		11/02/2019	11/02/2019
Type of sample		SOIL	SOIL
Date prepared	-	18/02/2019	18/02/2019
Date analysed	-	18/02/2019	18/02/2019
Arsenic	mg/kg	<4	<4
Cadmium	mg/kg	<0.4	<0.4
Chromium	mg/kg	<1	1
Copper	mg/kg	<1	2
Lead	mg/kg	<1	21
Mercury	mg/kg	<0.1	<0.1
Nickel	mg/kg	<1	<1
Zinc	mg/kg	1	95

Moisture			
Our Reference		211503-1	211503-3
Your Reference	UNITS	TRIP2@2.2	TRIP@2.7
Date Sampled		11/02/2019	11/02/2019
Type of sample		SOIL	SOIL
Date prepared	-	18/02/2019	18/02/2019
Date analysed	-	19/02/2019	19/02/2019
Moisture	%	4.8	26

Method ID	Methodology Summary
Inorg-008	Moisture content determined by heating at 105+/-5 °C for a minimum of 12 hours.
Metals-020	Determination of various metals by ICP-AES.
Metals-021	Determination of Mercury by Cold Vapour AAS.
Org-003	Soil samples are extracted with Dichloromethane/Acetone and waters with Dichloromethane and analysed by GC-FID. F2 = (>C10-C16)-Naphthalene as per NEPM B1 Guideline on Investigation Levels for Soil and Groundwater (HSLs Tables 1A (3, 4)). Note Naphthalene is determined from the VOC analysis.
Org-003	Soil samples are extracted with Dichloromethane/Acetone and waters with Dichloromethane and analysed by GC-FID. F2 = (>C10-C16)-Naphthalene as per NEPM B1 Guideline on Investigation Levels for Soil and Groundwater (HSLs Tables 1A (3, 4)). Note Naphthalene is determined from the VOC analysis. Note, the Total +ve TRH PQL is reflective of the lowest individual PQL and is therefore "Total +ve TRH" is simply a sum of the positive individual TRH fractions (>C10-C40).
Org-005	Soil samples are extracted with dichloromethane/acetone and waters with dichloromethane and analysed by GC with dual ECD's.
Org-005	Soil samples are extracted with dichloromethane/acetone and waters with dichloromethane and analysed by GC with dual ECD's. Note, the Total +ve reported DDD+DDE+DDT PQL is reflective of the lowest individual PQL and is therefore simply a sum of the positive individually report DDD+DDE+DDT.
Org-006	Soil samples are extracted with dichloromethane/acetone and waters with dichloromethane and analysed by GC-ECD.
Org-006	Soil samples are extracted with dichloromethane/acetone and waters with dichloromethane and analysed by GC-ECD. Note, the Total +ve PCBs PQL is reflective of the lowest individual PQL and is therefore" Total +ve PCBs" is simply a sum of the positive individual PCBs.
Org-008	Soil samples are extracted with dichloromethane/acetone and waters with dichloromethane and analysed by GC with dual ECD's.
Org-012	Soil samples are extracted with Dichloromethane/Acetone and waters with Dichloromethane and analysed by GC-MS.
Org-014	Soil samples are extracted with methanol and spiked into water prior to analysing by purge and trap GC-MS.
Org-016	Soil samples are extracted with methanol and spiked into water prior to analysing by purge and trap GC-MS. Water samples are analysed directly by purge and trap GC-MS. F1 = (C6-C10)-BTEX as per NEPM B1 Guideline on Investigation Levels for Soil and Groundwater.

Method ID	Methodology Summary
Org-016	Soil samples are extracted with methanol and spiked into water prior to analysing by purge and trap GC-MS. Water samples are analysed directly by purge and trap GC-MS. F1 = (C6-C10)-BTEX as per NEPM B1 Guideline on Investigation Levels for Soil and Groundwater. Note, the Total +ve Xylene PQL is reflective of the lowest individual PQL and is therefore "Total +ve Xylenes" is simply a sum of the positive individual Xylenes.

QUALITY CONTROL: VOCs in soil						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-4	211503-3
Date extracted	-			18/02/2019	1	18/02/2019	18/02/2019		18/02/2019	18/02/2019
Date analysed	-			19/02/2019	1	19/02/2019	19/02/2019		19/02/2019	19/02/2019
Dichlorodifluoromethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Chloromethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Vinyl Chloride	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Bromomethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Chloroethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Trichlorofluoromethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,1-Dichloroethene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
trans-1,2-dichloroethene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,1-dichloroethane	mg/kg	1	Org-014	<1	1	<1	<1	0	74	70
cis-1,2-dichloroethene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
bromochloromethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
chloroform	mg/kg	1	Org-014	<1	1	<1	<1	0	82	72
2,2-dichloropropane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,2-dichloroethane	mg/kg	1	Org-014	<1	1	<1	<1	0	80	71
1,1,1-trichloroethane	mg/kg	1	Org-014	<1	1	<1	<1	0	75	70
1,1-dichloropropene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Cyclohexane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
carbon tetrachloride	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Benzene	mg/kg	0.2	Org-014	<0.2	1	<0.2	<0.2	0	[NT]	[NT]
dibromomethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,2-dichloropropane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
trichloroethene	mg/kg	1	Org-014	<1	1	<1	<1	0	83	71
bromodichloromethane	mg/kg	1	Org-014	<1	1	<1	<1	0	100	86
trans-1,3-dichloropropene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
cis-1,3-dichloropropene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,1,2-trichloroethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Toluene	mg/kg	0.5	Org-014	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
1,3-dichloropropane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
dibromochloromethane	mg/kg	1	Org-014	<1	1	<1	<1	0	102	88
1,2-dibromoethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
tetrachloroethene	mg/kg	1	Org-014	<1	1	<1	<1	0	85	74
1,1,1,2-tetrachloroethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
chlorobenzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Ethylbenzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
bromoform	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
m+p-xylene	mg/kg	2	Org-014	<2	1	<2	<2	0	[NT]	[NT]
styrene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,1,2,2-tetrachloroethane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
o-Xylene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]

QUALITY CONTROL: VOCs in soil						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-4	211503-3
1,2,3-trichloropropane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
isopropylbenzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
bromobenzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
n-propyl benzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
2-chlorotoluene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
4-chlorotoluene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,3,5-trimethyl benzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
tert-butyl benzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,2,4-trimethyl benzene	mg/kg	1	Org-014	<1	1	3	<1	100	[NT]	[NT]
1,3-dichlorobenzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
sec-butyl benzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,4-dichlorobenzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
4-isopropyl toluene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,2-dichlorobenzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
n-butyl benzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,2-dibromo-3-chloropropane	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,2,4-trichlorobenzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
hexachlorobutadiene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
1,2,3-trichlorobenzene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Surrogate Dibromofluorometha	%		Org-014	99	1	101	100	1	102	101
Surrogate aaa-Trifluorotoluene	%		Org-014	97	1	97	93	4	98	83
Surrogate Toluene-d_8	%		Org-014	101	1	101	102	1	104	103
Surrogate 4-Bromofluorobenzene	%		Org-014	108	1	112	108	4	101	102

QUALITY CONTROL: SVOCs in Soil						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-4	211503-3
Date extracted	-			18/02/2019	1	18/02/2019	18/02/2019		18/02/2019	18/02/2019
Date analysed	-			18/02/2019	1	18/02/2019	18/02/2019		18/02/2019	18/02/2019
Phenol	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	85	78
Bis-(2-chloroethyl) ether	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
2-Chlorophenol	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	84	79
1,3-Dichlorobenzene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
1,4-Dichlorobenzene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	91	82
2-Methylphenol	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
1,2-Dichlorobenzene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Bis (2-chloroisopropyl) ether	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
3/4-Methylphenol	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
N-nitrosodi-n-propylamine	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Hexachloroethane	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Nitrobenzene	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Isophorone	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
2,4-Dimethylphenol	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
2-Nitrophenol	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Bis(2-chloroethoxy)methane	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
2,4-Dichlorophenol	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
1,2,4-Trichlorobenzene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Naphthalene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
4-Chloroaniline	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Hexachlorobutadiene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
4-Chloro-3-methylphenol	mg/kg	5	Org-012	<5	1	<5	<5	0	[NT]	[NT]
2-Methylnaphthalene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Hexachlorocyclopentadiene	mg/kg	2	Org-012	<2	1	<2	<2	0	[NT]	[NT]
2,4,6-trichlorophenol	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
2,4,5-trichlorophenol	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
2-Chloronaphthalene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
2-nitroaniline	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Dimethylphthalate	mg/kg	1	Org-012	<1	1	<1	<1	0	103	87
2,6-Dinitrotoluene	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Acenaphthylene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
3-Nitroaniline	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Acenaphthene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	104	96
2,4-dinitrophenol	mg/kg	10	Org-012	<10	1	<10	<10	0	[NT]	[NT]
4-nitrophenol	mg/kg	10	Org-012	<10	1	<10	<10	0	73	39
Dibenzofuran	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
diethylphthalate	mg/kg	1	Org-012	<1	1	<1	<1	0	102	90
4-chlorophenylphenylether	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
4-nitroaniline	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]

QUALITY CONTROL: SVOCs in Soil						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-4	211503-3
Fluorene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
2-methyl-4,6-dinitrophenol	mg/kg	10	Org-012	<10	1	<10	<10	0	[NT]	[NT]
azobenzene	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
4-bromophenylphenylether	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
hexachlorobenzene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
pentachlorophenol	mg/kg	5	Org-012	<5	1	<5	<5	0	[NT]	[NT]
Phenanthrene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Anthracene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
carbazole	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
di-n-butylphthalate	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Fluoranthene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Pyrene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	102	95
butylbenzylphthalate	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
bis(2-ethylhexyl)phthalate	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Benzo(a)anthracene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Chrysene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
di-n-octylphthalate	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Benzo(b+j+k)fluoranthene	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Benzo(a)pyrene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Indeno(1,2,3-c,d)pyrene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Dibenzo(a,h)anthracene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Benzo(g,h,i)perylene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
ethylmethanesulfonate	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
aniline	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
pentachloroethane	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
benzyl alcohol	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
acetophenone	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
N-nitrosomorpholine	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
N-nitrosopiperidine	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
2,6-dichlorophenol	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
hexachloropropene-1	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
N-nitroso-n-butylamine	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
safrole	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
1,2,4,5-tetrachlorobenzene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
cis and trans iso-safrole	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
1,3-dinitrobenzene	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
pentachlorobenzene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
1-naphthylamine	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
2,3,4,6-tetrachlorophenol	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
2-naphthylamine	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
5-nitro-o-toluidine	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]

QUALITY CONTROL: SVOCs in Soil						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-4	211503-3
diphenylamine	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
phenacetin	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
pentachloronitrobenzene	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
dinoseb	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
methapyrilene	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
p-dimethylaminoazobenzene	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
2-acetylaminofluorene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
7,12-dimethylbenz(a)anthracene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
3-methylcholanthrene	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
a-BHC	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
b-BHC	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
g-BHC	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
d-BHC	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Heptachlor	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Aldrin	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	76	85
Heptachlor Epoxide	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
g-Chlordane	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
a-Chlordane	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Endosulfan I	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
p,p'-DDE	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Dieldrin	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Endrin	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	83	110
p,p'-DDD	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Endosulfan II	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Endrin Aldehyde	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
p,p'-DDT	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Endrin Ketone	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Endosulfan Sulphate	mg/kg	0.5	Org-012	<0.5	1	<0.5	<0.5	0	[NT]	[NT]
Methoxychlor	mg/kg	1	Org-012	<1	1	<1	<1	0	[NT]	[NT]
Surrogate 2-fluorophenol	%		Org-012	84	1	77	93	19	91	86
Surrogate Phenol-d_6	%		Org-012	81	1	84	77	9	99	89
Surrogate Nitrobenzene-d_5	%		Org-012	99	1	100	95	5	104	94
Surrogate 2-fluorobiphenyl	%		Org-012	110	1	98	102	4	112	101
Surrogate 2,4,6-Tribromophenol	%		Org-012	117	1	122	121	1	128	125
Surrogate p-Terphenyl-d_{14}	%		Org-012	96	1	101	99	2	106	96

QUALITY CONTROL: vTRH(C6-C10)/BTEXN in Soil						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-4	211503-3
Date extracted	-			18/02/2019	1	18/02/2019	18/02/2019		18/02/2019	18/02/2019
Date analysed	-			19/02/2019	1	19/02/2019	19/02/2019		19/02/2019	19/02/2019
TRH C_6 - C_9	mg/kg	25	Org-016	<25	1	<25	<25	0	90	78
TRH C_6 - C_{10}	mg/kg	25	Org-016	<25	1	<25	<25	0	90	78
Benzene	mg/kg	0.2	Org-016	<0.2	1	<0.2	<0.2	0	78	68
Toluene	mg/kg	0.5	Org-016	<0.5	1	<0.5	<0.5	0	86	74
Ethylbenzene	mg/kg	1	Org-016	<1	1	<1	<1	0	96	82
m+p-xylene	mg/kg	2	Org-016	<2	1	<2	<2	0	95	83
o-Xylene	mg/kg	1	Org-016	<1	1	<1	<1	0	96	84
naphthalene	mg/kg	1	Org-014	<1	1	<1	<1	0	[NT]	[NT]
Surrogate aaa-Trifluorotoluene	%		Org-016	97	1	97	93	4	98	83

QUALITY CONTROL: svTRH (C10-C40) in Soil						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-4	211503-3
Date extracted	-			18/02/2019	1	18/02/2019	18/02/2019		18/02/2019	18/02/2019
Date analysed	-			18/02/2019	1	18/02/2019	18/02/2019		18/02/2019	18/02/2019
TRH C_{10} - C_{14}	mg/kg	50	Org-003	<50	1	240	100	82	106	104
TRH C_{15} - C_{28}	mg/kg	100	Org-003	<100	1	580	250	80	97	100
TRH C_{29} - C_{36}	mg/kg	100	Org-003	<100	1	<100	<100	0	114	103
TRH >C_{10} -C_{16}	mg/kg	50	Org-003	<50	1	450	190	81	106	104
TRH >C_{16} -C_{34}	mg/kg	100	Org-003	<100	1	360	160	77	97	100
TRH >C_{34} -C_{40}	mg/kg	100	Org-003	<100	1	<100	<100	0	114	103
Surrogate o-Terphenyl	%		Org-003	92	1	#	112		107	89

QUALITY CONTROL: Organochlorine Pesticides in soil						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-4	211503-3
Date extracted	-			18/02/2019	1	18/02/2019	18/02/2019		18/02/2019	18/02/2019
Date analysed	-			18/02/2019	1	18/02/2019	18/02/2019		18/02/2019	18/02/2019
HCB	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
alpha-BHC	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	91	107
gamma-BHC	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
beta-BHC	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	82	72
Heptachlor	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	81	84
delta-BHC	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Aldrin	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	74	77
Heptachlor Epoxide	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	83	79
gamma-Chlordane	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
alpha-chlordane	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Endosulfan I	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
pp-DDE	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	82	85
Dieldrin	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	93	96
Endrin	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	86	88
pp-DDD	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	84	85
Endosulfan II	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
pp-DDT	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Endrin Aldehyde	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Endosulfan Sulphate	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	86	80
Methoxychlor	mg/kg	0.1	Org-005	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Surrogate TCMX	%		Org-005	84	1	79	81	2	104	110

QUALITY CONTROL: Organophosphorus Pesticides						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-4	211503-3
Date extracted	-			18/02/2019	1	18/02/2019	18/02/2019		18/02/2019	18/02/2019
Date analysed	-			18/02/2019	1	18/02/2019	18/02/2019		18/02/2019	18/02/2019
Azinphos-methyl (Guthion)	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Bromophos-ethyl	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Chlorpyriphos	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	106	111
Chlorpyriphos-methyl	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Diazinon	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Dichlorvos	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	104	93
Dimethoate	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Ethion	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	105	92
Fenitrothion	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	112	112
Malathion	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	94	76
Parathion	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	110	104
Ronnel	mg/kg	0.1	Org-008	<0.1	1	<0.1	<0.1	0	108	106
Surrogate TCMX	%		Org-008	84	1	79	81	2	84	86

QUALITY CONTROL: PCBs in Soil						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-4	211503-3
Date extracted	-			18/02/2019	1	18/02/2019	18/02/2019		18/02/2019	18/02/2019
Date analysed	-			18/02/2019	1	18/02/2019	18/02/2019		18/02/2019	18/02/2019
Aroclor 1016	mg/kg	0.1	Org-006	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Aroclor 1221	mg/kg	0.1	Org-006	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Aroclor 1232	mg/kg	0.1	Org-006	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Aroclor 1242	mg/kg	0.1	Org-006	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Aroclor 1248	mg/kg	0.1	Org-006	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Aroclor 1254	mg/kg	0.1	Org-006	<0.1	1	<0.1	<0.1	0	100	100
Aroclor 1260	mg/kg	0.1	Org-006	<0.1	1	<0.1	<0.1	0	[NT]	[NT]
Surrogate TCLMX	%		Org-006	84	1	79	81	2	84	86

QUALITY CONTROL: Acid Extractable metals in soil						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-4	211503-3
Date prepared	-			18/02/2019	1	18/02/2019	18/02/2019		18/02/2019	18/02/2019
Date analysed	-			18/02/2019	1	18/02/2019	18/02/2019		18/02/2019	18/02/2019
Arsenic	mg/kg	4	Metals-020	<4	1	<4	<4	0	109	104
Cadmium	mg/kg	0.4	Metals-020	<0.4	1	<0.4	<0.4	0	98	102
Chromium	mg/kg	1	Metals-020	<1	1	<1	<1	0	101	101
Copper	mg/kg	1	Metals-020	<1	1	<1	<1	0	103	110
Lead	mg/kg	1	Metals-020	<1	1	<1	<1	0	101	115
Mercury	mg/kg	0.1	Metals-021	<0.1	1	<0.1	<0.1	0	90	85
Nickel	mg/kg	1	Metals-020	<1	1	<1	<1	0	95	101
Zinc	mg/kg	1	Metals-020	<1	1	1	1	0	98	126

Result Definitions

NT	Not tested
NA	Test not required
INS	Insufficient sample for this test
PQL	Practical Quantitation Limit
<	Less than
>	Greater than
RPD	Relative Percent Difference
LCS	Laboratory Control Sample
NS	Not specified
NEPM	National Environmental Protection Measure
NR	Not Reported

Quality Control Definitions

Blank	This is the component of the analytical signal which is not derived from the sample but from reagents, glassware etc, can be determined by processing solvents and reagents in exactly the same manner as for samples.
Duplicate	This is the complete duplicate analysis of a sample from the process batch. If possible, the sample selected should be one where the analyte concentration is easily measurable.
Matrix Spike	A portion of the sample is spiked with a known concentration of target analyte. The purpose of the matrix spike is to monitor the performance of the analytical method used and to determine whether matrix interferences exist.
LCS (Laboratory Control Sample)	This comprises either a standard reference material or a control matrix (such as a blank sand or water) fortified with analytes representative of the analyte class. It is simply a check sample.
Surrogate Spike	Surrogates are known additions to each sample, blank, matrix spike and LCS in a batch, of compounds which are similar to the analyte of interest, however are not expected to be found in real samples.

Australian Drinking Water Guidelines recommend that Thermotolerant Coliform, Faecal Enterococci, & E.Coli levels are less than 1cfu/100mL. The recommended maximums are taken from "Australian Drinking Water Guidelines", published by NHMRC & ARMC 2011.

Laboratory Acceptance Criteria

Duplicate sample and matrix spike recoveries may not be reported on smaller jobs, however, were analysed at a frequency to meet or exceed NEPM requirements. All samples are tested in batches of 20. The duplicate sample RPD and matrix spike recoveries for the batch were within the laboratory acceptance criteria.

Filters, swabs, wipes, tubes and badges will not have duplicate data as the whole sample is generally extracted during sample extraction.

Spikes for Physical and Aggregate Tests are not applicable.

For VOCs in water samples, three vials are required for duplicate or spike analysis.

Duplicates: >10xPQL - RPD acceptance criteria will vary depending on the analytes and the analytical techniques but is typically in the range 20%-50% – see ELN-P05 QA/QC tables for details; <10xPQL - RPD are higher as the results approach PQL and the estimated measurement uncertainty will statistically increase.

Matrix Spikes, LCS and Surrogate recoveries: Generally 70-130% for inorganics/metals; 60-140% for organics (+/-50% surrogates) and 10-140% for labile SVOCs (including labile surrogates), ultra trace organics and speciated phenols is acceptable.

In circumstances where no duplicate and/or sample spike has been reported at 1 in 10 and/or 1 in 20 samples respectively, the sample volume submitted was insufficient in order to satisfy laboratory QA/QC protocols.

When samples are received where certain analytes are outside of recommended technical holding times (THTs), the analysis has proceeded. Where analytes are on the verge of breaching THTs, every effort will be made to analyse within the THT or as soon as practicable.

Where sampling dates are not provided, Envirolab are not in a position to comment on the validity of the analysis where recommended technical holding times may have been breached.

Measurement Uncertainty estimates are available for most tests upon request.

Report Comments

TRH Soil C10-C40 NEPM - The RPD for duplicate results is accepted due to the non homogenous nature of sample 1.

ALS Environmental — CHAIN OF CUSTODY

ALS Laboratory: please tick →

SYDNEY 277-289 Woodpark Road Smithfield NSW 2164
Ph: 02 8784 8555 E: samplov.sydney@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	TURNAROUND REQUIREMENTS: 1 DAY TAT (List due date): (Standard TAT may be longer for some tests e.g., Ultra Trace Organics) ☒ Non Standard or urgent TAT (List due date): Due 14/02/19	FOR LABORATORY USE ONLY (Circle): Custody Seal Intact? Yes / No / N/A; Frozen ice bricks present upon arrival? Yes / No; Random Sample Temperature on Receipt: 2.5; Other comments:
OFFICE: Level 16, 680 Georges St, Sydney NSW 2000	ALS QUOTE NO.:	COC SEQUENCE NUMBER (Circle): COC: 1 2 3 4 5 6 (1) (3); OF: 1 2 3 4 5 6 (1)
ORDER NUMBER: 10028439 - task 6		
PROJECT MANAGER: Caitlain Regena	CONTACT PH:	
SAMPLER: Tom Keatley	SAMPLER MOBILE: 0429 948 897	
COC emailed to ALS? (NO)	EDD FORMAT (or default): ESDAT	
Email Reports to: caitlain.regena@arcadis.com; tom.keatley@arcadis.com		
Email Invoice to: Accounts.Payable <AU.Accounts.Payable@arcadis.com>		

RELINQUISHED BY:	RECEIVED BY:	RELINQUISHED BY:	RECEIVED BY:
Caitlain Regena			MC
DATE/TIME: 13/02/2019	DATE/TIME:	DATE/TIME:	DATE/TIME: 13/2/19 2:55pm

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS — MATRIX: SOLID (S) WATER (W)				CONTAINER INFORMATION	ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price). Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).									Additional Information
LAB ID	SAMPLE ID	DEPTH	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	TRH/BTEX S-5 m8	OCs/OPs S-13	VOCs S-23 SVOC	Asbestos NEPM	Standard PFAS (28 Analytes)	Asbestos ID	BTEX			Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
91	DUP3@2.4		12-02-19	s											
(3) --	TRIP@2.7		11-02-19	s		X	X	X							
--	TRIP2@2.2 (1)		11-02-19	s		X	X	X							Please send to Envirolab.
92	TRIP3@2.4 (2)		12-02-19	s											Please send to Envirolab.
93	CC - Water		12-02-19	w						X					
94	Rinsate		12-02-19	w											
95	TS		11/02	s								X			
96	TB		11/02	s								X			
SNR	Near BH48 -ACM	0	~~11/2~~ 12-02-19	o							X				
SNR	BH44 - PACM	1.1	~~11/2~~ 12-02-19	o							X				
97	TSC		11/2/19												
					TOTAL	2	2	2	0	0	2	2			

ENVIROLAB — Envirolab Services, 12 Ashley St, Chatswood NSW 2067, Ph: (02) 9910 6200

Job No: 211503
Date Received: 14/2/19 – 15.2.19
Time Received: 15:07
Received by: LN
Temp: Cool/Ambient
Cooling: Ice/Icepack
Security: Intact/Broken/None

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic; V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl proserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass; Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

ALS Environmental

CERTIFICATE OF ANALYSIS

Work Order	: **ES1838116**	Page	: 1 of 72
Client	: **ARCADIS AUSTRALIA PACIFIC PTY LTD**	Laboratory	: Environmental Division Sydney
Contact	: MR DEAN STAFFORD	Contact	: Loren Schiavon
Address	: L16, 480 GEORGE STREET SYDNEY NSW 2000	Address	: 277-289 Woodpark Road Smithfield NSW Australia 2164
Telephone	: 02 9690 2555	Telephone	: +61 2 8784 8555
Project	: King St North ESA	Date Samples Received	: 17-Dec-2018 17:30
Order number	: 10026439	Date Analysis Commenced	: 19-Dec-2018
C-O-C number	: ----	Issue Date	: 07-Jan-2019 15:52
Sampler	: CAITLAIN REGENA		
Site	: ----		
Quote number	: EN/091/17 (Primary Work only)		
No. of samples received	: 60		
No. of samples analysed	: 30		

Accreditation No. 825
Accredited for compliance with
ISO/IEC 17025 - Testing

This report supersedes any previous report(s) with this reference. Results apply to the sample(s) as submitted. This document shall not be reproduced, except in full.

This Certificate of Analysis contains the following information:

- General Comments
- Analytical Results
- Descriptive Results
- Surrogate Control Limits

Additional information pertinent to this report will be found in the following separate attachments: Quality Control Report, QA/QC Compliance Assessment to assist with Quality Review and Sample Receipt Notification.

Signatories

This document has been electronically signed by the authorized signatories below. Electronic signing is carried out in compliance with procedures specified in 21 CFR Part 11.

Signatories	*Position*	*Accreditation Category*
Alana Smylie	Asbestos Identifier	Newcastle - Asbestos, Mayfield West, NSW
Alex Rossi	Organic Chemist	Sydney Organics, Smithfield, NSW
Christopher Owler	Team Leader - Asbestos	Newcastle - Asbestos, Mayfield West, NSW
Edwandy Fadjar	Organic Coordinator	Sydney Inorganics, Smithfield, NSW
Edwandy Fadjar	Organic Coordinator	Sydney Organics, Smithfield, NSW
Ivan Taylor	Analyst	Sydney Inorganics, Smithfield, NSW

General Comments

The analytical procedures used by the Environmental Division have been developed from established internationally recognized procedures such as those published by the USEPA, APHA, AS and NEPM. In house developed procedures are employed in the absence of documented standards or by client request.

Where moisture determination has been performed, results are reported on a dry weight basis.

Where a reported less than (<) result is higher than the LOR, this may be due to primary sample extract/digestate dilution and/or insufficient sample for analysis.

Where the LOR of a reported result differs from standard LOR, this may be due to high moisture content, insufficient sample (reduced weight employed) or matrix interference.

When sampling time information is not provided by the client, sampling dates are shown without a time component. In these instances, the time component has been assumed by the laboratory for processing purposes.

Where a result is required to meet compliance limits the associated uncertainty must be considered. Refer to the ALS Contact for details.

Key : CAS Number = CAS registry number from database maintained by Chemical Abstracts Services. The Chemical Abstracts Service is a division of the American Chemical Society.
LOR = Limit of reporting
^ = This result is computed from individual analyte detections at or above the level of reporting
ø = ALS is not NATA accredited for these tests.
~ = Indicates an estimated value.

- EG005: Poor precision was obtained for Zinc on sample ES1838118-3. Results have been confirmed by re-extraction and re-analysis.
- EP074: Samples not received in a suitable time frame to conduct the analysis within the recommended holding time.
- EP074/80: Surrogate recovery bias low due to sample matrix interferences, confirmed by re-analysis.
- EP068 : Particular samples required dilution due to sample matrix . LOR values have been adjusted accordingly.
- EP075: 'Sum of PAH' is the sum of the USEPA 16 priority PAHs
- EA200N: Asbestos weights and percentages are not covered under the Scope of NATA Accreditation.
  Weights of Asbestos are based on extracted bulk asbestos, fibre bundles, and/or ACM and do not include respirable fibres (if present)
  The Asbestos (Fines and Fibrous) weight is calculated from the extracted Fibrous Asbestos and Asbestos Fines as an equivalent weight of 100% Asbestos
  Percentages for Asbestos content in ACM are based on the 2013 NEPM default values.
  All calculations of percentage Asbestos under this method are approximate and should be used as a guide only.
- EA200 'Am' Amosite (brown asbestos)
- EA200 'Cr' Crocidolite (blue asbestos)
- EA200 'Trace' - Asbestos fibres ("Free Fibres") detected by trace analysis per AS4964. The result can be interpreted that the sample contains detectable 'respirable' asbestos fibres
- EA200: Asbestos Identification Samples were analysed by Polarised Light Microscopy including dispersion staining.
- EA200 Legend
- EA200 'Ch' Chrysotile (white asbestos)
- EA200: 'UMF' Unknown Mineral Fibres. "-" indicates fibres detected may or may not be asbestos fibres. Confirmation by alternative techniques is recommended.
- EA200: Negative results for vinyl tiles should be confirmed by an independent analytical technique.
- EA200N: ALS laboratory procedures and methods used for the identification and quantitation of asbestos are consistent with AS4964-2004 and the requirements of the 2013 NEPM for Assessment of Site Contamination
- Benzo(a)pyrene Toxicity Equivalent Quotient (TEQ) is the sum total of the concentration of the eight carcinogenic PAHs multiplied by their Toxicity Equivalence Factor (TEF) relative to Benzo(a)pyrene. TEF values are provided in brackets as follows: Benz(a)anthracene (0.1), Chrysene (0.01), Benzo(b+j) & Benzo(k)fluoranthene (0.1), Benzo(a)pyrene (1.0), Indeno(1.2.3.cd)pyrene (0.1), Dibenz(a.h)anthracene (1.0), Benzo(g.h.i)perylene (0.01). Less than LOR results for 'TEQ Zero' are treated as zero, for 'TEQ 1/2LOR' are treated as half the reported LOR, and for 'TEQ LOR' are treated as being equal to the reported LOR.
  Note: TEQ 1/2LOR and TEQ LOR will calculate as 0.6mg/Kg and 1.2mg/Kg respectively for samples with non-detects for all of the eight TEQ PAHs.
- EA200: For samples larger than 30g, the <2mm fraction may be sub-sampled prior to trace analysis as outlined in ISO23909:2008(E) Sect 6.3.2-2
- EA200: 'Yes' - Asbestos detected by polarised light microscopy including dispersion staining.

- EA200: 'No*' - No asbestos found, at the reporting limit of 0.1g/kg, by polarised light microscopy including dispersion staining. Asbestos material was detected and positively identified at concentrations estimated to be below 0.1g/kg.
- EA200: 'No' - No asbestos found at the reporting limit 0.1g/kg, by polarised light microscopy including dispersion staining.

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH03@2.00	BH01@0.50	BH01@2.00	DUP1	BH02@1.00
			Client sampling date / time	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]
Compound	CAS Number	LOR	Unit	ES1838116-005	ES1838116-006	ES1838116-008	ES1838116-009	ES1838116-010
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	----	1.0	%	20.9	8.8	31.0	28.2	12.4
EA200: AS 4964 - 2004 Identification of Asbestos in Soils								
Asbestos Detected	1332-21-4	0.1	g/kg	----	No	----	----	No
Asbestos (Trace)	1332-21-4	5	Fibres	----	No	----	----	----
Asbestos Type	1332-21-4	-	--	----	-	----	----	-
Sample weight (dry)	----	0.01	g	----	24.3	----	----	296
APPROVED IDENTIFIER:	----	-	--	----	A. SMYLIE	----	----	C.OWLER
EA200N: Asbestos Quantification (non-NATA)								
ø Asbestos (Fines and Fibrous <7mm)	1332-21-4	0.0004	g	----	----	----	----	<0.0004
ø Asbestos (Fines and Fibrous FA+AF)	----	0.001	% (w/w)	----	----	----	----	<0.001
ø Asbestos Containing Material	1332-21-4	0.1	g	----	----	----	----	<0.1
ø Asbestos Containing Material (as 15% Asbestos in ACM >7mm)	1332-21-4	0.01	% (w/w)	----	----	----	----	<0.01
ø Weight Used for % Calculation	----	0.0001	kg	----	----	----	----	0.296
EG005T: Total Metals by ICP-AES								
Arsenic	7440-38-2	5	mg/kg	<5	<5	10	7	<5
Cadmium	7440-43-9	1	mg/kg	<1	<1	<1	<1	<1
Chromium	7440-47-3	2	mg/kg	<2	7	2	<2	4
Copper	7440-50-8	5	mg/kg	<5	13	8	<5	11
Lead	7439-92-1	5	mg/kg	<5	26	46	23	23
Nickel	7440-02-0	2	mg/kg	<2	2	<2	<2	<2
Zinc	7440-66-6	5	mg/kg	<5	38	40	18	49
EG035T: Total Recoverable Mercury by FIMS								
Mercury	7439-97-6	0.1	mg/kg	<0.1	0.1	0.3	0.2	<0.1
EP066: Polychlorinated Biphenyls (PCB)								
Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
EP068A: Organochlorine Pesticides (OC)								
alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
delta-BHC	319-86-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
Heptachlor	76-44-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH03@2.00	BH01@0.50	BH01@2.00	DUP1	BH02@1.00
				Client sampling date / time	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-005	ES1838116-006	ES1838116-008	ES1838116-009	ES1838116-010
					Result	Result	Result	Result	Result
EP068A: Organochlorine Pesticides (OC) - Continued									
Aldrin	309-00-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Heptachlor epoxide	1024-57-3	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
^ Total Chlordane (sum)	----	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
trans-Chlordane	5103-74-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
alpha-Endosulfan	959-98-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
cis-Chlordane	5103-71-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Dieldrin	60-57-1	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
4.4`-DDE	72-55-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Endrin	72-20-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
beta-Endosulfan	33213-65-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
^ Endosulfan (sum)	115-29-7	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
4.4`-DDD	72-54-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Endrin aldehyde	7421-93-4	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Endosulfan sulfate	1031-07-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
4.4`-DDT	50-29-3	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Endrin ketone	53494-70-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Methoxychlor	72-43-5	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
^ Sum of Aldrin + Dieldrin	309-00-2/60-57-1	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
^ Sum of DDD + DDE + DDT	72-54-8/72-55-9/50-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
EP068B: Organophosphorus Pesticides (OP)									
Dichlorvos	62-73-7	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Demeton-S-methyl	919-86-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Monocrotophos	6923-22-4	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Dimethoate	60-51-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Diazinon	333-41-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Parathion-methyl	298-00-0	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Malathion	121-75-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Fenthion	55-38-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Chlorpyrifos	2921-88-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Parathion	56-38-2	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Pirimphos-ethyl	23505-41-1	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Chlorfenvinphos	470-90-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Bromophos-ethyl	4824-78-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH03@2.00	BH01@0.50	BH01@2.00	DUP1	BH02@1.00
				Client sampling date / time	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-005	ES1838116-006	ES1838116-008	ES1838116-009	ES1838116-010
					Result	Result	Result	Result	Result
EP068B: Organophosphorus Pesticides (OP) - Continued									
Fenamiphos	22224-92-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Prothiofos	34643-46-4	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Ethion	563-12-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Carbophenothion	786-19-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Azinphos Methyl	86-50-0	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
EP074A: Monocyclic Aromatic Hydrocarbons									
Benzene	71-43-2	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Toluene	108-88-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Ethylbenzene	100-41-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Styrene	100-42-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
ortho-Xylene	95-47-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Isopropylbenzene	98-82-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
n-Propylbenzene	103-65-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
sec-Butylbenzene	135-98-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
tert-Butylbenzene	98-06-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
p-Isopropyltoluene	99-87-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
n-Butylbenzene	104-51-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074B: Oxygenated Compounds									
Vinyl Acetate	108-05-4	5	mg/kg		<5	<5	<5	<5	<5
2-Butanone (MEK)	78-93-3	5	mg/kg		<5	<5	<5	<5	<5
4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg		<5	<5	<5	<5	<5
2-Hexanone (MBK)	591-78-6	5	mg/kg		<5	<5	<5	<5	<5
EP074C: Sulfonated Compounds									
Carbon disulfide	75-15-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074D: Fumigants									
2.2-Dichloropropane	594-20-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichloropropane	78-87-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074E: Halogenated Aliphatic Compounds									

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH03@2.00	BH01@0.50	BH01@2.00	DUP1	BH02@1.00
				Client sampling date / time	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-005	ES1838116-006	ES1838116-008	ES1838116-009	ES1838116-010
					Result	Result	Result	Result	Result
EP074E: Halogenated Aliphatic Compounds - Continued									
Dichlorodifluoromethane	75-71-8	5	mg/kg		<5	<5	<5	<5	<5
Chloromethane	74-87-3	5	mg/kg		<5	<5	<5	<5	<5
Vinyl chloride	75-01-4	5	mg/kg		<5	<5	<5	<5	<5
Bromomethane	74-83-9	5	mg/kg		<5	<5	<5	<5	<5
Chloroethane	75-00-3	5	mg/kg		<5	<5	<5	<5	<5
Trichlorofluoromethane	75-69-4	5	mg/kg		<5	<5	<5	<5	<5
1.1-Dichloroethene	75-35-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Iodomethane	74-88-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1-Dichloroethane	75-34-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.1-Trichloroethane	71-55-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1-Dichloropropylene	563-58-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Carbon Tetrachloride	56-23-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichloroethane	107-06-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Trichloroethene	79-01-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dibromomethane	74-95-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.2-Trichloroethane	79-00-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.3-Dichloropropane	142-28-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Tetrachloroethene	127-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.3-Trichloropropane	96-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pentachloroethane	76-01-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074F: Halogenated Aromatic Compounds									
Chlorobenzene	108-90-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bromobenzene	108-86-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Chlorotoluene	95-49-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chlorotoluene	106-43-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074G: Trihalomethanes									

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH03@2.00	BH01@0.50	BH01@2.00	DUP1	BH02@1.00
				Client sampling date / time	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-005	ES1838116-006	ES1838116-008	ES1838116-009	ES1838116-010
					Result	Result	Result	Result	Result
EP074G: Trihalomethanes - Continued									
Chloroform	67-66-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bromodichloromethane	75-27-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dibromochloromethane	124-48-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bromoform	75-25-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075A: Phenolic Compounds									
Phenol	108-95-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Chlorophenol	95-57-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Methylphenol	95-48-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
3- & 4-Methylphenol	1319-77-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Nitrophenol	88-75-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.4-Dimethylphenol	105-67-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.4-Dichlorophenol	120-83-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.6-Dichlorophenol	87-65-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pentachlorophenol	87-86-5	1	mg/kg		<1	<1	<1	<1	<1
EP075B: Polynuclear Aromatic Hydrocarbons									
Naphthalene	91-20-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Methylnaphthalene	91-57-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Chloronaphthalene	91-58-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Acenaphthylene	208-96-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Acenaphthene	83-32-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Fluorene	86-73-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Phenanthrene	85-01-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Anthracene	120-12-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Fluoranthene	206-44-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pyrene	129-00-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Benz(a)anthracene	56-55-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chrysene	218-01-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg		<1	<1	<1	<1	<1
7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Benzo(a)pyrene	50-32-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH03@2.00	BH01@0.50	BH01@2.00	DUP1	BH02@1.00
				Client sampling date / time	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-005	ES1838116-006	ES1838116-008	ES1838116-009	ES1838116-010
					Result	Result	Result	Result	Result
EP075B: Polynuclear Aromatic Hydrocarbons - Continued									
3-Methylcholanthrene	56-49-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
^ Sum of PAHs	----	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
^ Benzo(a)pyrene TEQ (zero)	----	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
^ Benzo(a)pyrene TEQ (half LOR)	----	0.5	mg/kg		**0.6**	**0.6**	**0.6**	**0.6**	**0.6**
^ Benzo(a)pyrene TEQ (LOR)	----	0.5	mg/kg		**1.2**	**1.2**	**1.2**	**1.2**	**1.2**
EP075C: Phthalate Esters									
Dimethyl phthalate	131-11-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Diethyl phthalate	84-66-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Di-n-butyl phthalate	84-74-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Butyl benzyl phthalate	85-68-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
bis(2-ethylhexyl) phthalate	117-81-7	5.0	mg/kg		<5.0	<5.0	<5.0	<5.0	<5.0
Di-n-octylphthalate	117-84-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075D: Nitrosamines									
N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodiethylamine	55-18-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosopyrrolidine	930-55-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
N-Nitrosomorpholine	59-89-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosopiperidine	100-75-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodibutylamine	924-16-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
Methapyrilene	91-80-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075E: Nitroaromatics and Ketones									
2-Picoline	109-06-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Acetophenone	98-86-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Nitrobenzene	98-95-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Isophorone	78-59-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.6-Dinitrotoluene	606-20-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
2.4-Dinitrotoluene	121-14-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
1-Naphthylamine	134-32-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH03@2.00	BH01@0.50	BH01@2.00	DUP1	BH02@1.00
				Client sampling date / time	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-005	ES1838116-006	ES1838116-008	ES1838116-009	ES1838116-010
					Result	Result	Result	Result	Result
EP075E: Nitroaromatics and Ketones - Continued									
4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
5-Nitro-o-toluidine	99-55-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Azobenzene	103-33-3	1	mg/kg		<1	<1	<1	<1	<1
1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Phenacetin	62-44-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Aminobiphenyl	92-67-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pentachloronitrobenzene	82-68-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pronamide	23950-58-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dimethylaminoazobenzene	60-11-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorobenzilate	510-15-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075F: Haloethers									
Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075G: Chlorinated Hydrocarbons									
1.3-Dichlorobenzene	541-73-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.4-Dichlorobenzene	106-46-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichlorobenzene	95-50-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachloroethane	67-72-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachloropropylene	1888-71-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorobutadiene	87-68-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg		<2.5	<2.5	<2.5	<2.5	<2.5
Pentachlorobenzene	608-93-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorobenzene (HCB)	118-74-1	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
EP075H: Anilines and Benzidines									
Aniline	62-53-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chloroaniline	106-47-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Nitroaniline	88-74-4	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
3-Nitroaniline	99-09-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
Dibenzofuran	132-64-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Nitroaniline	100-01-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Carbazole	86-74-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH03@2.00	BH01@0.50	BH01@2.00	DUP1	BH02@1.00
				Client sampling date / time	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-005	ES1838116-006	ES1838116-008	ES1838116-009	ES1838116-010
					Result	Result	Result	Result	Result
EP075H: Anilines and Benzidines - Continued									
3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075I: Organochlorine Pesticides									
alpha-BHC	319-84-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
beta-BHC	319-85-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
gamma-BHC	58-89-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
delta-BHC	319-86-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Heptachlor	76-44-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Aldrin	309-00-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Heptachlor epoxide	1024-57-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
alpha-Endosulfan	959-98-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4.4`-DDE	72-55-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dieldrin	60-57-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Endrin	72-20-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
beta-Endosulfan	33213-65-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4.4`-DDD	72-54-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Endosulfan sulfate	1031-07-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4.4`-DDT	50-29-3	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
EP075J: Organophosphorus Pesticides									
Dichlorvos	62-73-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dimethoate	60-51-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Diazinon	333-41-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorpyrifos-methyl	5598-13-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Malathion	121-75-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Fenthion	55-38-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorpyrifos	2921-88-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pirimphos-ethyl	23505-41-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorfenvinphos	470-90-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Prothiofos	34643-46-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Ethion	563-12-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP080/071: Total Petroleum Hydrocarbons									
C6 - C9 Fraction	----	10	mg/kg		<10	<10	<10	<10	<10
C10 - C14 Fraction	----	50	mg/kg		<50	<50	<50	<50	<50
C15 - C28 Fraction	----	100	mg/kg		<100	<100	<100	<100	<100
C29 - C36 Fraction	----	100	mg/kg		<100	<100	<100	<100	<100

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH03@2.00	BH01@0.50	BH01@2.00	DUP1	BH02@1.00
				Client sampling date / time	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-005	ES1838116-006	ES1838116-008	ES1838116-009	ES1838116-010
					Result	Result	Result	Result	Result
EP080/071: Total Petroleum Hydrocarbons - Continued									
^ C10 - C36 Fraction (sum)	----	50	mg/kg		<50	<50	<50	<50	<50
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions									
C6 - C10 Fraction	C6_C10	10	mg/kg		<10	<10	<10	<10	<10
^ C6 - C10 Fraction minus BTEX (F1)	C6_C10-BTEX	10	mg/kg		<10	<10	<10	<10	<10
>C10 - C16 Fraction	----	50	mg/kg		<50	<50	<50	<50	<50
>C16 - C34 Fraction	----	100	mg/kg		<100	<100	<100	<100	<100
>C34 - C40 Fraction	----	100	mg/kg		<100	<100	<100	<100	<100
^ >C10 - C40 Fraction (sum)	----	50	mg/kg		<50	<50	<50	<50	<50
^ >C10 - C16 Fraction minus Naphthalene (F2)	----	50	mg/kg		<50	<50	<50	<50	<50
EP080: BTEXN									
Benzene	71-43-2	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Toluene	108-88-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Ethylbenzene	100-41-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
ortho-Xylene	95-47-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
^ Sum of BTEX	----	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
^ Total Xylenes	----	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Naphthalene	91-20-3	1	mg/kg		<1	<1	<1	<1	<1
EP066S: PCB Surrogate									
Decachlorobiphenyl	2051-24-3	0.1	%		100	116	103	111	108
EP068S: Organochlorine Pesticide Surrogate									
Dibromo-DDE	21655-73-2	0.05	%		101	119	106	105	92.2
EP068T: Organophosphorus Pesticide Surrogate									
DEF	78-48-8	0.05	%		113	116	110	115	110
EP074S: VOC Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.5	%		86.0	91.4	83.2	83.2	89.4
Toluene-D8	2037-26-5	0.5	%		95.6	99.9	90.3	90.7	100
4-Bromofluorobenzene	460-00-4	0.5	%		96.1	100	90.5	88.7	100.0
EP075S: Acid Extractable Surrogates									
2-Fluorophenol	367-12-4	0.5	%		93.7	83.4	95.8	91.9	89.6
Phenol-d6	13127-88-3	0.5	%		89.5	86.4	92.4	89.5	91.3
2-Chlorophenol-D4	93951-73-6	0.5	%		97.6	90.9	104	97.1	96.9

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH03@2.00	BH01@0.50	BH01@2.00	DUP1	BH02@1.00
				Client sampling date / time	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-005	ES1838116-006	ES1838116-008	ES1838116-009	ES1838116-010
					Result	Result	Result	Result	Result
EP075S: Acid Extractable Surrogates - Continued									
2.4.6-Tribromophenol	118-79-6	0.5	%		72.9	59.3	74.8	69.9	55.7
EP075T: Base/Neutral Extractable Surrogates									
Nitrobenzene-D5	4165-60-0	0.5	%		93.2	85.9	96.8	93.1	91.5
1.2-Dichlorobenzene-D4	2199-69-1	0.5	%		85.6	77.8	91.8	83.1	86.2
2-Fluorobiphenyl	321-60-8	0.5	%		114	104	113	111	109
Anthracene-d10	1719-06-8	0.5	%		100	90.5	98.3	97.6	99.6
4-Terphenyl-d14	1718-51-0	0.5	%		111	94.8	110	106	106
EP080S: TPH(V)/BTEX Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.2	%		86.1	91.4	82.6	83.2	89.4
Toluene-D8	2037-26-5	0.2	%		97.6	102	92.4	92.5	102
4-Bromofluorobenzene	460-00-4	0.2	%		96.2	101	89.3	90.6	99.6

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH02@2.50	MW02@1.00	MW02@6.00	BH06@0.50	BH06@2.40
			Client sampling date / time	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit	ES1838116-012	ES1838116-013	ES1838116-015	ES1838116-016	ES1838116-018
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	----	1.0	%	25.1	23.4	21.6	9.4	12.2
EA200: AS 4964 - 2004 Identification of Asbestos in Soils								
Asbestos Detected	1332-21-4	0.1	g/kg	----	No	----	No	----
Asbestos Type	1332-21-4	-	--	----	-	----	-	----
Sample weight (dry)	----	0.01	g	----	306	----	263	----
APPROVED IDENTIFIER:	----	-	--	----	C.OWLER	----	A.SMYLIE	----
EA200N: Asbestos Quantification (non-NATA)								
ø Asbestos (Fines and Fibrous <7mm)	1332-21-4	0.0004	g	----	<0.0004	----	<0.0004	----
ø Asbestos (Fines and Fibrous FA+AF)	----	0.001	% (w/w)	----	<0.001	----	<0.001	----
ø Asbestos Containing Material	1332-21-4	0.1	g	----	<0.1	----	<0.1	----
ø Asbestos Containing Material (as 15% Asbestos in ACM >7mm)	1332-21-4	0.01	% (w/w)	----	<0.01	----	<0.01	----
ø Weight Used for % Calculation	----	0.0001	kg	----	0.306	----	0.263	----
EG005T: Total Metals by ICP-AES								
Arsenic	7440-38-2	5	mg/kg	<5	<5	<5	9	38
Cadmium	7440-43-9	1	mg/kg	<1	<1	<1	<1	<1
Chromium	7440-47-3	2	mg/kg	<2	10	5	29	33
Copper	7440-50-8	5	mg/kg	<5	17	15	103	45
Lead	7439-92-1	5	mg/kg	<5	37	16	110	110
Nickel	7440-02-0	2	mg/kg	<2	<2	<2	41	18
Zinc	7440-66-6	5	mg/kg	<5	124	31	233	137
EG035T: Total Recoverable Mercury by FIMS								
Mercury	7439-97-6	0.1	mg/kg	<0.1	0.1	<0.1	<0.1	0.9
EP066: Polychlorinated Biphenyls (PCB)								
Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
EP068A: Organochlorine Pesticides (OC)								
alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
delta-BHC	319-86-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
Heptachlor	76-44-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
Aldrin	309-00-2	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH02@2.50	MW02@1.00	MW02@6.00	BH06@0.50	BH06@2.40
				Client sampling date / time	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-012	ES1838116-013	ES1838116-015	ES1838116-016	ES1838116-018
					Result	Result	Result	Result	Result
EP068A: Organochlorine Pesticides (OC) - Continued									
Heptachlor epoxide	1024-57-3	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
^ Total Chlordane (sum)	----	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
trans-Chlordane	5103-74-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
alpha-Endosulfan	959-98-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
cis-Chlordane	5103-71-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Dieldrin	60-57-1	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
4.4`-DDE	72-55-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Endrin	72-20-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
beta-Endosulfan	33213-65-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
^ Endosulfan (sum)	115-29-7	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
4.4`-DDD	72-54-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Endrin aldehyde	7421-93-4	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Endosulfan sulfate	1031-07-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
4.4`-DDT	50-29-3	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Endrin ketone	53494-70-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Methoxychlor	72-43-5	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
^ Sum of Aldrin + Dieldrin	309-00-2/60-57-1	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
^ Sum of DDD + DDE + DDT	72-54-8/72-55-9/50-29-3	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
EP068B: Organophosphorus Pesticides (OP)									
Dichlorvos	62-73-7	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Demeton-S-methyl	919-86-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Monocrotophos	6923-22-4	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Dimethoate	60-51-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Diazinon	333-41-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Parathion-methyl	298-00-0	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Malathion	121-75-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Fenthion	55-38-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Chlorpyrifos	2921-88-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Parathion	56-38-2	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Pirimphos-ethyl	23505-41-1	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Chlorfenvinphos	470-90-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Bromophos-ethyl	4824-78-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Fenamiphos	22224-92-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH02@2.50	MW02@1.00	MW02@6.00	BH06@0.50	BH06@2.40
				Client sampling date / time	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-012	ES1838116-013	ES1838116-015	ES1838116-016	ES1838116-018
					Result	Result	Result	Result	Result
EP068B: Organophosphorus Pesticides (OP) - Continued									
Prothiofos	34643-46-4	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Ethion	563-12-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Carbophenothion	786-19-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Azinphos Methyl	86-50-0	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
EP074A: Monocyclic Aromatic Hydrocarbons									
Benzene	71-43-2	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Toluene	108-88-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Ethylbenzene	100-41-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Styrene	100-42-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
ortho-Xylene	95-47-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Isopropylbenzene	98-82-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
n-Propylbenzene	103-65-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
sec-Butylbenzene	135-98-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
tert-Butylbenzene	98-06-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
p-Isopropyltoluene	99-87-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
n-Butylbenzene	104-51-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074B: Oxygenated Compounds									
Vinyl Acetate	108-05-4	5	mg/kg		<5	<5	<5	<5	<5
2-Butanone (MEK)	78-93-3	5	mg/kg		<5	<5	<5	<5	<5
4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg		<5	<5	<5	<5	<5
2-Hexanone (MBK)	591-78-6	5	mg/kg		<5	<5	<5	<5	<5
EP074C: Sulfonated Compounds									
Carbon disulfide	75-15-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074D: Fumigants									
2.2-Dichloropropane	594-20-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichloropropane	78-87-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074E: Halogenated Aliphatic Compounds									
Dichlorodifluoromethane	75-71-8	5	mg/kg		<5	<5	<5	<5	<5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH02@2.50	MW02@1.00	MW02@6.00	BH06@0.50	BH06@2.40
				Client sampling date / time	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-012	ES1838116-013	ES1838116-015	ES1838116-016	ES1838116-018
					Result	Result	Result	Result	Result
EP074E: Halogenated Aliphatic Compounds - Continued									
Chloromethane	74-87-3	5	mg/kg		<5	<5	<5	<5	<5
Vinyl chloride	75-01-4	5	mg/kg		<5	<5	<5	<5	<5
Bromomethane	74-83-9	5	mg/kg		<5	<5	<5	<5	<5
Chloroethane	75-00-3	5	mg/kg		<5	<5	<5	<5	<5
Trichlorofluoromethane	75-69-4	5	mg/kg		<5	<5	<5	<5	<5
1.1-Dichloroethene	75-35-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Iodomethane	74-88-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1-Dichloroethane	75-34-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.1-Trichloroethane	71-55-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1-Dichloropropylene	563-58-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Carbon Tetrachloride	56-23-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichloroethane	107-06-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Trichloroethene	79-01-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dibromomethane	74-95-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.2-Trichloroethane	79-00-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.3-Dichloropropane	142-28-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Tetrachloroethene	127-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.3-Trichloropropane	96-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pentachloroethane	76-01-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074F: Halogenated Aromatic Compounds									
Chlorobenzene	108-90-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bromobenzene	108-86-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Chlorotoluene	95-49-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chlorotoluene	106-43-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074G: Trihalomethanes									
Chloroform	67-66-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH02@2.50	MW02@1.00	MW02@6.00	BH06@0.50	BH06@2.40
			Client sampling date / time	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit	ES1838116-012	ES1838116-013	ES1838116-015	ES1838116-016	ES1838116-018
				Result	Result	Result	Result	Result
EP074G: Trihalomethanes - Continued								
Bromodichloromethane	75-27-4	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Dibromochloromethane	124-48-1	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Bromoform	75-25-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
EP075A: Phenolic Compounds								
Phenol	108-95-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2-Chlorophenol	95-57-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2-Methylphenol	95-48-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
3- & 4-Methylphenol	1319-77-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2-Nitrophenol	88-75-5	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.4-Dimethylphenol	105-67-9	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.4-Dichlorophenol	120-83-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.6-Dichlorophenol	87-65-0	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Pentachlorophenol	87-86-5	1	mg/kg	<1	<1	<1	<1	<1
EP075B: Polynuclear Aromatic Hydrocarbons								
Naphthalene	91-20-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2-Methylnaphthalene	91-57-6	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2-Chloronaphthalene	91-58-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Acenaphthylene	208-96-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Acenaphthene	83-32-9	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Fluorene	86-73-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Phenanthrene	85-01-8	0.5	mg/kg	<0.5	<0.5	<0.5	**0.6**	**0.7**
Anthracene	120-12-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	**5.1**
Fluoranthene	206-44-0	0.5	mg/kg	<0.5	<0.5	<0.5	**1.8**	**4.9**
Pyrene	129-00-0	0.5	mg/kg	<0.5	<0.5	<0.5	**1.9**	**6.5**
N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Benz(a)anthracene	56-55-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	**0.8**
Chrysene	218-01-9	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	**1.3**
Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg	<1	<1	<1	<1	**2**
7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Benzo(a)pyrene	50-32-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
3-Methylcholanthrene	56-49-5	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH02@2.50	MW02@1.00	MW02@6.00	BH06@0.50	BH06@2.40
			Client sampling date / time	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit	ES1838116-012	ES1838116-013	ES1838116-015	ES1838116-016	ES1838116-018
				Result	Result	Result	Result	Result
EP075B: Polynuclear Aromatic Hydrocarbons - Continued								
Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
^ Sum of PAHs	----	0.5	mg/kg	<0.5	<0.5	<0.5	**4.3**	**21.3**
^ Benzo(a)pyrene TEQ (zero)	----	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
^ Benzo(a)pyrene TEQ (half LOR)	----	0.5	mg/kg	**0.6**	**0.6**	**0.6**	**0.6**	**0.8**
^ Benzo(a)pyrene TEQ (LOR)	----	0.5	mg/kg	**1.2**	**1.2**	**1.2**	**1.2**	**1.3**
EP075C: Phthalate Esters								
Dimethyl phthalate	131-11-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Diethyl phthalate	84-66-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Di-n-butyl phthalate	84-74-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Butyl benzyl phthalate	85-68-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
bis(2-ethylhexyl) phthalate	117-81-7	5.0	mg/kg	<5.0	<5.0	<5.0	<5.0	<5.0
Di-n-octylphthalate	117-84-0	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
EP075D: Nitrosamines								
N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodiethylamine	55-18-5	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosopyrrolidine	930-55-2	1.0	mg/kg	<1.0	<1.0	<1.0	<1.0	<1.0
N-Nitrosomorpholine	59-89-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosopiperidine	100-75-4	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodibutylamine	924-16-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	1.0	mg/kg	<1.0	<1.0	<1.0	<1.0	<1.0
Methapyrilene	91-80-5	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
EP075E: Nitroaromatics and Ketones								
2-Picoline	109-06-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Acetophenone	98-86-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Nitrobenzene	98-95-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Isophorone	78-59-1	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.6-Dinitrotoluene	606-20-2	1.0	mg/kg	<1.0	<1.0	<1.0	<1.0	<1.0
2.4-Dinitrotoluene	121-14-2	1.0	mg/kg	<1.0	<1.0	<1.0	<1.0	<1.0
1-Naphthylamine	134-32-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH02@2.50	MW02@1.00	MW02@6.00	BH06@0.50	BH06@2.40
			Client sampling date / time	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit	ES1838116-012	ES1838116-013	ES1838116-015	ES1838116-016	ES1838116-018
				Result	Result	Result	Result	Result
EP075E: Nitroaromatics and Ketones - Continued								
5-Nitro-o-toluidine	99-55-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Azobenzene	103-33-3	1	mg/kg	<1	<1	<1	<1	<1
1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Phenacetin	62-44-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
4-Aminobiphenyl	92-67-1	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Pentachloronitrobenzene	82-68-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Pronamide	23950-58-5	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Dimethylaminoazobenzene	60-11-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Chlorobenzilate	510-15-6	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
EP075F: Haloethers								
Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
EP075G: Chlorinated Hydrocarbons								
1.3-Dichlorobenzene	541-73-1	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
1.4-Dichlorobenzene	106-46-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	**0.8**
1.2-Dichlorobenzene	95-50-1	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Hexachloroethane	67-72-1	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Hexachloropropylene	1888-71-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorobutadiene	87-68-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg	<2.5	<2.5	<2.5	<2.5	<2.5
Pentachlorobenzene	608-93-5	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorobenzene (HCB)	118-74-1	1.0	mg/kg	<1.0	<1.0	<1.0	<1.0	<1.0
EP075H: Anilines and Benzidines								
Aniline	62-53-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
4-Chloroaniline	106-47-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2-Nitroaniline	88-74-4	1.0	mg/kg	<1.0	<1.0	<1.0	<1.0	<1.0
3-Nitroaniline	99-09-2	1.0	mg/kg	<1.0	<1.0	<1.0	<1.0	<1.0
Dibenzofuran	132-64-9	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
4-Nitroaniline	100-01-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Carbazole	86-74-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	**0.6**
3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH02@2.50	MW02@1.00	MW02@6.00	BH06@0.50	BH06@2.40
				Client sampling date / time	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-012	ES1838116-013	ES1838116-015	ES1838116-016	ES1838116-018
					Result	Result	Result	Result	Result
EP075(I): Organochlorine Pesticides									
alpha-BHC	319-84-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
beta-BHC	319-85-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
gamma-BHC	58-89-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
delta-BHC	319-86-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Heptachlor	76-44-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Aldrin	309-00-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Heptachlor epoxide	1024-57-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
alpha-Endosulfan	959-98-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4.4`-DDE	72-55-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dieldrin	60-57-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Endrin	72-20-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
beta-Endosulfan	33213-65-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4.4`-DDD	72-54-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Endosulfan sulfate	1031-07-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4.4`-DDT	50-29-3	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
EP075(J): Organophosphorus Pesticides									
Dichlorvos	62-73-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dimethoate	60-51-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Diazinon	333-41-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorpyrifos-methyl	5598-13-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Malathion	121-75-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Fenthion	55-38-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorpyrifos	2921-88-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pirimphos-ethyl	23505-41-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorfenvinphos	470-90-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Prothiofos	34643-46-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Ethion	563-12-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP080/071: Total Petroleum Hydrocarbons									
C6 - C9 Fraction	----	10	mg/kg		<10	<10	<10	<10	<10
C10 - C14 Fraction	----	50	mg/kg		<50	<50	<50	<50	<50
C15 - C28 Fraction	----	100	mg/kg		<100	<100	<100	**1120**	**160**
C29 - C36 Fraction	----	100	mg/kg		<100	<100	<100	**870**	**140**
^ C10 - C36 Fraction (sum)	----	50	mg/kg		<50	<50	<50	**1990**	**300**
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions									

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH02@2.50	MW02@1.00	MW02@6.00	BH06@0.50	BH06@2.40
				Client sampling date / time	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-012	ES1838116-013	ES1838116-015	ES1838116-016	ES1838116-018
					Result	Result	Result	Result	Result
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions - Continued									
C6 - C10 Fraction	C6_C10	10	mg/kg		<10	<10	<10	<10	<10
^ **C6 - C10 Fraction minus BTEX (F1)**	C6_C10-BTEX	10	mg/kg		<10	<10	<10	<10	<10
>C10 - C16 Fraction	----	50	mg/kg		<50	<50	<50	**170**	<50
>C16 - C34 Fraction	----	100	mg/kg		<100	<100	<100	**1670**	**270**
>C34 - C40 Fraction	----	100	mg/kg		<100	<100	<100	**440**	<100
^ **>C10 - C40 Fraction (sum)**	----	50	mg/kg		<50	<50	<50	**2280**	**270**
^ **>C10 - C16 Fraction minus Naphthalene (F2)**	----	50	mg/kg		<50	<50	<50	**170**	<50
EP080: BTEXN									
Benzene	71-43-2	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Toluene	108-88-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Ethylbenzene	100-41-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
ortho-Xylene	95-47-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
^ **Sum of BTEX**	----	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
^ **Total Xylenes**	----	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Naphthalene	91-20-3	1	mg/kg		<1	<1	<1	<1	<1
EP231A: Perfluoroalkyl Sulfonic Acids									
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg		----	----	----	**0.0005**	----
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg		----	----	----	<0.0002	----
EP231B: Perfluoroalkyl Carboxylic Acids									
Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg		----	----	----	<0.001	----
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg		----	----	----	<0.0002	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH02@2.50	MW02@1.00	MW02@6.00	BH06@0.50	BH06@2.40
				Client sampling date / time	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-012	ES1838116-013	ES1838116-015	ES1838116-016	ES1838116-018
					Result	Result	Result	Result	Result
EP231B: Perfluoroalkyl Carboxylic Acids - Continued									
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg		----	----	----	<0.0005	----
EP231C: Perfluoroalkyl Sulfonamides									
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg		----	----	----	<0.0002	----
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg		----	----	----	<0.0005	----
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg		----	----	----	<0.0005	----
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg		----	----	----	<0.0005	----
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg		----	----	----	<0.0005	----
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg		----	----	----	<0.0002	----
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg		----	----	----	<0.0002	----
EP231D: (n:2) Fluorotelomer Sulfonic Acids									
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg		----	----	----	<0.0005	----
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg		----	----	----	<0.0005	----
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg		----	----	----	<0.0005	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH02@2.50	MW02@1.00	MW02@6.00	BH06@0.50	BH06@2.40
				Client sampling date / time	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-012	ES1838116-013	ES1838116-015	ES1838116-016	ES1838116-018
					Result	Result	Result	Result	Result
EP231D: (n:2) Fluorotelomer Sulfonic Acids - Continued									
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg		----	----	----	<0.0005	----
EP231P: PFAS Sums									
Sum of PFAS	----	0.0002	mg/kg		----	----	----	0.0005	----
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	mg/kg		----	----	----	0.0005	----
Sum of PFAS (WA DER List)	----	0.0002	mg/kg		----	----	----	0.0005	----
EP066S: PCB Surrogate									
Decachlorobiphenyl	2051-24-3	0.1	%		97.1	128	109	100	99.0
EP068S: Organochlorine Pesticide Surrogate									
Dibromo-DDE	21655-73-2	0.05	%		90.6	115	91.2	70.6	71.9
EP068T: Organophosphorus Pesticide Surrogate									
DEF	78-48-8	0.05	%		82.4	114	86.9	112	119
EP074S: VOC Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.5	%		85.1	85.1	92.6	100	97.9
Toluene-D8	2037-26-5	0.5	%		94.5	94.2	101	111	113
4-Bromofluorobenzene	460-00-4	0.5	%		94.0	91.9	100.0	105	107
EP075S: Acid Extractable Surrogates									
2-Fluorophenol	367-12-4	0.5	%		82.8	88.7	81.8	89.3	91.6
Phenol-d6	13127-88-3	0.5	%		90.7	90.3	85.0	89.0	88.9
2-Chlorophenol-D4	93951-73-6	0.5	%		93.7	94.9	91.1	95.6	93.8
2.4.6-Tribromophenol	118-79-6	0.5	%		45.7	57.9	51.6	71.5	34.4
EP075T: Base/Neutral Extractable Surrogates									
Nitrobenzene-D5	4165-60-0	0.5	%		88.6	92.1	86.3	92.1	91.5
1.2-Dichlorobenzene-D4	2199-69-1	0.5	%		81.6	86.3	82.3	85.4	87.1
2-Fluorobiphenyl	321-60-8	0.5	%		112	109	107	107	107
Anthracene-d10	1719-06-8	0.5	%		100	98.9	96.3	92.8	91.8
4-Terphenyl-d14	1718-51-0	0.5	%		100	103	102	103	98.4
EP080S: TPH(V)/BTEX Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.2	%		85.2	85.0	92.8	99.8	98.0
Toluene-D8	2037-26-5	0.2	%		96.1	96.2	103	113	116
4-Bromofluorobenzene	460-00-4	0.2	%		93.5	91.6	100	104	104
EP231S: PFAS Surrogate									
13C4-PFOS	----	0.0002	%		----	----	----	85.5	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH02@2.50	MW02@1.00	MW02@6.00	BH06@0.50	BH06@2.40
				Client sampling date / time	[12-Dec-2018]	[12-Dec-2018]	[12-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-012	ES1838116-013	ES1838116-015	ES1838116-016	ES1838116-018
					Result	Result	Result	Result	Result
EP231S: PFAS Surrogate - Continued									
13C8-PFOA	----	0.0002	%		----	----	----	60.0	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH08@1.00	BH08@3.00	MW06@1.50	MW06@4.50	BH15@1.50
			Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]
Compound	CAS Number	LOR	Unit	ES1838116-020	ES1838116-021	ES1838116-023	ES1838116-025	ES1838116-028
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	----	1.0	%	11.2	22.2	17.5	23.9	6.9
EA200: AS 4964 - 2004 Identification of Asbestos in Soils								
Asbestos Detected	1332-21-4	0.1	g/kg	No	----	No	----	No
Asbestos Type	1332-21-4	-	--	-	----	-	----	-
Sample weight (dry)	----	0.01	g	282	----	339	----	242
APPROVED IDENTIFIER:	----	-	--	A.SMYLIE	----	A.SMYLIE	----	A.SMYLIE
EA200N: Asbestos Quantification (non-NATA)								
ø Asbestos (Fines and Fibrous <7mm)	1332-21-4	0.0004	g	<0.0004	----	<0.0004	----	<0.0004
ø Asbestos (Fines and Fibrous FA+AF)	----	0.001	% (w/w)	<0.001	----	<0.001	----	<0.001
ø Asbestos Containing Material	1332-21-4	0.1	g	<0.1	----	<0.1	----	<0.1
ø Asbestos Containing Material (as 15% Asbestos in ACM >7mm)	1332-21-4	0.01	% (w/w)	<0.01	----	<0.01	----	<0.01
ø Weight Used for % Calculation	----	0.0001	kg	0.282	----	0.339	----	0.242
EG005T: Total Metals by ICP-AES								
Arsenic	7440-38-2	5	mg/kg	22	9	<5	<5	<5
Cadmium	7440-43-9	1	mg/kg	6	<1	<1	<1	<1
Chromium	7440-47-3	2	mg/kg	39	10	<2	<2	32
Copper	7440-50-8	5	mg/kg	879	64	<5	<5	74
Lead	7439-92-1	5	mg/kg	1900	490	<5	<5	56
Nickel	7440-02-0	2	mg/kg	30	14	<2	<2	5
Zinc	7440-66-6	5	mg/kg	6030	849	7	14	304
EG035T: Total Recoverable Mercury by FIMS								
Mercury	7439-97-6	0.1	mg/kg	<0.1	<0.1	<0.1	<0.1	0.4
EP066: Polychlorinated Biphenyls (PCB)								
Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
EP068A: Organochlorine Pesticides (OC)								
alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
delta-BHC	319-86-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
Heptachlor	76-44-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
Aldrin	309-00-2	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH08@1.00	BH08@3.00	MW06@1.50	MW06@4.50	BH15@1.50
				Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-020	ES1838116-021	ES1838116-023	ES1838116-025	ES1838116-028
					Result	Result	Result	Result	Result
EP068A: Organochlorine Pesticides (OC) - Continued									
Heptachlor epoxide	1024-57-3	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
^ Total Chlordane (sum)	----	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
trans-Chlordane	5103-74-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
alpha-Endosulfan	959-98-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
cis-Chlordane	5103-71-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Dieldrin	60-57-1	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	**0.07**
4.4`-DDE	72-55-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Endrin	72-20-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
beta-Endosulfan	33213-65-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
^ Endosulfan (sum)	115-29-7	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
4.4`-DDD	72-54-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Endrin aldehyde	7421-93-4	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Endosulfan sulfate	1031-07-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
4.4`-DDT	50-29-3	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Endrin ketone	53494-70-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Methoxychlor	72-43-5	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
^ Sum of Aldrin + Dieldrin	309-00-2/60-57-1	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	**0.07**
^ Sum of DDD + DDE + DDT	72-54-8/72-55-9/50-29-3	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
EP068B: Organophosphorus Pesticides (OP)									
Dichlorvos	62-73-7	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Demeton-S-methyl	919-86-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Monocrotophos	6923-22-4	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Dimethoate	60-51-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Diazinon	333-41-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Parathion-methyl	298-00-0	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Malathion	121-75-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Fenthion	55-38-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Chlorpyrifos	2921-88-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Parathion	56-38-2	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Pirimphos-ethyl	23505-41-1	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Chlorfenvinphos	470-90-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Bromophos-ethyl	4824-78-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Fenamiphos	22224-92-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH08@1.00	BH08@3.00	MW06@1.50	MW06@4.50	BH15@1.50
				Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-020	ES1838116-021	ES1838116-023	ES1838116-025	ES1838116-028
					Result	Result	Result	Result	Result
EP068B: Organophosphorus Pesticides (OP) - Continued									
Prothiofos	34643-46-4	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Ethion	563-12-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Carbophenothion	786-19-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Azinphos Methyl	86-50-0	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
EP074A: Monocyclic Aromatic Hydrocarbons									
Benzene	71-43-2	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Toluene	108-88-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Ethylbenzene	100-41-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Styrene	100-42-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
ortho-Xylene	95-47-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Isopropylbenzene	98-82-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
n-Propylbenzene	103-65-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
sec-Butylbenzene	135-98-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
tert-Butylbenzene	98-06-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
p-Isopropyltoluene	99-87-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
n-Butylbenzene	104-51-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074B: Oxygenated Compounds									
Vinyl Acetate	108-05-4	5	mg/kg		<5	<5	<5	<5	<5
2-Butanone (MEK)	78-93-3	5	mg/kg		<5	<5	<5	<5	<5
4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg		<5	<5	<5	<5	<5
2-Hexanone (MBK)	591-78-6	5	mg/kg		<5	<5	<5	<5	<5
EP074C: Sulfonated Compounds									
Carbon disulfide	75-15-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074D: Fumigants									
2.2-Dichloropropane	594-20-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichloropropane	78-87-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074E: Halogenated Aliphatic Compounds									
Dichlorodifluoromethane	75-71-8	5	mg/kg		<5	<5	<5	<5	<5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH08@1.00	BH08@3.00	MW06@1.50	MW06@4.50	BH15@1.50
				Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-020	ES1838116-021	ES1838116-023	ES1838116-025	ES1838116-028
					Result	Result	Result	Result	Result
EP074E: Halogenated Aliphatic Compounds - Continued									
Chloromethane	74-87-3	5	mg/kg		<5	<5	<5	<5	<5
Vinyl chloride	75-01-4	5	mg/kg		<5	<5	<5	<5	<5
Bromomethane	74-83-9	5	mg/kg		<5	<5	<5	<5	<5
Chloroethane	75-00-3	5	mg/kg		<5	<5	<5	<5	<5
Trichlorofluoromethane	75-69-4	5	mg/kg		<5	<5	<5	<5	<5
1.1-Dichloroethene	75-35-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Iodomethane	74-88-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1-Dichloroethane	75-34-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.1-Trichloroethane	71-55-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1-Dichloropropylene	563-58-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Carbon Tetrachloride	56-23-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichloroethane	107-06-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Trichloroethene	79-01-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dibromomethane	74-95-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.2-Trichloroethane	79-00-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.3-Dichloropropane	142-28-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Tetrachloroethene	127-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.3-Trichloropropane	96-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pentachloroethane	76-01-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074F: Halogenated Aromatic Compounds									
Chlorobenzene	108-90-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bromobenzene	108-86-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Chlorotoluene	95-49-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chlorotoluene	106-43-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074G: Trihalomethanes									
Chloroform	67-66-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH08@1.00	BH08@3.00	MW06@1.50	MW06@4.50	BH15@1.50
			Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]
Compound	CAS Number	LOR	Unit	ES1838116-020	ES1838116-021	ES1838116-023	ES1838116-025	ES1838116-028
				Result	Result	Result	Result	Result
EP074G: Trihalomethanes - Continued								
Bromodichloromethane	75-27-4	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Dibromochloromethane	124-48-1	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Bromoform	75-25-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
EP075A: Phenolic Compounds								
Phenol	108-95-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2-Chlorophenol	95-57-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2-Methylphenol	95-48-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
3- & 4-Methylphenol	1319-77-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2-Nitrophenol	88-75-5	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.4-Dimethylphenol	105-67-9	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.4-Dichlorophenol	120-83-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.6-Dichlorophenol	87-65-0	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Pentachlorophenol	87-86-5	1	mg/kg	<1	<1	<1	<1	<1
EP075B: Polynuclear Aromatic Hydrocarbons								
Naphthalene	91-20-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2-Methylnaphthalene	91-57-6	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2-Chloronaphthalene	91-58-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Acenaphthylene	208-96-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Acenaphthene	83-32-9	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Fluorene	86-73-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Phenanthrene	85-01-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Anthracene	120-12-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Fluoranthene	206-44-0	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	**0.6**
Pyrene	129-00-0	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	**0.5**
N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Benz(a)anthracene	56-55-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Chrysene	218-01-9	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg	<1	<1	<1	<1	<1
7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Benzo(a)pyrene	50-32-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
3-Methylcholanthrene	56-49-5	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH08@1.00	BH08@3.00	MW06@1.50	MW06@4.50	BH15@1.50
				Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-020	ES1838116-021	ES1838116-023	ES1838116-025	ES1838116-028
					Result	Result	Result	Result	Result
EP075B: Polynuclear Aromatic Hydrocarbons - Continued									
Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
^ Sum of PAHs	----	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	1.1
^ Benzo(a)pyrene TEQ (zero)	----	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
^ Benzo(a)pyrene TEQ (half LOR)	----	0.5	mg/kg		0.6	0.6	0.6	0.6	0.6
^ Benzo(a)pyrene TEQ (LOR)	----	0.5	mg/kg		1.2	1.2	1.2	1.2	1.2
EP075C: Phthalate Esters									
Dimethyl phthalate	131-11-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Diethyl phthalate	84-66-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Di-n-butyl phthalate	84-74-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Butyl benzyl phthalate	85-68-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
bis(2-ethylhexyl) phthalate	117-81-7	5.0	mg/kg		<5.0	<5.0	<5.0	<5.0	<5.0
Di-n-octylphthalate	117-84-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075D: Nitrosamines									
N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodiethylamine	55-18-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosopyrrolidine	930-55-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
N-Nitrosomorpholine	59-89-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosopiperidine	100-75-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodibutylamine	924-16-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
Methapyrilene	91-80-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075E: Nitroaromatics and Ketones									
2-Picoline	109-06-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Acetophenone	98-86-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Nitrobenzene	98-95-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Isophorone	78-59-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.6-Dinitrotoluene	606-20-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
2.4-Dinitrotoluene	121-14-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
1-Naphthylamine	134-32-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH08@1.00	BH08@3.00	MW06@1.50	MW06@4.50	BH15@1.50
				Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-020	ES1838116-021	ES1838116-023	ES1838116-025	ES1838116-028
					Result	Result	Result	Result	Result
EP075E: Nitroaromatics and Ketones - Continued									
5-Nitro-o-toluidine	99-55-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Azobenzene	103-33-3	1	mg/kg		<1	<1	<1	<1	<1
1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Phenacetin	62-44-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Aminobiphenyl	92-67-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pentachloronitrobenzene	82-68-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pronamide	23950-58-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dimethylaminoazobenzene	60-11-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorobenzilate	510-15-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075F: Haloethers									
Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075G: Chlorinated Hydrocarbons									
1.3-Dichlorobenzene	541-73-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.4-Dichlorobenzene	106-46-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichlorobenzene	95-50-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachloroethane	67-72-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachloropropylene	1888-71-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorobutadiene	87-68-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg		<2.5	<2.5	<2.5	<2.5	<2.5
Pentachlorobenzene	608-93-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorobenzene (HCB)	118-74-1	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
EP075H: Anilines and Benzidines									
Aniline	62-53-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chloroaniline	106-47-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Nitroaniline	88-74-4	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
3-Nitroaniline	99-09-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
Dibenzofuran	132-64-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Nitroaniline	100-01-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Carbazole	86-74-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH08@1.00	BH08@3.00	MW06@1.50	MW06@4.50	BH15@1.50
			Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]
Compound	CAS Number	LOR	Unit	ES1838116-020	ES1838116-021	ES1838116-023	ES1838116-025	ES1838116-028
				Result	Result	Result	Result	Result
EP075(I): Organochlorine Pesticides								
alpha-BHC	319-84-6	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
beta-BHC	319-85-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
gamma-BHC	58-89-9	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
delta-BHC	319-86-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Heptachlor	76-44-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Aldrin	309-00-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Heptachlor epoxide	1024-57-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
alpha-Endosulfan	959-98-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
4.4`-DDE	72-55-9	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Dieldrin	60-57-1	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Endrin	72-20-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
beta-Endosulfan	33213-65-9	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
4.4`-DDD	72-54-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Endosulfan sulfate	1031-07-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
4.4`-DDT	50-29-3	1.0	mg/kg	<1.0	<1.0	<1.0	<1.0	<1.0
EP075(J): Organophosphorus Pesticides								
Dichlorvos	62-73-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Dimethoate	60-51-5	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Diazinon	333-41-5	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Chlorpyrifos-methyl	5598-13-0	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Malathion	121-75-5	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Fenthion	55-38-9	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Chlorpyrifos	2921-88-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Pirimphos-ethyl	23505-41-1	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Chlorfenvinphos	470-90-6	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Prothiofos	34643-46-4	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Ethion	563-12-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
EP080/071: Total Petroleum Hydrocarbons								
C6 - C9 Fraction	----	10	mg/kg	<10	<10	<10	<10	<10
C10 - C14 Fraction	----	50	mg/kg	<50	<50	<50	<50	<50
C15 - C28 Fraction	----	100	mg/kg	**150**	<100	<100	<100	<100
C29 - C36 Fraction	----	100	mg/kg	**380**	<100	<100	<100	<100
^ C10 - C36 Fraction (sum)	----	50	mg/kg	**530**	<50	<50	<50	<50
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions								

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH08@1.00	BH08@3.00	MW06@1.50	MW06@4.50	BH15@1.50
				Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-020	ES1838116-021	ES1838116-023	ES1838116-025	ES1838116-028
					Result	Result	Result	Result	Result
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions - Continued									
C6 - C10 Fraction	C6_C10	10	mg/kg		<10	<10	<10	<10	<10
^ **C6 - C10 Fraction minus BTEX (F1)**	C6_C10-BTEX	10	mg/kg		<10	<10	<10	<10	<10
>C10 - C16 Fraction	----	50	mg/kg		<50	<50	<50	<50	<50
>C16 - C34 Fraction	----	100	mg/kg		**430**	<100	<100	<100	<100
>C34 - C40 Fraction	----	100	mg/kg		**330**	<100	<100	<100	<100
^ **>C10 - C40 Fraction (sum)**	----	50	mg/kg		**760**	<50	<50	<50	<50
^ **>C10 - C16 Fraction minus Naphthalene (F2)**	----	50	mg/kg		<50	<50	<50	<50	<50
EP080: BTEXN									
Benzene	71-43-2	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Toluene	108-88-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Ethylbenzene	100-41-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
ortho-Xylene	95-47-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
^ **Sum of BTEX**	----	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
^ **Total Xylenes**	----	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Naphthalene	91-20-3	1	mg/kg		<1	<1	<1	<1	<1
EP231A: Perfluoroalkyl Sulfonic Acids									
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg		----	----	----	**0.0004**	----
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg		----	----	----	<0.0002	----
EP231B: Perfluoroalkyl Carboxylic Acids									
Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg		----	----	----	<0.001	----
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg		----	----	----	<0.0002	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH08@1.00	BH08@3.00	MW06@1.50	MW06@4.50	BH15@1.50
				Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-020	ES1838116-021	ES1838116-023	ES1838116-025	ES1838116-028
					Result	Result	Result	Result	Result
EP231B: Perfluoroalkyl Carboxylic Acids - Continued									
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg		----	----	----	<0.0005	----
EP231C: Perfluoroalkyl Sulfonamides									
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg		----	----	----	<0.0002	----
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg		----	----	----	<0.0005	----
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg		----	----	----	<0.0005	----
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg		----	----	----	<0.0005	----
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg		----	----	----	<0.0005	----
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg		----	----	----	<0.0002	----
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg		----	----	----	<0.0002	----
EP231D: (n:2) Fluorotelomer Sulfonic Acids									
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg		----	----	----	<0.0005	----
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg		----	----	----	<0.0005	----
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg		----	----	----	<0.0005	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH08@1.00	BH08@3.00	MW06@1.50	MW06@4.50	BH15@1.50
				Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-020	ES1838116-021	ES1838116-023	ES1838116-025	ES1838116-028
					Result	Result	Result	Result	Result
EP231D: (n:2) Fluorotelomer Sulfonic Acids - Continued									
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg		----	----	----	<0.0005	----
EP231P: PFAS Sums									
Sum of PFAS	----	0.0002	mg/kg		----	----	----	0.0004	----
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	mg/kg		----	----	----	0.0004	----
Sum of PFAS (WA DER List)	----	0.0002	mg/kg		----	----	----	0.0004	----
EP066S: PCB Surrogate									
Decachlorobiphenyl	2051-24-3	0.1	%		98.0	114	110	111	100
EP068S: Organochlorine Pesticide Surrogate									
Dibromo-DDE	21655-73-2	0.05	%		90.9	99.5	98.2	118	102
EP068T: Organophosphorus Pesticide Surrogate									
DEF	78-48-8	0.05	%		115	102	73.1	89.9	101
EP074S: VOC Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.5	%		97.3	92.3	83.4	82.6	90.5
Toluene-D8	2037-26-5	0.5	%		99.9	45.0	89.2	85.5	96.8
4-Bromofluorobenzene	460-00-4	0.5	%		86.6	27.3	94.4	91.1	97.8
EP075S: Acid Extractable Surrogates									
2-Fluorophenol	367-12-4	0.5	%		85.1	67.8	85.3	92.5	91.0
Phenol-d6	13127-88-3	0.5	%		83.2	74.0	91.0	94.0	92.9
2-Chlorophenol-D4	93951-73-6	0.5	%		91.6	66.3	92.3	100	98.5
2.4.6-Tribromophenol	118-79-6	0.5	%		61.8	23.7	41.2	41.9	55.5
EP075T: Base/Neutral Extractable Surrogates									
Nitrobenzene-D5	4165-60-0	0.5	%		92.6	65.9	89.9	94.2	96.6
1.2-Dichlorobenzene-D4	2199-69-1	0.5	%		90.1	75.1	81.9	91.6	91.4
2-Fluorobiphenyl	321-60-8	0.5	%		106	67.3	112	108	108
Anthracene-d10	1719-06-8	0.5	%		86.0	36.6	102	97.8	97.2
4-Terphenyl-d14	1718-51-0	0.5	%		93.0	53.8	98.0	96.4	99.9
EP080S: TPH(V)/BTEX Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.2	%		96.5	92.5	83.4	82.7	89.7
Toluene-D8	2037-26-5	0.2	%		102	46.0	91.3	87.0	98.4
4-Bromofluorobenzene	460-00-4	0.2	%		85.7	27.1	93.0	86.9	95.3
EP231S: PFAS Surrogate									
13C4-PFOS	----	0.0002	%		----	----	----	78.5	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH08@1.00	BH08@3.00	MW06@1.50	MW06@4.50	BH15@1.50
				Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-020	ES1838116-021	ES1838116-023	ES1838116-025	ES1838116-028
					Result	Result	Result	Result	Result
EP231S: PFAS Surrogate - Continued									
13C8-PFOA	----	0.0002	%		----	----	----	69.0	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH12@1.00	BH24@1.50	BH24@4.50	BH19@0.40	BH16@0.50
			Client sampling date / time	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit	ES1838116-031	ES1838116-035	ES1838116-037	ES1838116-038	ES1838116-040
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	----	1.0	%	18.1	1.4	18.8	5.7	4.6
EA200: AS 4964 - 2004 Identification of Asbestos in Soils								
Asbestos Detected	1332-21-4	0.1	g/kg	No	No	----	No	No
Asbestos (Trace)	1332-21-4	5	Fibres	----	No	----	----	----
Asbestos Type	1332-21-4	-	--	-	-	----	-	-
Sample weight (dry)	----	0.01	g	241	37.5	----	137	199
APPROVED IDENTIFIER:	----	-	--	C.OWLER	A. SMYLIE	----	C.OWLER	C.OWLER
EA200N: Asbestos Quantification (non-NATA)								
ø Asbestos (Fines and Fibrous <7mm)	1332-21-4	0.0004	g	<0.0004	----	----	<0.0004	<0.0004
ø Asbestos (Fines and Fibrous FA+AF)	----	0.001	% (w/w)	<0.001	----	----	<0.001	<0.001
ø Asbestos Containing Material	1332-21-4	0.1	g	<0.1	----	----	<0.1	<0.1
ø Asbestos Containing Material (as 15% Asbestos in ACM >7mm)	1332-21-4	0.01	% (w/w)	<0.01	----	----	<0.01	<0.01
ø Weight Used for % Calculation	----	0.0001	kg	0.241	----	----	0.137	0.199
EG005T: Total Metals by ICP-AES								
Arsenic	7440-38-2	5	mg/kg	6	<5	<5	<5	<5
Cadmium	7440-43-9	1	mg/kg	<1	<1	<1	<1	<1
Chromium	7440-47-3	2	mg/kg	11	<2	<2	12	3
Copper	7440-50-8	5	mg/kg	24	<5	<5	51	24
Lead	7439-92-1	5	mg/kg	48	<5	<5	59	115
Nickel	7440-02-0	2	mg/kg	3	<2	<2	16	2
Zinc	7440-66-6	5	mg/kg	24	16	9	88	172
EG035T: Total Recoverable Mercury by FIMS								
Mercury	7439-97-6	0.1	mg/kg	<0.1	<0.1	<0.1	0.2	<0.1
EP066: Polychlorinated Biphenyls (PCB)								
Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
EP068A: Organochlorine Pesticides (OC)								
alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
delta-BHC	319-86-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
Heptachlor	76-44-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH12@1.00	BH24@1.50	BH24@4.50	BH19@0.40	BH16@0.50
				Client sampling date / time	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-031	ES1838116-035	ES1838116-037	ES1838116-038	ES1838116-040
					Result	Result	Result	Result	Result
EP068A: Organochlorine Pesticides (OC) - Continued									
Aldrin	309-00-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Heptachlor epoxide	1024-57-3	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
^ Total Chlordane (sum)	----	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
trans-Chlordane	5103-74-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
alpha-Endosulfan	959-98-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
cis-Chlordane	5103-71-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Dieldrin	60-57-1	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	**0.11**
4.4`-DDE	72-55-9	0.05	mg/kg		<0.05	<0.05	<0.05	**0.33**	<0.05
Endrin	72-20-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
beta-Endosulfan	33213-65-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
^ Endosulfan (sum)	115-29-7	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
4.4`-DDD	72-54-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Endrin aldehyde	7421-93-4	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Endosulfan sulfate	1031-07-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
4.4`-DDT	50-29-3	0.2	mg/kg		<0.2	<0.2	<0.2	<1.0	<0.2
Endrin ketone	53494-70-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Methoxychlor	72-43-5	0.2	mg/kg		<0.2	<0.2	<0.2	<1.0	<0.2
^ Sum of Aldrin + Dieldrin	309-00-2/60-57-1	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	**0.11**
^ Sum of DDD + DDE + DDT	72-54-8/72-55-9/50-2	0.05	mg/kg		<0.05	<0.05	<0.05	**0.33**	<0.05
EP068B: Organophosphorus Pesticides (OP)									
Dichlorvos	62-73-7	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Demeton-S-methyl	919-86-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Monocrotophos	6923-22-4	0.2	mg/kg		<0.2	<0.2	<0.2	<1.0	<0.2
Dimethoate	60-51-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Diazinon	333-41-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Parathion-methyl	298-00-0	0.2	mg/kg		<0.2	<0.2	<0.2	<1.0	<0.2
Malathion	121-75-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Fenthion	55-38-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Chlorpyrifos	2921-88-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Parathion	56-38-2	0.2	mg/kg		<0.2	<0.2	<0.2	<1.0	<0.2
Pirimphos-ethyl	23505-41-1	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Chlorfenvinphos	470-90-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Bromophos-ethyl	4824-78-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH12@1.00	BH24@1.50	BH24@4.50	BH19@0.40	BH16@0.50
				Client sampling date / time	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-031	ES1838116-035	ES1838116-037	ES1838116-038	ES1838116-040
					Result	Result	Result	Result	Result
EP068B: Organophosphorus Pesticides (OP) - Continued									
Fenamiphos	22224-92-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Prothiofos	34643-46-4	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Ethion	563-12-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Carbophenothion	786-19-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Azinphos Methyl	86-50-0	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
EP074A: Monocyclic Aromatic Hydrocarbons									
Benzene	71-43-2	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Toluene	108-88-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Ethylbenzene	100-41-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Styrene	100-42-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
ortho-Xylene	95-47-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Isopropylbenzene	98-82-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
n-Propylbenzene	103-65-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
sec-Butylbenzene	135-98-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
tert-Butylbenzene	98-06-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
p-Isopropyltoluene	99-87-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
n-Butylbenzene	104-51-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074B: Oxygenated Compounds									
Vinyl Acetate	108-05-4	5	mg/kg		<5	<5	<5	<5	<5
2-Butanone (MEK)	78-93-3	5	mg/kg		<5	<5	<5	<5	<5
4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg		<5	<5	<5	<5	<5
2-Hexanone (MBK)	591-78-6	5	mg/kg		<5	<5	<5	<5	<5
EP074C: Sulfonated Compounds									
Carbon disulfide	75-15-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074D: Fumigants									
2.2-Dichloropropane	594-20-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichloropropane	78-87-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074E: Halogenated Aliphatic Compounds									

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH12@1.00	BH24@1.50	BH24@4.50	BH19@0.40	BH16@0.50
				Client sampling date / time	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-031	ES1838116-035	ES1838116-037	ES1838116-038	ES1838116-040
					Result	Result	Result	Result	Result
EP074E: Halogenated Aliphatic Compounds - Continued									
Dichlorodifluoromethane	75-71-8	5	mg/kg		<5	<5	<5	<5	<5
Chloromethane	74-87-3	5	mg/kg		<5	<5	<5	<5	<5
Vinyl chloride	75-01-4	5	mg/kg		<5	<5	<5	<5	<5
Bromomethane	74-83-9	5	mg/kg		<5	<5	<5	<5	<5
Chloroethane	75-00-3	5	mg/kg		<5	<5	<5	<5	<5
Trichlorofluoromethane	75-69-4	5	mg/kg		<5	<5	<5	<5	<5
1.1-Dichloroethene	75-35-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Iodomethane	74-88-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1-Dichloroethane	75-34-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.1-Trichloroethane	71-55-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1-Dichloropropylene	563-58-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Carbon Tetrachloride	56-23-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichloroethane	107-06-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Trichloroethene	79-01-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dibromomethane	74-95-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.2-Trichloroethane	79-00-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.3-Dichloropropane	142-28-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Tetrachloroethene	127-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.3-Trichloropropane	96-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pentachloroethane	76-01-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074F: Halogenated Aromatic Compounds									
Chlorobenzene	108-90-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bromobenzene	108-86-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Chlorotoluene	95-49-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chlorotoluene	106-43-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074G: Trihalomethanes									

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH12@1.00	BH24@1.50	BH24@4.50	BH19@0.40	BH16@0.50
			Client sampling date / time	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit	ES1838116-031	ES1838116-035	ES1838116-037	ES1838116-038	ES1838116-040
				Result	Result	Result	Result	Result
EP074G: Trihalomethanes - Continued								
Chloroform	67-66-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Bromodichloromethane	75-27-4	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Dibromochloromethane	124-48-1	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Bromoform	75-25-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
EP075A: Phenolic Compounds								
Phenol	108-95-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2-Chlorophenol	95-57-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2-Methylphenol	95-48-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
3- & 4-Methylphenol	1319-77-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2-Nitrophenol	88-75-5	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.4-Dimethylphenol	105-67-9	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.4-Dichlorophenol	120-83-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.6-Dichlorophenol	87-65-0	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Pentachlorophenol	87-86-5	1	mg/kg	<1	<1	<1	<1	<1
EP075B: Polynuclear Aromatic Hydrocarbons								
Naphthalene	91-20-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	**0.5**
2-Methylnaphthalene	91-57-6	0.5	mg/kg	<0.5	<0.5	<0.5	**0.5**	<0.5
2-Chloronaphthalene	91-58-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Acenaphthylene	208-96-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	**0.6**
Acenaphthene	83-32-9	0.5	mg/kg	<0.5	<0.5	<0.5	**2.8**	<0.5
Fluorene	86-73-7	0.5	mg/kg	<0.5	<0.5	<0.5	**3.6**	**0.6**
Phenanthrene	85-01-8	0.5	mg/kg	**3.3**	<0.5	<0.5	**24.6**	**4.0**
Anthracene	120-12-7	0.5	mg/kg	**0.8**	<0.5	<0.5	**7.7**	**1.1**
Fluoranthene	206-44-0	0.5	mg/kg	**4.5**	<0.5	<0.5	**21.5**	**5.9**
Pyrene	129-00-0	0.5	mg/kg	**4.5**	<0.5	<0.5	**21.5**	**6.0**
N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Benz(a)anthracene	56-55-3	0.5	mg/kg	**1.6**	<0.5	<0.5	**9.2**	**2.6**
Chrysene	218-01-9	0.5	mg/kg	**1.4**	<0.5	<0.5	**7.5**	**2.2**
Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg	**2**	<1	<1	**10**	**4**
7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Benzo(a)pyrene	50-32-8	0.5	mg/kg	**1.2**	<0.5	<0.5	**6.2**	**2.3**

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH12@1.00	BH24@1.50	BH24@4.50	BH19@0.40	BH16@0.50
				Client sampling date / time	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-031	ES1838116-035	ES1838116-037	ES1838116-038	ES1838116-040
					Result	Result	Result	Result	Result
EP075B: Polynuclear Aromatic Hydrocarbons - Continued									
3-Methylcholanthrene	56-49-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg		<0.5	<0.5	<0.5	**2.1**	**0.9**
Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg		<0.5	<0.5	<0.5	**0.6**	<0.5
Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg		**0.6**	<0.5	<0.5	**2.4**	**1.0**
^ Sum of PAHs	----	0.5	mg/kg		**19.9**	<0.5	<0.5	**120**	**31.7**
^ Benzo(a)pyrene TEQ (zero)	----	0.5	mg/kg		**1.6**	<0.5	<0.5	**9.0**	**3.1**
^ Benzo(a)pyrene TEQ (half LOR)	----	0.5	mg/kg		**1.8**	**0.6**	**0.6**	**9.0**	**3.3**
^ Benzo(a)pyrene TEQ (LOR)	----	0.5	mg/kg		**2.1**	**1.2**	**1.2**	**9.0**	**3.6**
EP075C: Phthalate Esters									
Dimethyl phthalate	131-11-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Diethyl phthalate	84-66-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Di-n-butyl phthalate	84-74-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Butyl benzyl phthalate	85-68-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
bis(2-ethylhexyl) phthalate	117-81-7	5.0	mg/kg		<5.0	<5.0	<5.0	<5.0	<5.0
Di-n-octylphthalate	117-84-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075D: Nitrosamines									
N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodiethylamine	55-18-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosopyrrolidine	930-55-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
N-Nitrosomorpholine	59-89-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosopiperidine	100-75-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodibutylamine	924-16-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
Methapyrilene	91-80-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075E: Nitroaromatics and Ketones									
2-Picoline	109-06-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Acetophenone	98-86-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Nitrobenzene	98-95-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Isophorone	78-59-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.6-Dinitrotoluene	606-20-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
2.4-Dinitrotoluene	121-14-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
1-Naphthylamine	134-32-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH12@1.00	BH24@1.50	BH24@4.50	BH19@0.40	BH16@0.50
				Client sampling date / time	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-031	ES1838116-035	ES1838116-037	ES1838116-038	ES1838116-040
					Result	Result	Result	Result	Result
EP075E: Nitroaromatics and Ketones - Continued									
4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
5-Nitro-o-toluidine	99-55-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Azobenzene	103-33-3	1	mg/kg		<1	<1	<1	<1	<1
1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Phenacetin	62-44-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Aminobiphenyl	92-67-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pentachloronitrobenzene	82-68-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pronamide	23950-58-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dimethylaminoazobenzene	60-11-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorobenzilate	510-15-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075F: Haloethers									
Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075G: Chlorinated Hydrocarbons									
1.3-Dichlorobenzene	541-73-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.4-Dichlorobenzene	106-46-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichlorobenzene	95-50-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachloroethane	67-72-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachloropropylene	1888-71-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorobutadiene	87-68-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg		<2.5	<2.5	<2.5	<2.5	<2.5
Pentachlorobenzene	608-93-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorobenzene (HCB)	118-74-1	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
EP075H: Anilines and Benzidines									
Aniline	62-53-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chloroaniline	106-47-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Nitroaniline	88-74-4	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
3-Nitroaniline	99-09-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
Dibenzofuran	132-64-9	0.5	mg/kg		<0.5	<0.5	<0.5	**2.0**	<0.5
4-Nitroaniline	100-01-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Carbazole	86-74-8	0.5	mg/kg		<0.5	<0.5	<0.5	**0.7**	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH12@1.00	BH24@1.50	BH24@4.50	BH19@0.40	BH16@0.50
				Client sampling date / time	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-031	ES1838116-035	ES1838116-037	ES1838116-038	ES1838116-040
					Result	Result	Result	Result	Result
EP075H: Anilines and Benzidines - Continued									
3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075I: Organochlorine Pesticides									
alpha-BHC	319-84-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
beta-BHC	319-85-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
gamma-BHC	58-89-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
delta-BHC	319-86-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Heptachlor	76-44-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Aldrin	309-00-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Heptachlor epoxide	1024-57-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
alpha-Endosulfan	959-98-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4.4`-DDE	72-55-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dieldrin	60-57-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Endrin	72-20-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
beta-Endosulfan	33213-65-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4.4`-DDD	72-54-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Endosulfan sulfate	1031-07-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4.4`-DDT	50-29-3	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
EP075J: Organophosphorus Pesticides									
Dichlorvos	62-73-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dimethoate	60-51-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Diazinon	333-41-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorpyrifos-methyl	5598-13-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Malathion	121-75-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Fenthion	55-38-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorpyrifos	2921-88-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pirimphos-ethyl	23505-41-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorfenvinphos	470-90-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Prothiofos	34643-46-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Ethion	563-12-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP080/071: Total Petroleum Hydrocarbons									
C6 - C9 Fraction	----	10	mg/kg		<10	<10	<10	<10	<10
C10 - C14 Fraction	----	50	mg/kg		<50	<50	<50	<50	<50
C15 - C28 Fraction	----	100	mg/kg		<100	<100	<100	**420**	**100**
C29 - C36 Fraction	----	100	mg/kg		<100	<100	<100	**230**	<100

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH12@1.00	BH24@1.50	BH24@4.50	BH19@0.40	BH16@0.50
				Client sampling date / time	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-031	ES1838116-035	ES1838116-037	ES1838116-038	ES1838116-040
					Result	Result	Result	Result	Result
EP080/071: Total Petroleum Hydrocarbons - Continued									
^ C10 - C36 Fraction (sum)	----	50	mg/kg		<50	<50	<50	**650**	**100**
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions									
C6 - C10 Fraction	C6_C10	10	mg/kg		<10	<10	<10	<10	<10
^ C6 - C10 Fraction minus BTEX (F1)	C6_C10-BTEX	10	mg/kg		<10	<10	<10	<10	<10
>C10 - C16 Fraction	----	50	mg/kg		<50	<50	<50	<50	<50
>C16 - C34 Fraction	----	100	mg/kg		**130**	<100	<100	**600**	**150**
>C34 - C40 Fraction	----	100	mg/kg		<100	<100	<100	**120**	<100
^ >C10 - C40 Fraction (sum)	----	50	mg/kg		**130**	<50	<50	**720**	**150**
^ >C10 - C16 Fraction minus Naphthalene (F2)	----	50	mg/kg		<50	<50	<50	<50	<50
EP080: BTEXN									
Benzene	71-43-2	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Toluene	108-88-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Ethylbenzene	100-41-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
ortho-Xylene	95-47-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
^ Sum of BTEX	----	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
^ Total Xylenes	----	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Naphthalene	91-20-3	1	mg/kg		<1	<1	<1	<1	**3**
EP231A: Perfluoroalkyl Sulfonic Acids									
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg		----	----	----	**0.0003**	----
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg		----	----	----	<0.0002	----
EP231B: Perfluoroalkyl Carboxylic Acids									
Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg		----	----	----	<0.001	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH12@1.00	BH24@1.50	BH24@4.50	BH19@0.40	BH16@0.50
				Client sampling date / time	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-031	ES1838116-035	ES1838116-037	ES1838116-038	ES1838116-040
					Result	Result	Result	Result	Result
EP231B: Perfluoroalkyl Carboxylic Acids - Continued									
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg		----	----	----	<0.0005	----
EP231C: Perfluoroalkyl Sulfonamides									
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg		----	----	----	<0.0002	----
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg		----	----	----	<0.0005	----
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg		----	----	----	<0.0005	----
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg		----	----	----	<0.0005	----
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg		----	----	----	<0.0005	----
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg		----	----	----	<0.0002	----
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg		----	----	----	<0.0002	----
EP231D: (n:2) Fluorotelomer Sulfonic Acids									
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg		----	----	----	<0.0005	----
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg		----	----	----	<0.0005	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH12@1.00	BH24@1.50	BH24@4.50	BH19@0.40	BH16@0.50
				Client sampling date / time	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-031	ES1838116-035	ES1838116-037	ES1838116-038	ES1838116-040
					Result	Result	Result	Result	Result
EP231D: (n:2) Fluorotelomer Sulfonic Acids - Continued									
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg		----	----	----	<0.0005	----
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg		----	----	----	<0.0005	----
EP231P: PFAS Sums									
Sum of PFAS	----	0.0002	mg/kg		----	----	----	0.0003	----
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	mg/kg		----	----	----	0.0003	----
Sum of PFAS (WA DER List)	----	0.0002	mg/kg		----	----	----	0.0003	----
EP066S: PCB Surrogate									
Decachlorobiphenyl	2051-24-3	0.1	%		92.0	104	128	110	116
EP068S: Organochlorine Pesticide Surrogate									
Dibromo-DDE	21655-73-2	0.05	%		92.6	108	117	123	78.9
EP068T: Organophosphorus Pesticide Surrogate									
DEF	78-48-8	0.05	%		111	91.9	88.8	107	82.4
EP074S: VOC Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.5	%		91.5	94.6	88.1	95.1	98.8
Toluene-D8	2037-26-5	0.5	%		77.1	102	94.5	102	104
4-Bromofluorobenzene	460-00-4	0.5	%		56.7	103	96.7	102	106
EP075S: Acid Extractable Surrogates									
2-Fluorophenol	367-12-4	0.5	%		89.4	89.8	92.9	93.8	96.4
Phenol-d6	13127-88-3	0.5	%		87.4	90.9	92.9	95.6	96.8
2-Chlorophenol-D4	93951-73-6	0.5	%		93.9	95.4	97.5	105	102
2.4.6-Tribromophenol	118-79-6	0.5	%		44.6	45.1	33.8	61.6	45.7
EP075T: Base/Neutral Extractable Surrogates									
Nitrobenzene-D5	4165-60-0	0.5	%		86.6	92.9	92.7	97.6	97.0
1.2-Dichlorobenzene-D4	2199-69-1	0.5	%		85.3	94.8	91.1	92.6	95.9
2-Fluorobiphenyl	321-60-8	0.5	%		105	105	104	110	107
Anthracene-d10	1719-06-8	0.5	%		80.4	97.1	96.4	94.4	97.3
4-Terphenyl-d14	1718-51-0	0.5	%		88.4	96.6	93.7	100	99.3
EP080S: TPH(V)/BTEX Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.2	%		91.5	94.6	88.3	95.1	98.8
Toluene-D8	2037-26-5	0.2	%		78.4	104	95.9	104	106
4-Bromofluorobenzene	460-00-4	0.2	%		55.7	100	94.1	100.0	104

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH12@1.00	BH24@1.50	BH24@4.50	BH19@0.40	BH16@0.50
				Client sampling date / time	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[13-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-031	ES1838116-035	ES1838116-037	ES1838116-038	ES1838116-040
					Result	Result	Result	Result	Result
EP231S: PFAS Surrogate									
13C4-PFOS	----	0.0002	%		**----**	**----**	**----**	**82.0**	**----**
13C8-PFOA	----	0.0002	%		**----**	**----**	**----**	**81.5**	**----**

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH16@3.00	BH18@1.00	BH18@3.00	BH17@1.50	BH10@.020
			Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit	ES1838116-043	ES1838116-045	ES1838116-047	ES1838116-049	ES1838116-052
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	----	1.0	%	21.1	39.1	23.0	13.0	5.4
EA200: AS 4964 - 2004 Identification of Asbestos in Soils								
Asbestos Detected	1332-21-4	0.1	g/kg	----	No	----	No	No
Asbestos Type	1332-21-4	-	--	----	-	----	-	-
Sample weight (dry)	----	0.01	g	----	102	----	210	177
APPROVED IDENTIFIER:	----	-	--	----	C.OWLER	----	C.OWLER	C.OWLER
EA200N: Asbestos Quantification (non-NATA)								
ø Asbestos (Fines and Fibrous <7mm)	1332-21-4	0.0004	g	----	<0.0004	----	<0.0004	<0.0004
ø Asbestos (Fines and Fibrous FA+AF)	----	0.001	% (w/w)	----	<0.001	----	<0.001	<0.001
ø Asbestos Containing Material	1332-21-4	0.1	g	----	<0.1	----	<0.1	<0.1
ø Asbestos Containing Material (as 15% Asbestos in ACM >7mm)	1332-21-4	0.01	% (w/w)	----	<0.01	----	<0.01	<0.01
ø Weight Used for % Calculation	----	0.0001	kg	----	0.102	----	0.210	0.177
EG005T: Total Metals by ICP-AES								
Arsenic	7440-38-2	5	mg/kg	<5	<5	14	11	<5
Cadmium	7440-43-9	1	mg/kg	<1	<1	<1	1	<1
Chromium	7440-47-3	2	mg/kg	15	29	4	15	7
Copper	7440-50-8	5	mg/kg	6	14	<5	34	28
Lead	7439-92-1	5	mg/kg	16	13	<5	50	39
Nickel	7440-02-0	2	mg/kg	<2	14	<2	11	78
Zinc	7440-66-6	5	mg/kg	47	95	51	68	72
EG035T: Total Recoverable Mercury by FIMS								
Mercury	7439-97-6	0.1	mg/kg	0.1	<0.1	<0.1	<0.1	<0.1
EP066: Polychlorinated Biphenyls (PCB)								
Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
EP068A: Organochlorine Pesticides (OC)								
alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
delta-BHC	319-86-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
Heptachlor	76-44-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
Aldrin	309-00-2	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH16@3.00	BH18@1.00	BH18@3.00	BH17@1.50	BH10@.020
				Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-043	ES1838116-045	ES1838116-047	ES1838116-049	ES1838116-052
					Result	Result	Result	Result	Result
EP068A: Organochlorine Pesticides (OC) - Continued									
Heptachlor epoxide	1024-57-3	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
^ Total Chlordane (sum)	----	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
trans-Chlordane	5103-74-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
alpha-Endosulfan	959-98-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
cis-Chlordane	5103-71-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Dieldrin	60-57-1	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	**0.11**
4.4`-DDE	72-55-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Endrin	72-20-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
beta-Endosulfan	33213-65-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
^ Endosulfan (sum)	115-29-7	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
4.4`-DDD	72-54-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Endrin aldehyde	7421-93-4	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Endosulfan sulfate	1031-07-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
4.4`-DDT	50-29-3	0.2	mg/kg		<0.2	<0.2	<0.2	<1.0	<0.2
Endrin ketone	53494-70-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Methoxychlor	72-43-5	0.2	mg/kg		<0.2	<0.2	<0.2	<1.0	<0.2
^ Sum of Aldrin + Dieldrin	309-00-2/60-57-1	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	**0.11**
^ Sum of DDD + DDE + DDT	72-54-8/72-55-9/50-29-3	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
EP068B: Organophosphorus Pesticides (OP)									
Dichlorvos	62-73-7	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Demeton-S-methyl	919-86-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Monocrotophos	6923-22-4	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Dimethoate	60-51-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Diazinon	333-41-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Parathion-methyl	298-00-0	0.2	mg/kg		<0.2	<0.2	<0.2	<1.0	<0.2
Malathion	121-75-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Fenthion	55-38-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Chlorpyrifos	2921-88-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Parathion	56-38-2	0.2	mg/kg		<0.2	<0.2	<0.2	<1.0	<0.2
Pirimphos-ethyl	23505-41-1	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Chlorfenvinphos	470-90-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Bromophos-ethyl	4824-78-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Fenamiphos	22224-92-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH16@3.00	BH18@1.00	BH18@3.00	BH17@1.50	BH10@.020
				Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-043	ES1838116-045	ES1838116-047	ES1838116-049	ES1838116-052
					Result	Result	Result	Result	Result
EP068B: Organophosphorus Pesticides (OP) - Continued									
Prothiofos	34643-46-4	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Ethion	563-12-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Carbophenothion	786-19-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
Azinphos Methyl	86-50-0	0.05	mg/kg		<0.05	<0.05	<0.05	<0.25	<0.05
EP074A: Monocyclic Aromatic Hydrocarbons									
Benzene	71-43-2	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Toluene	108-88-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Ethylbenzene	100-41-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Styrene	100-42-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
ortho-Xylene	95-47-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Isopropylbenzene	98-82-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
n-Propylbenzene	103-65-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
sec-Butylbenzene	135-98-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
tert-Butylbenzene	98-06-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
p-Isopropyltoluene	99-87-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
n-Butylbenzene	104-51-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074B: Oxygenated Compounds									
Vinyl Acetate	108-05-4	5	mg/kg		<5	<5	<5	<5	<5
2-Butanone (MEK)	78-93-3	5	mg/kg		<5	<5	<5	<5	<5
4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg		<5	<5	<5	<5	<5
2-Hexanone (MBK)	591-78-6	5	mg/kg		<5	<5	<5	<5	<5
EP074C: Sulfonated Compounds									
Carbon disulfide	75-15-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074D: Fumigants									
2.2-Dichloropropane	594-20-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichloropropane	78-87-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074E: Halogenated Aliphatic Compounds									
Dichlorodifluoromethane	75-71-8	5	mg/kg		<5	<5	<5	<5	<5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH16@3.00	BH18@1.00	BH18@3.00	BH17@1.50	BH10@.020
				Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-043	ES1838116-045	ES1838116-047	ES1838116-049	ES1838116-052
					Result	Result	Result	Result	Result
EP074E: Halogenated Aliphatic Compounds - Continued									
Chloromethane	74-87-3	5	mg/kg		<5	<5	<5	<5	<5
Vinyl chloride	75-01-4	5	mg/kg		<5	<5	<5	<5	<5
Bromomethane	74-83-9	5	mg/kg		<5	<5	<5	<5	<5
Chloroethane	75-00-3	5	mg/kg		<5	<5	<5	<5	<5
Trichlorofluoromethane	75-69-4	5	mg/kg		<5	<5	<5	<5	<5
1.1-Dichloroethene	75-35-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Iodomethane	74-88-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1-Dichloroethane	75-34-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.1-Trichloroethane	71-55-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1-Dichloropropylene	563-58-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Carbon Tetrachloride	56-23-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichloroethane	107-06-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Trichloroethene	79-01-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dibromomethane	74-95-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.2-Trichloroethane	79-00-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.3-Dichloropropane	142-28-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Tetrachloroethene	127-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.3-Trichloropropane	96-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pentachloroethane	76-01-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074F: Halogenated Aromatic Compounds									
Chlorobenzene	108-90-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bromobenzene	108-86-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Chlorotoluene	95-49-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chlorotoluene	106-43-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074G: Trihalomethanes									
Chloroform	67-66-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH16@3.00	BH18@1.00	BH18@3.00	BH17@1.50	BH10@.020
				Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-043	ES1838116-045	ES1838116-047	ES1838116-049	ES1838116-052
					Result	Result	Result	Result	Result
EP074G: Trihalomethanes - Continued									
Bromodichloromethane	75-27-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dibromochloromethane	124-48-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bromoform	75-25-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075A: Phenolic Compounds									
Phenol	108-95-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Chlorophenol	95-57-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Methylphenol	95-48-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
3- & 4-Methylphenol	1319-77-3	0.5	mg/kg		<0.5	<0.5	<0.5	**0.8**	<0.5
2-Nitrophenol	88-75-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.4-Dimethylphenol	105-67-9	0.5	mg/kg		<0.5	<0.5	<0.5	**0.6**	<0.5
2.4-Dichlorophenol	120-83-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.6-Dichlorophenol	87-65-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pentachlorophenol	87-86-5	1	mg/kg		<1	<1	<1	<1	<1
EP075B: Polynuclear Aromatic Hydrocarbons									
Naphthalene	91-20-3	0.5	mg/kg		<0.5	<0.5	<0.5	**4.3**	<0.5
2-Methylnaphthalene	91-57-6	0.5	mg/kg		<0.5	<0.5	<0.5	**3.3**	<0.5
2-Chloronaphthalene	91-58-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Acenaphthylene	208-96-8	0.5	mg/kg		<0.5	<0.5	<0.5	**2.6**	<0.5
Acenaphthene	83-32-9	0.5	mg/kg		<0.5	<0.5	<0.5	**3.6**	<0.5
Fluorene	86-73-7	0.5	mg/kg		<0.5	<0.5	<0.5	**5.1**	<0.5
Phenanthrene	85-01-8	0.5	mg/kg		<0.5	<0.5	<0.5	**42.0**	<0.5
Anthracene	120-12-7	0.5	mg/kg		<0.5	<0.5	<0.5	**11.4**	<0.5
Fluoranthene	206-44-0	0.5	mg/kg		<0.5	<0.5	<0.5	**44.7**	**0.5**
Pyrene	129-00-0	0.5	mg/kg		<0.5	<0.5	<0.5	**42.2**	**0.6**
N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Benz(a)anthracene	56-55-3	0.5	mg/kg		<0.5	<0.5	<0.5	**17.7**	<0.5
Chrysene	218-01-9	0.5	mg/kg		<0.5	<0.5	<0.5	**14.1**	<0.5
Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg		<1	<1	<1	**21**	<1
7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Benzo(a)pyrene	50-32-8	0.5	mg/kg		<0.5	<0.5	<0.5	**11.9**	<0.5
3-Methylcholanthrene	56-49-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH16@3.00	BH18@1.00	BH18@3.00	BH17@1.50	BH10@.020
				Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-043	ES1838116-045	ES1838116-047	ES1838116-049	ES1838116-052
					Result	Result	Result	Result	Result
EP075B: Polynuclear Aromatic Hydrocarbons - Continued									
Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg		<0.5	<0.5	<0.5	**5.4**	<0.5
Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg		<0.5	<0.5	<0.5	**1.1**	<0.5
Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg		<0.5	<0.5	<0.5	**6.0**	<0.5
^ Sum of PAHs	----	0.5	mg/kg		<0.5	<0.5	<0.5	**233**	**1.1**
^ Benzo(a)pyrene TEQ (zero)	----	0.5	mg/kg		<0.5	<0.5	<0.5	**17.6**	<0.5
^ Benzo(a)pyrene TEQ (half LOR)	----	0.5	mg/kg		**0.6**	**0.6**	**0.6**	**17.6**	**0.6**
^ Benzo(a)pyrene TEQ (LOR)	----	0.5	mg/kg		**1.2**	**1.2**	**1.2**	**17.6**	**1.2**
EP075C: Phthalate Esters									
Dimethyl phthalate	131-11-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Diethyl phthalate	84-66-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Di-n-butyl phthalate	84-74-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Butyl benzyl phthalate	85-68-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
bis(2-ethylhexyl) phthalate	117-81-7	5.0	mg/kg		<5.0	<5.0	<5.0	<5.0	<5.0
Di-n-octylphthalate	117-84-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075D: Nitrosamines									
N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodiethylamine	55-18-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosopyrrolidine	930-55-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
N-Nitrosomorpholine	59-89-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosopiperidine	100-75-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodibutylamine	924-16-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
Methapyrilene	91-80-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075E: Nitroaromatics and Ketones									
2-Picoline	109-06-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Acetophenone	98-86-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Nitrobenzene	98-95-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Isophorone	78-59-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.6-Dinitrotoluene	606-20-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
2.4-Dinitrotoluene	121-14-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
1-Naphthylamine	134-32-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH16@3.00	BH18@1.00	BH18@3.00	BH17@1.50	BH10@.020
				Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-043	ES1838116-045	ES1838116-047	ES1838116-049	ES1838116-052
					Result	Result	Result	Result	Result
EP075E: Nitroaromatics and Ketones - Continued									
5-Nitro-o-toluidine	99-55-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Azobenzene	103-33-3	1	mg/kg		<1	<1	<1	<1	<1
1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Phenacetin	62-44-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Aminobiphenyl	92-67-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pentachloronitrobenzene	82-68-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pronamide	23950-58-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dimethylaminoazobenzene	60-11-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorobenzilate	510-15-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075F: Haloethers									
Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075G: Chlorinated Hydrocarbons									
1.3-Dichlorobenzene	541-73-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.4-Dichlorobenzene	106-46-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichlorobenzene	95-50-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachloroethane	67-72-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachloropropylene	1888-71-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorobutadiene	87-68-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg		<2.5	<2.5	<2.5	<2.5	<2.5
Pentachlorobenzene	608-93-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorobenzene (HCB)	118-74-1	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
EP075H: Anilines and Benzidines									
Aniline	62-53-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chloroaniline	106-47-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Nitroaniline	88-74-4	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
3-Nitroaniline	99-09-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
Dibenzofuran	132-64-9	0.5	mg/kg		<0.5	<0.5	<0.5	**4.7**	<0.5
4-Nitroaniline	100-01-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Carbazole	86-74-8	0.5	mg/kg		<0.5	<0.5	<0.5	**5.1**	<0.5
3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH16@3.00	BH18@1.00	BH18@3.00	BH17@1.50	BH10@.020
				Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-043	ES1838116-045	ES1838116-047	ES1838116-049	ES1838116-052
					Result	Result	Result	Result	Result
EP075I: Organochlorine Pesticides									
alpha-BHC	319-84-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
beta-BHC	319-85-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
gamma-BHC	58-89-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
delta-BHC	319-86-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Heptachlor	76-44-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Aldrin	309-00-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Heptachlor epoxide	1024-57-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
alpha-Endosulfan	959-98-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4.4`-DDE	72-55-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dieldrin	60-57-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Endrin	72-20-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
beta-Endosulfan	33213-65-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4.4`-DDD	72-54-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Endosulfan sulfate	1031-07-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4.4`-DDT	50-29-3	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
EP075J: Organophosphorus Pesticides									
Dichlorvos	62-73-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dimethoate	60-51-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Diazinon	333-41-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorpyrifos-methyl	5598-13-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Malathion	121-75-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Fenthion	55-38-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorpyrifos	2921-88-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pirimphos-ethyl	23505-41-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorfenvinphos	470-90-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Prothiofos	34643-46-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Ethion	563-12-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP080/071: Total Petroleum Hydrocarbons									
C6 - C9 Fraction	----	10	mg/kg		<10	<10	<10	<10	<10
C10 - C14 Fraction	----	50	mg/kg		<50	<50	<50	<50	<50
C15 - C28 Fraction	----	100	mg/kg		<100	**180**	<100	**1570**	<100
C29 - C36 Fraction	----	100	mg/kg		<100	**140**	<100	**1150**	<100
^ C10 - C36 Fraction (sum)	----	50	mg/kg		<50	**320**	<50	**2720**	<50
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions									

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH16@3.00	BH18@1.00	BH18@3.00	BH17@1.50	BH10@.020
				Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-043	ES1838116-045	ES1838116-047	ES1838116-049	ES1838116-052
					Result	Result	Result	Result	Result
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions - Continued									
C6 - C10 Fraction	C6_C10	10	mg/kg		<10	<10	<10	<10	<10
^ C6 - C10 Fraction minus BTEX (F1)	C6_C10-BTEX	10	mg/kg		<10	<10	<10	<10	<10
>C10 - C16 Fraction	----	50	mg/kg		<50	<50	<50	120	<50
>C16 - C34 Fraction	----	100	mg/kg		<100	280	<100	2270	<100
>C34 - C40 Fraction	----	100	mg/kg		<100	<100	<100	800	<100
^ >C10 - C40 Fraction (sum)	----	50	mg/kg		<50	280	<50	3190	<50
^ >C10 - C16 Fraction minus Naphthalene (F2)	----	50	mg/kg		<50	<50	<50	120	<50
EP080: BTEXN									
Benzene	71-43-2	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Toluene	108-88-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Ethylbenzene	100-41-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
ortho-Xylene	95-47-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
^ Sum of BTEX	----	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
^ Total Xylenes	----	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Naphthalene	91-20-3	1	mg/kg		<1	<1	<1	2	<1
EP066S: PCB Surrogate									
Decachlorobiphenyl	2051-24-3	0.1	%		90.2	97.0	93.0	88.4	94.9
EP068S: Organochlorine Pesticide Surrogate									
Dibromo-DDE	21655-73-2	0.05	%		86.5	99.3	84.7	71.3	95.8
EP068T: Organophosphorus Pesticide Surrogate									
DEF	78-48-8	0.05	%		73.9	67.7	73.0	67.9	96.0
EP074S: VOC Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.5	%		100	95.6	97.3	107	108
Toluene-D8	2037-26-5	0.5	%		79.0	81.5	76.6	92.0	81.9
4-Bromofluorobenzene	460-00-4	0.5	%		85.4	87.4	86.2	100	94.5
EP075S: Acid Extractable Surrogates									
2-Fluorophenol	367-12-4	0.5	%		101	50.1	98.3	93.0	91.9
Phenol-d6	13127-88-3	0.5	%		102	98.3	93.8	92.1	92.5
2-Chlorophenol-D4	93951-73-6	0.5	%		106	50.8	102	101	99.2
2.4.6-Tribromophenol	118-79-6	0.5	%		53.7	43.0	49.6	80.1	46.0
EP075T: Base/Neutral Extractable Surrogates									

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH16@3.00	BH18@1.00	BH18@3.00	BH17@1.50	BH10@.020
				Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-043	ES1838116-045	ES1838116-047	ES1838116-049	ES1838116-052
					Result	Result	Result	Result	Result
EP075T: Base/Neutral Extractable Surrogates - Continued									
Nitrobenzene-D5	4165-60-0	0.5	%		102	125	96.6	95.8	93.7
1.2-Dichlorobenzene-D4	2199-69-1	0.5	%		98.2	102	96.7	93.7	94.6
2-Fluorobiphenyl	321-60-8	0.5	%		109	107	103	107	104
Anthracene-d10	1719-06-8	0.5	%		103	92.0	95.7	90.5	94.4
4-Terphenyl-d14	1718-51-0	0.5	%		101	91.8	92.8	97.5	91.9
EP080S: TPH(V)/BTEX Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.2	%		87.7	84.2	85.0	108	109
Toluene-D8	2037-26-5	0.2	%		80.3	82.6	77.7	88.2	78.6
4-Bromofluorobenzene	460-00-4	0.2	%		90.3	91.4	91.1	96.7	92.7

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH10@4.00	BH09@1 .50	BH09@3.00	BH11@1 .00	BH11@3.00
			Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit	ES1838116-055	ES1838116-057	ES1838116-059	ES1838116-060	ES1838116-061
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	----	1.0	%	31.7	8.3	17.6	32.6	34.6
EA200: AS 4964 - 2004 Identification of Asbestos in Soils								
Asbestos Detected	1332-21-4	0.1	g/kg	----	No	----	No	----
Asbestos Type	1332-21-4	-	--	----	-	----	-	----
Sample weight (dry)	----	0.01	g	----	263	----	175	----
APPROVED IDENTIFIER:	----	-	--	----	A.SMYLIE	----	A.SMYLIE	----
EA200N: Asbestos Quantification (non-NATA)								
ø Asbestos (Fines and Fibrous <7mm)	1332-21-4	0.0004	g	----	<0.0004	----	<0.0004	----
ø Asbestos (Fines and Fibrous FA+AF)	----	0.001	% (w/w)	----	<0.001	----	<0.001	----
ø Asbestos Containing Material	1332-21-4	0.1	g	----	<0.1	----	<0.1	----
ø Asbestos Containing Material (as 15% Asbestos in ACM >7mm)	1332-21-4	0.01	% (w/w)	----	<0.01	----	<0.01	----
ø Weight Used for % Calculation	----	0.0001	kg	----	0.263	----	0.175	----
EG005T: Total Metals by ICP-AES								
Arsenic	7440-38-2	5	mg/kg	<5	7	5	<5	<5
Cadmium	7440-43-9	1	mg/kg	<1	<1	<1	<1	<1
Chromium	7440-47-3	2	mg/kg	13	7	8	13	2
Copper	7440-50-8	5	mg/kg	8	221	33	73	<5
Lead	7439-92-1	5	mg/kg	17	142	34	66	<5
Nickel	7440-02-0	2	mg/kg	<2	15	15	8	<2
Zinc	7440-66-6	5	mg/kg	54	608	79	215	26
EG035T: Total Recoverable Mercury by FIMS								
Mercury	7439-97-6	0.1	mg/kg	0.1	<0.1	<0.1	0.1	<0.1
EP066: Polychlorinated Biphenyls (PCB)								
Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
EP068A: Organochlorine Pesticides (OC)								
alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
delta-BHC	319-86-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
Heptachlor	76-44-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
Aldrin	309-00-2	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH10@4.00	BH09@1 .50	BH09@3.00	BH11@1 .00	BH11@3.00
				Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-055	ES1838116-057	ES1838116-059	ES1838116-060	ES1838116-061
					Result	Result	Result	Result	Result
EP068A: Organochlorine Pesticides (OC) - Continued									
Heptachlor epoxide	1024-57-3	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
^ Total Chlordane (sum)	----	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
trans-Chlordane	5103-74-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
alpha-Endosulfan	959-98-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
cis-Chlordane	5103-71-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Dieldrin	60-57-1	0.05	mg/kg		<0.05	**0.16**	**0.33**	**0.19**	<0.05
4.4`-DDE	72-55-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Endrin	72-20-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
beta-Endosulfan	33213-65-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
^ Endosulfan (sum)	115-29-7	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
4.4`-DDD	72-54-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Endrin aldehyde	7421-93-4	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Endosulfan sulfate	1031-07-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
4.4`-DDT	50-29-3	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Endrin ketone	53494-70-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Methoxychlor	72-43-5	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
^ Sum of Aldrin + Dieldrin	309-00-2/60-57-1	0.05	mg/kg		<0.05	**0.16**	**0.33**	**0.19**	<0.05
^ Sum of DDD + DDE + DDT	72-54-8/72-55-9/50-29-3	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
EP068B: Organophosphorus Pesticides (OP)									
Dichlorvos	62-73-7	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Demeton-S-methyl	919-86-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Monocrotophos	6923-22-4	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Dimethoate	60-51-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Diazinon	333-41-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Parathion-methyl	298-00-0	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Malathion	121-75-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Fenthion	55-38-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Chlorpyrifos	2921-88-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Parathion	56-38-2	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Pirimphos-ethyl	23505-41-1	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Chlorfenvinphos	470-90-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Bromophos-ethyl	4824-78-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Fenamiphos	22224-92-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH10@4.00	BH09@1 .50	BH09@3.00	BH11@1 .00	BH11@3.00
				Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-055	ES1838116-057	ES1838116-059	ES1838116-060	ES1838116-061
					Result	Result	Result	Result	Result
EP068B: Organophosphorus Pesticides (OP) - Continued									
Prothiofos	34643-46-4	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Ethion	563-12-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Carbophenothion	786-19-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Azinphos Methyl	86-50-0	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
EP074A: Monocyclic Aromatic Hydrocarbons									
Benzene	71-43-2	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Toluene	108-88-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Ethylbenzene	100-41-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Styrene	100-42-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
ortho-Xylene	95-47-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Isopropylbenzene	98-82-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
n-Propylbenzene	103-65-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
sec-Butylbenzene	135-98-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
tert-Butylbenzene	98-06-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
p-Isopropyltoluene	99-87-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
n-Butylbenzene	104-51-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074B: Oxygenated Compounds									
Vinyl Acetate	108-05-4	5	mg/kg		<5	<5	<5	<5	<5
2-Butanone (MEK)	78-93-3	5	mg/kg		<5	<5	<5	<5	<5
4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg		<5	<5	<5	<5	<5
2-Hexanone (MBK)	591-78-6	5	mg/kg		<5	<5	<5	<5	<5
EP074C: Sulfonated Compounds									
Carbon disulfide	75-15-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074D: Fumigants									
2.2-Dichloropropane	594-20-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichloropropane	78-87-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074E: Halogenated Aliphatic Compounds									
Dichlorodifluoromethane	75-71-8	5	mg/kg		<5	<5	<5	<5	<5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH10@4.00	BH09@1 .50	BH09@3.00	BH11@1 .00	BH11@3.00
				Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-055	ES1838116-057	ES1838116-059	ES1838116-060	ES1838116-061
					Result	Result	Result	Result	Result
EP074E: Halogenated Aliphatic Compounds - Continued									
Chloromethane	74-87-3	5	mg/kg		<5	<5	<5	<5	<5
Vinyl chloride	75-01-4	5	mg/kg		<5	<5	<5	<5	<5
Bromomethane	74-83-9	5	mg/kg		<5	<5	<5	<5	<5
Chloroethane	75-00-3	5	mg/kg		<5	<5	<5	<5	<5
Trichlorofluoromethane	75-69-4	5	mg/kg		<5	<5	<5	<5	<5
1.1-Dichloroethene	75-35-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Iodomethane	74-88-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1-Dichloroethane	75-34-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.1-Trichloroethane	71-55-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1-Dichloropropylene	563-58-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Carbon Tetrachloride	56-23-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichloroethane	107-06-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Trichloroethene	79-01-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dibromomethane	74-95-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.2-Trichloroethane	79-00-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.3-Dichloropropane	142-28-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Tetrachloroethene	127-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.3-Trichloropropane	96-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pentachloroethane	76-01-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074F: Halogenated Aromatic Compounds									
Chlorobenzene	108-90-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bromobenzene	108-86-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Chlorotoluene	95-49-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chlorotoluene	106-43-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074G: Trihalomethanes									
Chloroform	67-66-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH10@4.00	BH09@1 .50	BH09@3.00	BH11@1 .00	BH11@3.00
				Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-055	ES1838116-057	ES1838116-059	ES1838116-060	ES1838116-061
					Result	Result	Result	Result	Result
EP074G: Trihalomethanes - Continued									
Bromodichloromethane	75-27-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dibromochloromethane	124-48-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bromoform	75-25-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075A: Phenolic Compounds									
Phenol	108-95-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Chlorophenol	95-57-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Methylphenol	95-48-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
3- & 4-Methylphenol	1319-77-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Nitrophenol	88-75-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.4-Dimethylphenol	105-67-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.4-Dichlorophenol	120-83-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.6-Dichlorophenol	87-65-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pentachlorophenol	87-86-5	1	mg/kg		<1	<1	<1	<1	<1
EP075B: Polynuclear Aromatic Hydrocarbons									
Naphthalene	91-20-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Methylnaphthalene	91-57-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Chloronaphthalene	91-58-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Acenaphthylene	208-96-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Acenaphthene	83-32-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Fluorene	86-73-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Phenanthrene	85-01-8	0.5	mg/kg		<0.5	**1.2**	**1.2**	**2.8**	<0.5
Anthracene	120-12-7	0.5	mg/kg		<0.5	<0.5	<0.5	**0.6**	<0.5
Fluoranthene	206-44-0	0.5	mg/kg		<0.5	**2.0**	**2.3**	**3.5**	<0.5
Pyrene	129-00-0	0.5	mg/kg		<0.5	**1.8**	**2.2**	**3.3**	<0.5
N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Benz(a)anthracene	56-55-3	0.5	mg/kg		<0.5	**0.7**	**0.8**	**1.2**	<0.5
Chrysene	218-01-9	0.5	mg/kg		<0.5	**0.6**	**0.6**	**1.0**	<0.5
Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg		<1	**1**	**2**	**2**	<1
7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Benzo(a)pyrene	50-32-8	0.5	mg/kg		<0.5	**0.6**	**0.8**	**1.0**	<0.5
3-Methylcholanthrene	56-49-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH10@4.00	BH09@1 .50	BH09@3.00	BH11@1 .00	BH11@3.00
			Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit	ES1838116-055	ES1838116-057	ES1838116-059	ES1838116-060	ES1838116-061
				Result	Result	Result	Result	Result
EP075B: Polynuclear Aromatic Hydrocarbons - Continued								
Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg	<0.5	<0.5	**0.5**	**0.5**	<0.5
^ Sum of PAHs	----	0.5	mg/kg	<0.5	**7.9**	**10.4**	**15.9**	<0.5
^ Benzo(a)pyrene TEQ (zero)	----	0.5	mg/kg	<0.5	**0.8**	**1.1**	**1.3**	<0.5
^ Benzo(a)pyrene TEQ (half LOR)	----	0.5	mg/kg	**0.6**	**1.0**	**1.4**	**1.6**	**0.6**
^ Benzo(a)pyrene TEQ (LOR)	----	0.5	mg/kg	**1.2**	**1.3**	**1.6**	**1.9**	**1.2**
EP075C: Phthalate Esters								
Dimethyl phthalate	131-11-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Diethyl phthalate	84-66-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Di-n-butyl phthalate	84-74-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Butyl benzyl phthalate	85-68-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
bis(2-ethylhexyl) phthalate	117-81-7	5.0	mg/kg	<5.0	<5.0	<5.0	<5.0	<5.0
Di-n-octylphthalate	117-84-0	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
EP075D: Nitrosamines								
N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodiethylamine	55-18-5	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosopyrrolidine	930-55-2	1.0	mg/kg	<1.0	<1.0	<1.0	<1.0	<1.0
N-Nitrosomorpholine	59-89-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosopiperidine	100-75-4	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodibutylamine	924-16-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	1.0	mg/kg	<1.0	<1.0	<1.0	<1.0	<1.0
Methapyrilene	91-80-5	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
EP075E: Nitroaromatics and Ketones								
2-Picoline	109-06-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Acetophenone	98-86-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Nitrobenzene	98-95-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Isophorone	78-59-1	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.6-Dinitrotoluene	606-20-2	1.0	mg/kg	<1.0	<1.0	<1.0	<1.0	<1.0
2.4-Dinitrotoluene	121-14-2	1.0	mg/kg	<1.0	<1.0	<1.0	<1.0	<1.0
1-Naphthylamine	134-32-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH10@4.00	BH09@1 .50	BH09@3.00	BH11@1 .00	BH11@3.00
				Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-055	ES1838116-057	ES1838116-059	ES1838116-060	ES1838116-061
					Result	Result	Result	Result	Result
EP075E: Nitroaromatics and Ketones - Continued									
5-Nitro-o-toluidine	99-55-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Azobenzene	103-33-3	1	mg/kg		<1	<1	<1	<1	<1
1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Phenacetin	62-44-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Aminobiphenyl	92-67-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pentachloronitrobenzene	82-68-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pronamide	23950-58-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dimethylaminoazobenzene	60-11-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorobenzilate	510-15-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075F: Haloethers									
Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075G: Chlorinated Hydrocarbons									
1.3-Dichlorobenzene	541-73-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.4-Dichlorobenzene	106-46-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichlorobenzene	95-50-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachloroethane	67-72-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachloropropylene	1888-71-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorobutadiene	87-68-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg		<2.5	<2.5	<2.5	<2.5	<2.5
Pentachlorobenzene	608-93-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorobenzene (HCB)	118-74-1	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
EP075H: Anilines and Benzidines									
Aniline	62-53-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chloroaniline	106-47-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Nitroaniline	88-74-4	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
3-Nitroaniline	99-09-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
Dibenzofuran	132-64-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Nitroaniline	100-01-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Carbazole	86-74-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH10@4.00	BH09@1 .50	BH09@3.00	BH11@1 .00	BH11@3.00
				Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-055	ES1838116-057	ES1838116-059	ES1838116-060	ES1838116-061
					Result	Result	Result	Result	Result
EP075(I): Organochlorine Pesticides									
alpha-BHC	319-84-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
beta-BHC	319-85-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
gamma-BHC	58-89-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
delta-BHC	319-86-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Heptachlor	76-44-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Aldrin	309-00-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Heptachlor epoxide	1024-57-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
alpha-Endosulfan	959-98-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4.4`-DDE	72-55-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dieldrin	60-57-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Endrin	72-20-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
beta-Endosulfan	33213-65-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4.4`-DDD	72-54-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Endosulfan sulfate	1031-07-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4.4`-DDT	50-29-3	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
EP075(J): Organophosphorus Pesticides									
Dichlorvos	62-73-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dimethoate	60-51-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Diazinon	333-41-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorpyrifos-methyl	5598-13-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Malathion	121-75-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Fenthion	55-38-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorpyrifos	2921-88-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pirimphos-ethyl	23505-41-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorfenvinphos	470-90-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Prothiofos	34643-46-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Ethion	563-12-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP080/071: Total Petroleum Hydrocarbons									
C6 - C9 Fraction	----	10	mg/kg		<10	<10	<10	<10	<10
C10 - C14 Fraction	----	50	mg/kg		<50	<50	<50	<50	<50
C15 - C28 Fraction	----	100	mg/kg		<100	<100	**170**	**140**	<100
C29 - C36 Fraction	----	100	mg/kg		<100	<100	**140**	**120**	<100
^ C10 - C36 Fraction (sum)	----	50	mg/kg		<50	<50	**310**	**260**	<50
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions									

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH10@4.00	BH09@1 .50	BH09@3.00	BH11@1 .00	BH11@3.00
				Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-055	ES1838116-057	ES1838116-059	ES1838116-060	ES1838116-061
					Result	Result	Result	Result	Result
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions - Continued									
C6 - C10 Fraction	C6_C10	10	mg/kg		<10	<10	<10	<10	<10
^ **C6 - C10 Fraction minus BTEX (F1)**	C6_C10-BTEX	10	mg/kg		<10	<10	<10	<10	<10
>C10 - C16 Fraction	----	50	mg/kg		<50	<50	<50	<50	<50
>C16 - C34 Fraction	----	100	mg/kg		<100	**130**	**250**	**220**	<100
>C34 - C40 Fraction	----	100	mg/kg		<100	<100	**100**	<100	<100
^ **>C10 - C40 Fraction (sum)**	----	50	mg/kg		<50	**130**	**350**	**220**	<50
^ **>C10 - C16 Fraction minus Naphthalene (F2)**	----	50	mg/kg		<50	<50	<50	<50	<50
EP080: BTEXN									
Benzene	71-43-2	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Toluene	108-88-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Ethylbenzene	100-41-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
ortho-Xylene	95-47-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
^ **Sum of BTEX**	----	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
^ **Total Xylenes**	----	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Naphthalene	91-20-3	1	mg/kg		<1	<1	<1	<1	<1
EP231A: Perfluoroalkyl Sulfonic Acids									
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg		----	----	----	----	<0.0002
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg		----	----	----	----	<0.0002
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg		----	----	----	----	<0.0002
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg		----	----	----	----	<0.0002
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg		----	----	----	----	**0.0007**
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg		----	----	----	----	<0.0002
EP231B: Perfluoroalkyl Carboxylic Acids									
Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg		----	----	----	----	<0.001
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg		----	----	----	----	<0.0002
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg		----	----	----	----	<0.0002

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH10@4.00	BH09@1 .50	BH09@3.00	BH11@1 .00	BH11@3.00
				Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-055	ES1838116-057	ES1838116-059	ES1838116-060	ES1838116-061
					Result	Result	Result	Result	Result
EP231B: Perfluoroalkyl Carboxylic Acids - Continued									
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg		----	----	----	----	<0.0002
Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg		----	----	----	----	<0.0002
Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg		----	----	----	----	<0.0002
Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg		----	----	----	----	<0.0002
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg		----	----	----	----	<0.0002
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg		----	----	----	----	<0.0002
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg		----	----	----	----	<0.0002
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg		----	----	----	----	<0.0005
EP231C: Perfluoroalkyl Sulfonamides									
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg		----	----	----	----	<0.0002
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg		----	----	----	----	<0.0005
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg		----	----	----	----	<0.0005
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg		----	----	----	----	<0.0005
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg		----	----	----	----	<0.0005
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg		----	----	----	----	<0.0002
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg		----	----	----	----	<0.0002
EP231D: (n:2) Fluorotelomer Sulfonic Acids									
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg		----	----	----	----	<0.0005
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg		----	----	----	----	<0.0005
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg		----	----	----	----	<0.0005

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH10@4.00	BH09@1 .50	BH09@3.00	BH11@1 .00	BH11@3.00
				Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-055	ES1838116-057	ES1838116-059	ES1838116-060	ES1838116-061
					Result	Result	Result	Result	Result
EP231D: (n:2) Fluorotelomer Sulfonic Acids - Continued									
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg		----	----	----	----	<0.0005
EP231P: PFAS Sums									
Sum of PFAS	----	0.0002	mg/kg		----	----	----	----	0.0007
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	mg/kg		----	----	----	----	0.0007
Sum of PFAS (WA DER List)	----	0.0002	mg/kg		----	----	----	----	0.0007
EP066S: PCB Surrogate									
Decachlorobiphenyl	2051-24-3	0.1	%		108	94.6	110	95.7	94.9
EP068S: Organochlorine Pesticide Surrogate									
Dibromo-DDE	21655-73-2	0.05	%		122	110	84.2	77.9	103
EP068T: Organophosphorus Pesticide Surrogate									
DEF	78-48-8	0.05	%		105	120	110	128	101
EP074S: VOC Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.5	%		75.0	108	98.3	98.2	77.7
Toluene-D8	2037-26-5	0.5	%		71.7	88.7	78.3	73.5	85.5
4-Bromofluorobenzene	460-00-4	0.5	%		74.9	97.6	85.3	79.1	74.3
EP075S: Acid Extractable Surrogates									
2-Fluorophenol	367-12-4	0.5	%		101	89.0	89.4	90.5	97.0
Phenol-d6	13127-88-3	0.5	%		97.6	89.7	88.7	90.4	93.0
2-Chlorophenol-D4	93951-73-6	0.5	%		106	94.9	94.9	98.6	100
2.4.6-Tribromophenol	118-79-6	0.5	%		47.4	45.5	47.8	51.3	52.1
EP075T: Base/Neutral Extractable Surrogates									
Nitrobenzene-D5	4165-60-0	0.5	%		104	92.1	91.8	92.8	97.4
1.2-Dichlorobenzene-D4	2199-69-1	0.5	%		103	94.8	90.2	91.2	96.6
2-Fluorobiphenyl	321-60-8	0.5	%		108	106	108	103	108
Anthracene-d10	1719-06-8	0.5	%		96.6	96.5	95.3	94.5	96.4
4-Terphenyl-d14	1718-51-0	0.5	%		92.9	94.6	95.5	92.9	93.9
EP080S: TPH(V)/BTEX Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.2	%		77.4	110	86.2	85.7	82.5
Toluene-D8	2037-26-5	0.2	%		78.8	85.2	79.4	74.7	87.6
4-Bromofluorobenzene	460-00-4	0.2	%		74.5	95.2	90.2	83.7	82.9
EP231S: PFAS Surrogate									
13C4-PFOS	----	0.0002	%		----	----	----	----	71.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH10@4.00	BH09@1 .50	BH09@3.00	BH11@1 .00	BH11@3.00
				Client sampling date / time	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]	[14-Dec-2018]
Compound	CAS Number	LOR	Unit		ES1838116-055	ES1838116-057	ES1838116-059	ES1838116-060	ES1838116-061
					Result	Result	Result	Result	Result
EP231S: PFAS Surrogate - Continued									
13C8-PFOA	----	0.0002	%		**----**	**----**	**----**	**----**	**62.0**

Analytical Results

Descriptive Results

Sub-Matrix: **SOIL**

Method: Compound	Client sample ID - Client sampling date / time	Analytical Results
EA200: AS 4964 - 2004 Identification of Asbestos in Soils		
EA200: Description	BH01@0.50 - [12-Dec-2018]	Mid brown sandy soil.
EA200: Description	BH02@1.00 - [12-Dec-2018]	Mid brown sandy soil.
EA200: Description	MW02@1.00 - [12-Dec-2018]	Mid brown sandy soil.
EA200: Description	BH06@0.50 - [14-Dec-2018]	Mid brown sandy soil.
EA200: Description	BH08@1.00 - [14-Dec-2018]	Mid brown sandy soil.
EA200: Description	MW06@1.50 - [13-Dec-2018]	Mid brown sandy soil.
EA200: Description	BH15@1.50 - [13-Dec-2018]	Mid brown sandy soil.
EA200: Description	BH12@1.00 - [13-Dec-2018]	Mid brown sandy soil.
EA200: Description	BH24@1.50 - [13-Dec-2018]	Grey sandy soil.
EA200: Description	BH19@0.40 - [13-Dec-2018]	Mid brown sandy soil.
EA200: Description	BH16@0.50 - [14-Dec-2018]	Mid brown sandy soil.
EA200: Description	BH18@1.00 - [14-Dec-2018]	Mid brown sandy soil.
EA200: Description	BH17@1.50 - [14-Dec-2018]	Mid brown sandy soil.
EA200: Description	BH10@.020 - [14-Dec-2018]	Mid brown sandy soil.
EA200: Description	BH09@1 .50 - [14-Dec-2018]	Mid brown sandy soil.
EA200: Description	BH11@1 .00 - [14-Dec-2018]	Mid brown sandy soil.

Surrogate Control Limits

Sub-Matrix: **SOIL**

Compound	CAS Number	Recovery Limits (%) Low	High
EP066S: PCB Surrogate			
Decachlorobiphenyl	2051-24-3	39	149
EP068S: Organochlorine Pesticide Surrogate			
Dibromo-DDE	21655-73-2	49	147
EP068T: Organophosphorus Pesticide Surrogate			
DEF	78-48-8	35	143
EP074S: VOC Surrogates			
1.2-Dichloroethane-D4	17060-07-0	64	130
Toluene-D8	2037-26-5	66	136
4-Bromofluorobenzene	460-00-4	60	122
EP075S: Acid Extractable Surrogates			
2-Fluorophenol	367-12-4	29	149
Phenol-d6	13127-88-3	32	128
2-Chlorophenol-D4	93951-73-6	32	128
2.4.6-Tribromophenol	118-79-6	13	121
EP075T: Base/Neutral Extractable Surrogates			
Nitrobenzene-D5	4165-60-0	33	125
1.2-Dichlorobenzene-D4	2199-69-1	34	108
2-Fluorobiphenyl	321-60-8	35	121
Anthracene-d10	1719-06-8	35	123
4-Terphenyl-d14	1718-51-0	33	125
EP080S: TPH(V)/BTEX Surrogates			
1.2-Dichloroethane-D4	17060-07-0	73	133
Toluene-D8	2037-26-5	74	132
4-Bromofluorobenzene	460-00-4	72	130
EP231S: PFAS Surrogate			
13C4-PFOS	----	60	120
13C8-PFOA	----	60	120

ALS Environmental

QUALITY CONTROL REPORT

Work Order	: **ES1838116**	Page	: 1 of 49
Client	: **ARCADIS AUSTRALIA PACIFIC PTY LTD**	Laboratory	: Environmental Division Sydney
Contact	: MR DEAN STAFFORD	Contact	: Loren Schiavon
Address	: L16, 480 GEORGE STREET SYDNEY NSW 2000	Address	: 277-289 Woodpark Road Smithfield NSW Australia 2164
Telephone	: 02 9690 2555	Telephone	: +61 2 8784 8555
Project	: King St North ESA	Date Samples Received	: 17-Dec-2018
Order number	: 10026439	Date Analysis Commenced	: 19-Dec-2018
C-O-C number	: ----	Issue Date	: 07-Jan-2019
Sampler	: CAITLAIN REGENA		
Site	: ----		
Quote number	: EN/091/17 (Primary Work only)		
No. of samples received	: 60		
No. of samples analysed	: 30		

Accreditation No. 825
Accredited for compliance with ISO/IEC 17025 - Testing

This report supersedes any previous report(s) with this reference. Results apply to the sample(s) as submitted. This document shall not be reproduced, except in full.

This Quality Control Report contains the following information:

- Laboratory Duplicate (DUP) Report; Relative Percentage Difference (RPD) and Acceptance Limits
- Method Blank (MB) and Laboratory Control Spike (LCS) Report; Recovery and Acceptance Limits
- Matrix Spike (MS) Report; Recovery and Acceptance Limits

Signatories

This document has been electronically signed by the authorized signatories below. Electronic signing is carried out in compliance with procedures specified in 21 CFR Part 11.

Signatories	*Position*	*Accreditation Category*
Alana Smylie	Asbestos Identifier	Newcastle - Asbestos, Mayfield West, NSW
Alex Rossi	Organic Chemist	Sydney Organics, Smithfield, NSW
Christopher Owler	Team Leader - Asbestos	Newcastle - Asbestos, Mayfield West, NSW
Edwandy Fadjar	Organic Coordinator	Sydney Inorganics, Smithfield, NSW
Edwandy Fadjar	Organic Coordinator	Sydney Organics, Smithfield, NSW
Ivan Taylor	Analyst	Sydney Inorganics, Smithfield, NSW

General Comments

The analytical procedures used by the Environmental Division have been developed from established internationally recognized procedures such as those published by the USEPA, APHA, AS and NEPM. In house developed procedures are employed in the absence of documented standards or by client request.

Where moisture determination has been performed, results are reported on a dry weight basis.

Where a reported less than (<) result is higher than the LOR, this may be due to primary sample extract/digestate dilution and/or insufficient sample for analysis. Where the LOR of a reported result differs from standard LOR, this may be due to high

Key : Anonymous = Refers to samples which are not specifically part of this work order but formed part of the QC process lot
CAS Number = CAS registry number from database maintained by Chemical Abstracts Services. The Chemical Abstracts Service is a division of the American Chemical Society.
LOR = Limit of reporting
RPD = Relative Percentage Difference
# = Indicates failed QC

Laboratory Duplicate (DUP) Report

The quality control term Laboratory Duplicate refers to a randomly selected intralaboratory split. Laboratory duplicates provide information regarding method precision and sample heterogeneity. The permitted ranges for the Relative Percent Deviation (RPD) of Laboratory Duplicates are specified in ALS Method QWI-EN/38 and are dependent on the magnitude of results in comparison to the level of reporting: Result < 10 times LOR: No Limit; Result between 10 and 20 times LOR: 0% - 50%; Result > 20 times LOR: 0% - 20%.

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EA055: Moisture Content (Dried @ 105-110°C) (QC Lot: 2107219)									
ES1838114-021	Anonymous	EA055: Moisture Content	----	0.1	%	11.7	12.7	8.35	0% - 50%
ES1838116-015	MW02@6.00	EA055: Moisture Content	----	0.1	%	21.6	21.2	2.02	0% - 20%
EA055: Moisture Content (Dried @ 105-110°C) (QC Lot: 2107220)									
ES1838116-035	BH24@1.50	EA055: Moisture Content	----	0.1	%	1.4	1.7	17.2	No Limit
ES1838116-059	BH09@3.00	EA055: Moisture Content	----	0.1	%	17.6	16.8	4.61	0% - 50%
EG005T: Total Metals by ICP-AES (QC Lot: 2111392)									
ES1838116-005	BH03@2.00	EG005T: Cadmium	7440-43-9	1	mg/kg	<1	<1	0.00	No Limit
		EG005T: Chromium	7440-47-3	2	mg/kg	<2	<2	0.00	No Limit
		EG005T: Nickel	7440-02-0	2	mg/kg	<2	<2	0.00	No Limit
		EG005T: Arsenic	7440-38-2	5	mg/kg	<5	<5	0.00	No Limit
		EG005T: Copper	7440-50-8	5	mg/kg	<5	<5	0.00	No Limit
		EG005T: Lead	7439-92-1	5	mg/kg	<5	<5	0.00	No Limit
		EG005T: Zinc	7440-66-6	5	mg/kg	<5	<5	0.00	No Limit
ES1838116-020	BH08@1.00	EG005T: Cadmium	7440-43-9	1	mg/kg	6	4	22.4	No Limit
		EG005T: Chromium	7440-47-3	2	mg/kg	39	35	9.36	0% - 50%
		EG005T: Nickel	7440-02-0	2	mg/kg	30	21	35.4	0% - 50%
		EG005T: Arsenic	7440-38-2	5	mg/kg	22	17	27.6	No Limit
		EG005T: Copper	7440-50-8	5	mg/kg	879	893	1.51	0% - 20%
		EG005T: Lead	7439-92-1	5	mg/kg	1900	1740	8.70	0% - 20%
		EG005T: Zinc	7440-66-6	5	mg/kg	6030	5470	9.78	0% - 20%
EG005T: Total Metals by ICP-AES (QC Lot: 2111394)									
ES1838116-043	BH16@3.00	EG005T: Cadmium	7440-43-9	1	mg/kg	<1	<1	0.00	No Limit
		EG005T: Chromium	7440-47-3	2	mg/kg	15	10	38.2	No Limit
		EG005T: Nickel	7440-02-0	2	mg/kg	<2	<2	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EG005T: Total Metals by ICP-AES (QC Lot: 2111394) - continued									
ES1838116-043	BH16@3.00	EG005T: Arsenic	7440-38-2	5	mg/kg	<5	<5	0.00	No Limit
		EG005T: Copper	7440-50-8	5	mg/kg	6	6	0.00	No Limit
		EG005T: Lead	7439-92-1	5	mg/kg	16	15	0.00	No Limit
		EG005T: Zinc	7440-66-6	5	mg/kg	47	41	15.0	No Limit
ES1838118-003	Anonymous	EG005T: Cadmium	7440-43-9	1	mg/kg	<1	<1	0.00	No Limit
		EG005T: Chromium	7440-47-3	2	mg/kg	9	17	59.7	No Limit
		EG005T: Nickel	7440-02-0	2	mg/kg	3	2	0.00	No Limit
		EG005T: Arsenic	7440-38-2	5	mg/kg	<5	<5	0.00	No Limit
		EG005T: Copper	7440-50-8	5	mg/kg	12	8	39.4	No Limit
		EG005T: Lead	7439-92-1	5	mg/kg	30	20	38.7	No Limit
		EG005T: Zinc	7440-66-6	5	mg/kg	28	# 80	95.5	0% - 50%
EG035T: Total Recoverable Mercury by FIMS (QC Lot: 2111391)									
ES1838116-005	BH03@2.00	EG035T: Mercury	7439-97-6	0.1	mg/kg	<0.1	<0.1	0.00	No Limit
ES1838116-020	BH08@1.00	EG035T: Mercury	7439-97-6	0.1	mg/kg	<0.1	<0.1	0.00	No Limit
EG035T: Total Recoverable Mercury by FIMS (QC Lot: 2111393)									
ES1838116-043	BH16@3.00	EG035T: Mercury	7439-97-6	0.1	mg/kg	0.1	0.1	0.00	No Limit
ES1838118-003	Anonymous	EG035T: Mercury	7439-97-6	0.1	mg/kg	0.4	0.3	0.00	No Limit
EP066: Polychlorinated Biphenyls (PCB) (QC Lot: 2102248)									
ES1838116-005	BH03@2.00	EP066: Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	<0.1	0.00	No Limit
ES1838116-020	BH08@1.00	EP066: Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	<0.1	0.00	No Limit
EP066: Polychlorinated Biphenyls (PCB) (QC Lot: 2103933)									
ES1838116-043	BH16@3.00	EP066: Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	<0.1	0.00	No Limit
ES1838118-003	Anonymous	EP066: Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	<0.1	0.00	No Limit
EP068A: Organochlorine Pesticides (OC) (QC Lot: 2102249)									
ES1838116-005	BH03@2.00	EP068: alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: delta-BHC	319-86-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Heptachlor	76-44-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Aldrin	309-00-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Heptachlor epoxide	1024-57-3	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: trans-Chlordane	5103-74-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: alpha-Endosulfan	959-98-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: cis-Chlordane	5103-71-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Dieldrin	60-57-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDE	72-55-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin	72-20-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: beta-Endosulfan	33213-65-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP068A: Organochlorine Pesticides (OC) (QC Lot: 2102249) - continued									
ES1838116-005	BH03@2.00	EP068: 4.4`-DDD	72-54-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin aldehyde	7421-93-4	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endosulfan sulfate	1031-07-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin ketone	53494-70-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDT	50-29-3	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Methoxychlor	72-43-5	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
ES1838116-020	BH08@1.00	EP068: alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: delta-BHC	319-86-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Heptachlor	76-44-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Aldrin	309-00-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Heptachlor epoxide	1024-57-3	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: trans-Chlordane	5103-74-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: alpha-Endosulfan	959-98-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: cis-Chlordane	5103-71-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Dieldrin	60-57-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDE	72-55-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin	72-20-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: beta-Endosulfan	33213-65-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDD	72-54-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin aldehyde	7421-93-4	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endosulfan sulfate	1031-07-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin ketone	53494-70-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDT	50-29-3	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Methoxychlor	72-43-5	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
EP068A: Organochlorine Pesticides (OC) (QC Lot: 2103934)									
ES1838116-043	BH16@3.00	EP068: alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: delta-BHC	319-86-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Heptachlor	76-44-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Aldrin	309-00-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Heptachlor epoxide	1024-57-3	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: trans-Chlordane	5103-74-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: alpha-Endosulfan	959-98-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: cis-Chlordane	5103-71-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Dieldrin	60-57-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP068A: Organochlorine Pesticides (OC) (QC Lot: 2103934) - continued									
ES1838116-043	BH16@3.00	EP068: 4.4`-DDE	72-55-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin	72-20-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: beta-Endosulfan	33213-65-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDD	72-54-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin aldehyde	7421-93-4	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endosulfan sulfate	1031-07-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin ketone	53494-70-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDT	50-29-3	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Methoxychlor	72-43-5	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
ES1838118-003	Anonymous	EP068: alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: delta-BHC	319-86-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Heptachlor	76-44-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Aldrin	309-00-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Heptachlor epoxide	1024-57-3	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: trans-Chlordane	5103-74-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: alpha-Endosulfan	959-98-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: cis-Chlordane	5103-71-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Dieldrin	60-57-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDE	72-55-9	0.05	mg/kg	0.05	0.06	0.00	No Limit
		EP068: Endrin	72-20-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: beta-Endosulfan	33213-65-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDD	72-54-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin aldehyde	7421-93-4	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endosulfan sulfate	1031-07-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin ketone	53494-70-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDT	50-29-3	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Methoxychlor	72-43-5	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
EP068B: Organophosphorus Pesticides (OP) (QC Lot: 2102249)									
ES1838116-005	BH03@2.00	EP068: Dichlorvos	62-73-7	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Demeton-S-methyl	919-86-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Dimethoate	60-51-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Diazinon	333-41-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Malathion	121-75-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Fenthion	55-38-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorpyrifos	2921-88-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Pirimphos-ethyl	23505-41-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP068B: Organophosphorus Pesticides (OP) (QC Lot: 2102249) - continued									
ES1838116-005	BH03@2.00	EP068: Chlorfenvinphos	470-90-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Bromophos-ethyl	4824-78-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Fenamiphos	22224-92-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Prothiofos	34643-46-4	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Ethion	563-12-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Carbophenothion	786-19-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Azinphos Methyl	86-50-0	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Monocrotophos	6923-22-4	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Parathion-methyl	298-00-0	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Parathion	56-38-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
ES1838116-020	BH08@1.00	EP068: Dichlorvos	62-73-7	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Demeton-S-methyl	919-86-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Dimethoate	60-51-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Diazinon	333-41-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Malathion	121-75-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Fenthion	55-38-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorpyrifos	2921-88-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Pirimphos-ethyl	23505-41-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorfenvinphos	470-90-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Bromophos-ethyl	4824-78-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Fenamiphos	22224-92-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Prothiofos	34643-46-4	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Ethion	563-12-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Carbophenothion	786-19-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Azinphos Methyl	86-50-0	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Monocrotophos	6923-22-4	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Parathion-methyl	298-00-0	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Parathion	56-38-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
EP068B: Organophosphorus Pesticides (OP) (QC Lot: 2103934)									
ES1838116-043	BH16@3.00	EP068: Dichlorvos	62-73-7	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Demeton-S-methyl	919-86-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Dimethoate	60-51-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Diazinon	333-41-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Malathion	121-75-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Fenthion	55-38-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorpyrifos	2921-88-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Pirimphos-ethyl	23505-41-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorfenvinphos	470-90-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP068B: Organophosphorus Pesticides (OP) (QC Lot: 2103934) - continued									
ES1838116-043	BH16@3.00	EP068: Bromophos-ethyl	4824-78-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Fenamiphos	22224-92-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Prothiofos	34643-46-4	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Ethion	563-12-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Carbophenothion	786-19-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Azinphos Methyl	86-50-0	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Monocrotophos	6923-22-4	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Parathion-methyl	298-00-0	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Parathion	56-38-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
ES1838118-003	Anonymous	EP068: Dichlorvos	62-73-7	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Demeton-S-methyl	919-86-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Dimethoate	60-51-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Diazinon	333-41-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Malathion	121-75-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Fenthion	55-38-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorpyrifos	2921-88-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Pirimphos-ethyl	23505-41-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorfenvinphos	470-90-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Bromophos-ethyl	4824-78-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Fenamiphos	22224-92-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Prothiofos	34643-46-4	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Ethion	563-12-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Carbophenothion	786-19-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Azinphos Methyl	86-50-0	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Monocrotophos	6923-22-4	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Parathion-methyl	298-00-0	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Parathion	56-38-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
EP074A: Monocyclic Aromatic Hydrocarbons (QC Lot: 2103659)									
ES1838116-005	BH03@2.00	EP074: Benzene	71-43-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP074: Toluene	108-88-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Styrene	100-42-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Isopropylbenzene	98-82-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: n-Propylbenzene	103-65-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: sec-Butylbenzene	135-98-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP074A: Monocyclic Aromatic Hydrocarbons (QC Lot: 2103659) - continued									
ES1838116-005	BH03@2.00	EP074: 1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: tert-Butylbenzene	98-06-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: p-Isopropyltoluene	99-87-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: n-Butylbenzene	104-51-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838116-020	BH08@1.00	EP074: Benzene	71-43-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP074: Toluene	108-88-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Styrene	100-42-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Isopropylbenzene	98-82-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: n-Propylbenzene	103-65-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: sec-Butylbenzene	135-98-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: tert-Butylbenzene	98-06-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: p-Isopropyltoluene	99-87-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: n-Butylbenzene	104-51-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074A: Monocyclic Aromatic Hydrocarbons (QC Lot: 2103665)									
ES1837145-001	Anonymous	EP074: Benzene	71-43-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP074: Toluene	108-88-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Styrene	100-42-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Isopropylbenzene	98-82-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: n-Propylbenzene	103-65-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: sec-Butylbenzene	135-98-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: tert-Butylbenzene	98-06-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: p-Isopropyltoluene	99-87-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: n-Butylbenzene	104-51-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838250-001	Anonymous	EP074: Benzene	71-43-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP074: Toluene	108-88-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP074A: Monocyclic Aromatic Hydrocarbons (QC Lot: 2103665) - continued									
ES1838250-001	Anonymous	EP074: Styrene	100-42-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Isopropylbenzene	98-82-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: n-Propylbenzene	103-65-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: sec-Butylbenzene	135-98-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: tert-Butylbenzene	98-06-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: p-Isopropyltoluene	99-87-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: n-Butylbenzene	104-51-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074B: Oxygenated Compounds (QC Lot: 2103659)									
ES1838116-005	BH03@2.00	EP074: Vinyl Acetate	108-05-4	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 2-Butanone (MEK)	78-93-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 2-Hexanone (MBK)	591-78-6	5	mg/kg	<5	<5	0.00	No Limit
ES1838116-020	BH08@1.00	EP074: Vinyl Acetate	108-05-4	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 2-Butanone (MEK)	78-93-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 2-Hexanone (MBK)	591-78-6	5	mg/kg	<5	<5	0.00	No Limit
EP074B: Oxygenated Compounds (QC Lot: 2103665)									
ES1837145-001	Anonymous	EP074: Vinyl Acetate	108-05-4	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 2-Butanone (MEK)	78-93-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 2-Hexanone (MBK)	591-78-6	5	mg/kg	<5	<5	0.00	No Limit
ES1838250-001	Anonymous	EP074: Vinyl Acetate	108-05-4	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 2-Butanone (MEK)	78-93-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 2-Hexanone (MBK)	591-78-6	5	mg/kg	<5	<5	0.00	No Limit
EP074C: Sulfonated Compounds (QC Lot: 2103659)									
ES1838116-005	BH03@2.00	EP074: Carbon disulfide	75-15-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838116-020	BH08@1.00	EP074: Carbon disulfide	75-15-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074C: Sulfonated Compounds (QC Lot: 2103665)									
ES1837145-001	Anonymous	EP074: Carbon disulfide	75-15-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838250-001	Anonymous	EP074: Carbon disulfide	75-15-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074D: Fumigants (QC Lot: 2103659)									
ES1838116-005	BH03@2.00	EP074: 2.2-Dichloropropane	594-20-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dichloropropane	78-87-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP074D: Fumigants (QC Lot: 2103659) - continued									
ES1838116-005	BH03@2.00	EP074: 1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838116-020	BH08@1.00	EP074: 2.2-Dichloropropane	594-20-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dichloropropane	78-87-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074D: Fumigants (QC Lot: 2103665)									
ES1837145-001	Anonymous	EP074: 2.2-Dichloropropane	594-20-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dichloropropane	78-87-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838250-001	Anonymous	EP074: 2.2-Dichloropropane	594-20-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dichloropropane	78-87-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074E: Halogenated Aliphatic Compounds (QC Lot: 2103659)									
ES1838116-005	BH03@2.00	EP074: 1.1-Dichloroethene	75-35-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Iodomethane	74-88-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1-Dichloroethane	75-34-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.1-Trichloroethane	71-55-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1-Dichloropropylene	563-58-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Carbon Tetrachloride	56-23-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dichloroethane	107-06-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Trichloroethene	79-01-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dibromomethane	74-95-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.2-Trichloroethane	79-00-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.3-Dichloropropane	142-28-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Tetrachloroethene	127-18-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.3-Trichloropropane	96-18-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Pentachloroethane	76-01-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dichlorodifluoromethane	75-71-8	5	mg/kg	<5	<5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP074E: Halogenated Aliphatic Compounds (QC Lot: 2103659) - continued									
ES1838116-005	BH03@2.00	EP074: Chloromethane	74-87-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Vinyl chloride	75-01-4	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Bromomethane	74-83-9	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Chloroethane	75-00-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Trichlorofluoromethane	75-69-4	5	mg/kg	<5	<5	0.00	No Limit
ES1838116-020	BH08@1.00	EP074: 1.1-Dichloroethene	75-35-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Iodomethane	74-88-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1-Dichloroethane	75-34-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.1-Trichloroethane	71-55-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1-Dichloropropylene	563-58-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Carbon Tetrachloride	56-23-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dichloroethane	107-06-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Trichloroethene	79-01-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dibromomethane	74-95-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.2-Trichloroethane	79-00-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.3-Dichloropropane	142-28-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Tetrachloroethene	127-18-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.3-Trichloropropane	96-18-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Pentachloroethane	76-01-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dichlorodifluoromethane	75-71-8	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Chloromethane	74-87-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Vinyl chloride	75-01-4	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Bromomethane	74-83-9	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Chloroethane	75-00-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Trichlorofluoromethane	75-69-4	5	mg/kg	<5	<5	0.00	No Limit
EP074E: Halogenated Aliphatic Compounds (QC Lot: 2103665)									
ES1837145-001	Anonymous	EP074: 1.1-Dichloroethene	75-35-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Iodomethane	74-88-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1-Dichloroethane	75-34-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.1-Trichloroethane	71-55-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1-Dichloropropylene	563-58-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP074E: Halogenated Aliphatic Compounds (QC Lot: 2103665) - continued									
ES1837145-001	Anonymous	EP074: Carbon Tetrachloride	56-23-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dichloroethane	107-06-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Trichloroethene	79-01-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dibromomethane	74-95-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.2-Trichloroethane	79-00-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.3-Dichloropropane	142-28-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Tetrachloroethene	127-18-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.3-Trichloropropane	96-18-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Pentachloroethane	76-01-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dichlorodifluoromethane	75-71-8	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Chloromethane	74-87-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Vinyl chloride	75-01-4	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Bromomethane	74-83-9	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Chloroethane	75-00-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Trichlorofluoromethane	75-69-4	5	mg/kg	<5	<5	0.00	No Limit
ES1838250-001	Anonymous	EP074: 1.1-Dichloroethene	75-35-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Iodomethane	74-88-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1-Dichloroethane	75-34-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.1-Trichloroethane	71-55-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1-Dichloropropylene	563-58-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Carbon Tetrachloride	56-23-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dichloroethane	107-06-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Trichloroethene	79-01-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dibromomethane	74-95-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.2-Trichloroethane	79-00-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.3-Dichloropropane	142-28-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Tetrachloroethene	127-18-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.3-Trichloropropane	96-18-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Pentachloroethane	76-01-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP074E: Halogenated Aliphatic Compounds (QC Lot: 2103665) - continued									
ES1838250-001	Anonymous	EP074: 1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dichlorodifluoromethane	75-71-8	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Chloromethane	74-87-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Vinyl chloride	75-01-4	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Bromomethane	74-83-9	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Chloroethane	75-00-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Trichlorofluoromethane	75-69-4	5	mg/kg	<5	<5	0.00	No Limit
EP074F: Halogenated Aromatic Compounds (QC Lot: 2103659)									
ES1838116-005	BH03@2.00	EP074: Chlorobenzene	108-90-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromobenzene	108-86-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 2-Chlorotoluene	95-49-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 4-Chlorotoluene	106-43-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838116-020	BH08@1.00	EP074: Chlorobenzene	108-90-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromobenzene	108-86-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 2-Chlorotoluene	95-49-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 4-Chlorotoluene	106-43-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074F: Halogenated Aromatic Compounds (QC Lot: 2103665)									
ES1837145-001	Anonymous	EP074: Chlorobenzene	108-90-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromobenzene	108-86-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 2-Chlorotoluene	95-49-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 4-Chlorotoluene	106-43-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838250-001	Anonymous	EP074: Chlorobenzene	108-90-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromobenzene	108-86-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 2-Chlorotoluene	95-49-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 4-Chlorotoluene	106-43-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074G: Trihalomethanes (QC Lot: 2103659)									
ES1838116-005	BH03@2.00	EP074: Chloroform	67-66-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromodichloromethane	75-27-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dibromochloromethane	124-48-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromoform	75-25-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838116-020	BH08@1.00	EP074: Chloroform	67-66-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromodichloromethane	75-27-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dibromochloromethane	124-48-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromoform	75-25-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074G: Trihalomethanes (QC Lot: 2103665)									

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP074G: Trihalomethanes (QC Lot: 2103665) - continued									
ES1837145-001	Anonymous	EP074: Chloroform	67-66-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromodichloromethane	75-27-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dibromochloromethane	124-48-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromoform	75-25-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838250-001	Anonymous	EP074: Chloroform	67-66-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromodichloromethane	75-27-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dibromochloromethane	124-48-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromoform	75-25-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075A: Phenolic Compounds (QC Lot: 2102247)									
ES1838116-005	BH03@2.00	EP075: Phenol	108-95-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Chlorophenol	95-57-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Methylphenol	95-48-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3- & 4-Methylphenol	1319-77-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Nitrophenol	88-75-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4-Dimethylphenol	105-67-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4-Dichlorophenol	120-83-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.6-Dichlorophenol	87-65-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachlorophenol	87-86-5	1	mg/kg	<1	<1	0.00	No Limit
ES1838116-020	BH08@1.00	EP075: Phenol	108-95-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Chlorophenol	95-57-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Methylphenol	95-48-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3- & 4-Methylphenol	1319-77-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Nitrophenol	88-75-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4-Dimethylphenol	105-67-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4-Dichlorophenol	120-83-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.6-Dichlorophenol	87-65-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachlorophenol	87-86-5	1	mg/kg	<1	<1	0.00	No Limit
EP075A: Phenolic Compounds (QC Lot: 2103932)									
ES1838116-043	BH16@3.00	EP075: Phenol	108-95-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Chlorophenol	95-57-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Methylphenol	95-48-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3- & 4-Methylphenol	1319-77-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Nitrophenol	88-75-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4-Dimethylphenol	105-67-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075A: Phenolic Compounds (QC Lot: 2103932) - continued									
ES1838116-043	BH16@3.00	EP075: 2.4-Dichlorophenol	120-83-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.6-Dichlorophenol	87-65-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachlorophenol	87-86-5	1	mg/kg	<1	<1	0.00	No Limit
ES1838118-003	Anonymous	EP075: Phenol	108-95-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Chlorophenol	95-57-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Methylphenol	95-48-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3- & 4-Methylphenol	1319-77-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Nitrophenol	88-75-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4-Dimethylphenol	105-67-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4-Dichlorophenol	120-83-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.6-Dichlorophenol	87-65-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachlorophenol	87-86-5	1	mg/kg	<1	<1	0.00	No Limit
EP075B: Polynuclear Aromatic Hydrocarbons (QC Lot: 2102247)									
ES1838116-005	BH03@2.00	EP075: Naphthalene	91-20-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Methylnaphthalene	91-57-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Chloronaphthalene	91-58-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acenaphthylene	208-96-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acenaphthene	83-32-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fluorene	86-73-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Phenanthrene	85-01-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Anthracene	120-12-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fluoranthene	206-44-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pyrene	129-00-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benz(a)anthracene	56-55-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chrysene	218-01-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(a)pyrene	50-32-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3-Methylcholanthrene	56-49-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg	<1	<1	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075B: Polynuclear Aromatic Hydrocarbons (QC Lot: 2102247) - continued									
ES1838116-020	BH08@1.00	EP075: Naphthalene	91-20-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Methylnaphthalene	91-57-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Chloronaphthalene	91-58-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acenaphthylene	208-96-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acenaphthene	83-32-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fluorene	86-73-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Phenanthrene	85-01-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Anthracene	120-12-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fluoranthene	206-44-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pyrene	129-00-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benz(a)anthracene	56-55-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chrysene	218-01-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(a)pyrene	50-32-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3-Methylcholanthrene	56-49-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg	<1	<1	0.00	No Limit
EP075B: Polynuclear Aromatic Hydrocarbons (QC Lot: 2103932)									
ES1838116-043	BH16@3.00	EP075: Naphthalene	91-20-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Methylnaphthalene	91-57-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Chloronaphthalene	91-58-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acenaphthylene	208-96-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acenaphthene	83-32-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fluorene	86-73-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Phenanthrene	85-01-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Anthracene	120-12-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fluoranthene	206-44-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pyrene	129-00-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benz(a)anthracene	56-55-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chrysene	218-01-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(a)pyrene	50-32-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3-Methylcholanthrene	56-49-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075B: Polynuclear Aromatic Hydrocarbons (QC Lot: 2103932) - continued									
ES1838116-043	BH16@3.00	EP075: Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg	<1	<1	0.00	No Limit
ES1838118-003	Anonymous	EP075: Naphthalene	91-20-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Methylnaphthalene	91-57-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Chloronaphthalene	91-58-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acenaphthylene	208-96-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acenaphthene	83-32-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fluorene	86-73-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Phenanthrene	85-01-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Anthracene	120-12-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fluoranthene	206-44-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pyrene	129-00-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benz(a)anthracene	56-55-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chrysene	218-01-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(a)pyrene	50-32-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3-Methylcholanthrene	56-49-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg	<1	<1	0.00	No Limit
EP075C: Phthalate Esters (QC Lot: 2102247)									
ES1838116-005	BH03@2.00	EP075: Dimethyl phthalate	131-11-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Diethyl phthalate	84-66-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Di-n-butyl phthalate	84-74-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Butyl benzyl phthalate	85-68-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Di-n-octylphthalate	117-84-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838116-020	BH08@1.00	EP075: Dimethyl phthalate	131-11-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Diethyl phthalate	84-66-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Di-n-butyl phthalate	84-74-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Butyl benzyl phthalate	85-68-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Di-n-octylphthalate	117-84-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075C: Phthalate Esters (QC Lot: 2103932)									
ES1838116-043	BH16@3.00	EP075: Dimethyl phthalate	131-11-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Diethyl phthalate	84-66-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Di-n-butyl phthalate	84-74-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Butyl benzyl phthalate	85-68-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075C: Phthalate Esters (QC Lot: 2103932) - continued									
ES1838116-043	BH16@3.00	EP075: Di-n-octylphthalate	117-84-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838118-003	Anonymous	EP075: Dimethyl phthalate	131-11-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Diethyl phthalate	84-66-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Di-n-butyl phthalate	84-74-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Butyl benzyl phthalate	85-68-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Di-n-octylphthalate	117-84-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075D: Nitrosamines (QC Lot: 2102247)									
ES1838116-005	BH03@2.00	EP075: N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodiethylamine	55-18-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosopyrrolidine	930-55-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: N-Nitrosomorpholine	59-89-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosopiperidine	100-75-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodibutylamine	924-16-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Methapyrilene	91-80-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838116-020	BH08@1.00	EP075: N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodiethylamine	55-18-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosopyrrolidine	930-55-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: N-Nitrosomorpholine	59-89-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosopiperidine	100-75-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodibutylamine	924-16-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Methapyrilene	91-80-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075D: Nitrosamines (QC Lot: 2103932)									
ES1838116-043	BH16@3.00	EP075: N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodiethylamine	55-18-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosopyrrolidine	930-55-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: N-Nitrosomorpholine	59-89-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosopiperidine	100-75-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodibutylamine	924-16-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Methapyrilene	91-80-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838118-003	Anonymous	EP075: N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodiethylamine	55-18-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075D: Nitrosamines (QC Lot: 2103932) - continued									
ES1838118-003	Anonymous	EP075: N-Nitrosopyrrolidine	930-55-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: N-Nitrosomorpholine	59-89-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosopiperidine	100-75-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodibutylamine	924-16-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Methapyrilene	91-80-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075E: Nitroaromatics and Ketones (QC Lot: 2102247)									
ES1838116-005	BH03@2.00	EP075: 2-Picoline	109-06-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acetophenone	98-86-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Nitrobenzene	98-95-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Isophorone	78-59-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.6-Dinitrotoluene	606-20-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 2.4-Dinitrotoluene	121-14-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 1-Naphthylamine	134-32-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 5-Nitro-o-toluidine	99-55-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Phenacetin	62-44-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Aminobiphenyl	92-67-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachloronitrobenzene	82-68-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pronamide	23950-58-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dimethylaminoazobenzene	60-11-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorobenzilate	510-15-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Azobenzene	103-33-3	1	mg/kg	<1	<1	0.00	No Limit
ES1838116-020	BH08@1.00	EP075: 2-Picoline	109-06-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acetophenone	98-86-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Nitrobenzene	98-95-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Isophorone	78-59-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.6-Dinitrotoluene	606-20-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 2.4-Dinitrotoluene	121-14-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 1-Naphthylamine	134-32-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 5-Nitro-o-toluidine	99-55-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Phenacetin	62-44-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Aminobiphenyl	92-67-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachloronitrobenzene	82-68-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pronamide	23950-58-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075E: Nitroaromatics and Ketones (QC Lot: 2102247) - continued									
ES1838116-020	BH08@1.00	EP075: Dimethylaminoazobenzene	60-11-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorobenzilate	510-15-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Azobenzene	103-33-3	1	mg/kg	<1	<1	0.00	No Limit
EP075E: Nitroaromatics and Ketones (QC Lot: 2103932)									
ES1838116-043	BH16@3.00	EP075: 2-Picoline	109-06-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acetophenone	98-86-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Nitrobenzene	98-95-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Isophorone	78-59-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.6-Dinitrotoluene	606-20-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 2.4-Dinitrotoluene	121-14-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 1-Naphthylamine	134-32-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 5-Nitro-o-toluidine	99-55-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Phenacetin	62-44-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Aminobiphenyl	92-67-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachloronitrobenzene	82-68-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pronamide	23950-58-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dimethylaminoazobenzene	60-11-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorobenzilate	510-15-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Azobenzene	103-33-3	1	mg/kg	<1	<1	0.00	No Limit
ES1838118-003	Anonymous	EP075: 2-Picoline	109-06-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acetophenone	98-86-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Nitrobenzene	98-95-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Isophorone	78-59-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.6-Dinitrotoluene	606-20-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 2.4-Dinitrotoluene	121-14-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 1-Naphthylamine	134-32-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 5-Nitro-o-toluidine	99-55-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Phenacetin	62-44-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Aminobiphenyl	92-67-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachloronitrobenzene	82-68-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pronamide	23950-58-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dimethylaminoazobenzene	60-11-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorobenzilate	510-15-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Azobenzene	103-33-3	1	mg/kg	<1	<1	0.00	No Limit
EP075F: Haloethers (QC Lot: 2102247)									
ES1838116-005	BH03@2.00	EP075: Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075F: Haloethers (QC Lot: 2102247) - continued									
ES1838116-005	BH03@2.00	EP075: Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838116-020	BH08@1.00	EP075: Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075F: Haloethers (QC Lot: 2103932)									
ES1838116-043	BH16@3.00	EP075: Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838118-003	Anonymous	EP075: Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075G: Chlorinated Hydrocarbons (QC Lot: 2102247)									
ES1838116-005	BH03@2.00	EP075: 1.3-Dichlorobenzene	541-73-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.4-Dichlorobenzene	106-46-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.2-Dichlorobenzene	95-50-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachloroethane	67-72-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachloropropylene	1888-71-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachlorobutadiene	87-68-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachlorobenzene	608-93-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachlorobenzene (HCB)	118-74-1	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg	<2.5	<2.5	0.00	No Limit
ES1838116-020	BH08@1.00	EP075: 1.3-Dichlorobenzene	541-73-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.4-Dichlorobenzene	106-46-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.2-Dichlorobenzene	95-50-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachloroethane	67-72-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachloropropylene	1888-71-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachlorobutadiene	87-68-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachlorobenzene	608-93-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachlorobenzene (HCB)	118-74-1	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg	<2.5	<2.5	0.00	No Limit
EP075G: Chlorinated Hydrocarbons (QC Lot: 2103932)									
ES1838116-043	BH16@3.00	EP075: 1.3-Dichlorobenzene	541-73-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.4-Dichlorobenzene	106-46-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075G: Chlorinated Hydrocarbons (QC Lot: 2103932) - continued									
ES1838116-043	BH16@3.00	EP075: 1.2-Dichlorobenzene	95-50-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachloroethane	67-72-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachloropropylene	1888-71-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachlorobutadiene	87-68-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachlorobenzene	608-93-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachlorobenzene (HCB)	118-74-1	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg	<2.5	<2.5	0.00	No Limit
ES1838118-003	Anonymous	EP075: 1.3-Dichlorobenzene	541-73-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.4-Dichlorobenzene	106-46-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.2-Dichlorobenzene	95-50-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachloroethane	67-72-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachloropropylene	1888-71-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachlorobutadiene	87-68-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachlorobenzene	608-93-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachlorobenzene (HCB)	118-74-1	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg	<2.5	<2.5	0.00	No Limit
EP075H: Anilines and Benzidines (QC Lot: 2102247)									
ES1838116-005	BH03@2.00	EP075: Aniline	62-53-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chloroaniline	106-47-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Nitroaniline	88-74-4	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 3-Nitroaniline	99-09-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Dibenzofuran	132-64-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Nitroaniline	100-01-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Carbazole	86-74-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838116-020	BH08@1.00	EP075: Aniline	62-53-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chloroaniline	106-47-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Nitroaniline	88-74-4	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 3-Nitroaniline	99-09-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Dibenzofuran	132-64-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Nitroaniline	100-01-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Carbazole	86-74-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075H: Anilines and Benzidines (QC Lot: 2103932)									
ES1838116-043	BH16@3.00	EP075: Aniline	62-53-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chloroaniline	106-47-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Nitroaniline	88-74-4	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 3-Nitroaniline	99-09-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075H: Anilines and Benzidines (QC Lot: 2103932) - continued									
ES1838116-043	BH16@3.00	EP075: Dibenzofuran	132-64-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Nitroaniline	100-01-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Carbazole	86-74-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838118-003	Anonymous	EP075: Aniline	62-53-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chloroaniline	106-47-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Nitroaniline	88-74-4	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 3-Nitroaniline	99-09-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Dibenzofuran	132-64-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Nitroaniline	100-01-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Carbazole	86-74-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075I: Organochlorine Pesticides (QC Lot: 2102247)									
ES1838116-005	BH03@2.00	EP075: alpha-BHC	319-84-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: beta-BHC	319-85-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: gamma-BHC	58-89-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: delta-BHC	319-86-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Heptachlor	76-44-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Aldrin	309-00-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Heptachlor epoxide	1024-57-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: alpha-Endosulfan	959-98-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4.4`-DDE	72-55-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dieldrin	60-57-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Endrin	72-20-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: beta-Endosulfan	33213-65-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4.4`-DDD	72-54-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Endosulfan sulfate	1031-07-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4.4`-DDT	50-29-3	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
ES1838116-020	BH08@1.00	EP075: alpha-BHC	319-84-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: beta-BHC	319-85-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: gamma-BHC	58-89-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: delta-BHC	319-86-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Heptachlor	76-44-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Aldrin	309-00-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Heptachlor epoxide	1024-57-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: alpha-Endosulfan	959-98-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4.4`-DDE	72-55-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dieldrin	60-57-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Endrin	72-20-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: beta-Endosulfan	33213-65-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075I: Organochlorine Pesticides (QC Lot: 2102247) - continued									
ES1838116-020	BH08@1.00	EP075: 4.4`-DDD	72-54-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Endosulfan sulfate	1031-07-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4.4`-DDT	50-29-3	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
EP075I: Organochlorine Pesticides (QC Lot: 2103932)									
ES1838116-043	BH16@3.00	EP075: alpha-BHC	319-84-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: beta-BHC	319-85-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: gamma-BHC	58-89-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: delta-BHC	319-86-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Heptachlor	76-44-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Aldrin	309-00-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Heptachlor epoxide	1024-57-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: alpha-Endosulfan	959-98-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4.4`-DDE	72-55-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dieldrin	60-57-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Endrin	72-20-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: beta-Endosulfan	33213-65-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4.4`-DDD	72-54-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Endosulfan sulfate	1031-07-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4.4`-DDT	50-29-3	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
ES1838118-003	Anonymous	EP075: alpha-BHC	319-84-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: beta-BHC	319-85-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: gamma-BHC	58-89-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: delta-BHC	319-86-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Heptachlor	76-44-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Aldrin	309-00-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Heptachlor epoxide	1024-57-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: alpha-Endosulfan	959-98-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4.4`-DDE	72-55-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dieldrin	60-57-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Endrin	72-20-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: beta-Endosulfan	33213-65-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4.4`-DDD	72-54-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Endosulfan sulfate	1031-07-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4.4`-DDT	50-29-3	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
EP075J: Organophosphorus Pesticides (QC Lot: 2102247)									
ES1838116-005	BH03@2.00	EP075: Dichlorvos	62-73-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dimethoate	60-51-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Diazinon	333-41-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorpyrifos-methyl	5598-13-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Malathion	121-75-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075J: Organophosphorus Pesticides (QC Lot: 2102247) - continued									
ES1838116-005	BH03@2.00	EP075: Fenthion	55-38-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorpyrifos	2921-88-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pirimphos-ethyl	23505-41-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorfenvinphos	470-90-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Prothiofos	34643-46-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Ethion	563-12-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838116-020	BH08@1.00	EP075: Dichlorvos	62-73-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dimethoate	60-51-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Diazinon	333-41-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorpyrifos-methyl	5598-13-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Malathion	121-75-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fenthion	55-38-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorpyrifos	2921-88-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pirimphos-ethyl	23505-41-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorfenvinphos	470-90-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Prothiofos	34643-46-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Ethion	563-12-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075J: Organophosphorus Pesticides (QC Lot: 2103932)									
ES1838116-043	BH16@3.00	EP075: Dichlorvos	62-73-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dimethoate	60-51-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Diazinon	333-41-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorpyrifos-methyl	5598-13-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Malathion	121-75-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fenthion	55-38-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorpyrifos	2921-88-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pirimphos-ethyl	23505-41-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorfenvinphos	470-90-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Prothiofos	34643-46-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Ethion	563-12-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838118-003	Anonymous	EP075: Dichlorvos	62-73-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dimethoate	60-51-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Diazinon	333-41-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorpyrifos-methyl	5598-13-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Malathion	121-75-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fenthion	55-38-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorpyrifos	2921-88-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pirimphos-ethyl	23505-41-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorfenvinphos	470-90-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Prothiofos	34643-46-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Ethion	563-12-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP080/071: Total Petroleum Hydrocarbons (QC Lot: 2102250)									
ES1838116-005	BH03@2.00	EP071: C15 - C28 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: C29 - C36 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: C10 - C14 Fraction	----	50	mg/kg	<50	<50	0.00	No Limit
ES1838116-020	BH08@1.00	EP071: C15 - C28 Fraction	----	100	mg/kg	150	150	0.00	No Limit
		EP071: C29 - C36 Fraction	----	100	mg/kg	380	380	0.00	No Limit
		EP071: C10 - C14 Fraction	----	50	mg/kg	<50	<50	0.00	No Limit
EP080/071: Total Petroleum Hydrocarbons (QC Lot: 2103660)									
ES1838116-005	BH03@2.00	EP080: C6 - C9 Fraction	----	10	mg/kg	<10	<10	0.00	No Limit
ES1838116-020	BH08@1.00	EP080: C6 - C9 Fraction	----	10	mg/kg	<10	<10	0.00	No Limit
EP080/071: Total Petroleum Hydrocarbons (QC Lot: 2103664)									
ES1837145-001	Anonymous	EP080: C6 - C9 Fraction	----	10	mg/kg	<10	<10	0.00	No Limit
ES1838250-001	Anonymous	EP080: C6 - C9 Fraction	----	10	mg/kg	<10	<10	0.00	No Limit
EP080/071: Total Petroleum Hydrocarbons (QC Lot: 2103935)									
ES1838116-043	BH16@3.00	EP071: C15 - C28 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: C29 - C36 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: C10 - C14 Fraction	----	50	mg/kg	<50	<50	0.00	No Limit
ES1838118-003	Anonymous	EP071: C15 - C28 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: C29 - C36 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: C10 - C14 Fraction	----	50	mg/kg	<50	<50	0.00	No Limit
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QC Lot: 2102250)									
ES1838116-005	BH03@2.00	EP071: >C16 - C34 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: >C34 - C40 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: >C10 - C16 Fraction	----	50	mg/kg	<50	<50	0.00	No Limit
ES1838116-020	BH08@1.00	EP071: >C16 - C34 Fraction	----	100	mg/kg	430	430	0.00	No Limit
		EP071: >C34 - C40 Fraction	----	100	mg/kg	330	340	0.00	No Limit
		EP071: >C10 - C16 Fraction	----	50	mg/kg	<50	<50	0.00	No Limit
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QC Lot: 2103660)									
ES1838116-005	BH03@2.00	EP080: C6 - C10 Fraction	C6_C10	10	mg/kg	<10	<10	0.00	No Limit
ES1838116-020	BH08@1.00	EP080: C6 - C10 Fraction	C6_C10	10	mg/kg	<10	<10	0.00	No Limit
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QC Lot: 2103664)									
ES1837145-001	Anonymous	EP080: C6 - C10 Fraction	C6_C10	10	mg/kg	<10	<10	0.00	No Limit
ES1838250-001	Anonymous	EP080: C6 - C10 Fraction	C6_C10	10	mg/kg	<10	<10	0.00	No Limit
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QC Lot: 2103935)									
ES1838116-043	BH16@3.00	EP071: >C16 - C34 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: >C34 - C40 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: >C10 - C16 Fraction	----	50	mg/kg	<50	<50	0.00	No Limit
ES1838118-003	Anonymous	EP071: >C16 - C34 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: >C34 - C40 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: >C10 - C16 Fraction	----	50	mg/kg	<50	<50	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP080: BTEXN (QC Lot: 2103660)									
ES1838116-005	BH03@2.00	EP080: Benzene	71-43-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP080: Toluene	108-88-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Naphthalene	91-20-3	1	mg/kg	<1	<1	0.00	No Limit
ES1838116-020	BH08@1.00	EP080: Benzene	71-43-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP080: Toluene	108-88-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Naphthalene	91-20-3	1	mg/kg	<1	<1	0.00	No Limit
EP080: BTEXN (QC Lot: 2103664)									
ES1837145-001	Anonymous	EP080: Benzene	71-43-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP080: Toluene	108-88-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Naphthalene	91-20-3	1	mg/kg	<1	<1	0.00	No Limit
ES1838250-001	Anonymous	EP080: Benzene	71-43-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP080: Toluene	108-88-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Naphthalene	91-20-3	1	mg/kg	<1	<1	0.00	No Limit
EP231A: Perfluoroalkyl Sulfonic Acids (QC Lot: 2107101)									
EP1814768-001	Anonymous	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
ES1838118-016	Anonymous	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP231A: Perfluoroalkyl Sulfonic Acids (QC Lot: 2107101) - continued									
ES1838118-016	Anonymous	EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	0.0003	0.0004	31.6	No Limit
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 2107101)									
EP1814768-001	Anonymous	EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	<0.001	0.00	No Limit
ES1838118-016	Anonymous	EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	<0.001	0.00	No Limit
EP231C: Perfluoroalkyl Sulfonamides (QC Lot: 2107101)									
EP1814768-001	Anonymous	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
ES1838118-016	Anonymous	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP231C: Perfluoroalkyl Sulfonamides (QC Lot: 2107101) - continued									
ES1838118-016	Anonymous	EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QC Lot: 2107101)									
EP1814768-001	Anonymous	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
ES1838118-016	Anonymous	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit

Method Blank (MB) and Laboratory Control Spike (LCS) Report

The quality control term Method / Laboratory Blank refers to an analyte free matrix to which all reagents are added in the same volumes or proportions as used in standard sample preparation. The purpose of this QC parameter is to monitor potential laboratory contamination. The quality control term Laboratory Control Spike (LCS) refers to a certified reference material, or a known interference free matrix spiked with target analytes. The purpose of this QC parameter is to monitor method precision and accuracy independent of sample matrix. Dynamic Recovery Limits are based on statistical evaluation of processed LCS.

Sub-Matrix: **SOIL**

				Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
Method: Compound	CAS Number	LOR	Unit	Result	Concentration	LCS	Low	High
EG005T: Total Metals by ICP-AES (QCLot: 2111392)								
EG005T: Arsenic	7440-38-2	5	mg/kg	<5	21.7 mg/kg	93.1	86	126
EG005T: Cadmium	7440-43-9	1	mg/kg	<1	4.64 mg/kg	93.8	83	113
EG005T: Chromium	7440-47-3	2	mg/kg	<2	43.9 mg/kg	79.2	76	128
EG005T: Copper	7440-50-8	5	mg/kg	<5	32 mg/kg	91.2	86	120
EG005T: Lead	7439-92-1	5	mg/kg	<5	40 mg/kg	96.9	80	114
EG005T: Nickel	7440-02-0	2	mg/kg	<2	55 mg/kg	90.7	87	123
EG005T: Zinc	7440-66-6	5	mg/kg	<5	60.8 mg/kg	104	80	122
EG005T: Total Metals by ICP-AES (QCLot: 2111394)								
EG005T: Arsenic	7440-38-2	5	mg/kg	<5	21.7 mg/kg	95.8	86	126
EG005T: Cadmium	7440-43-9	1	mg/kg	<1	4.64 mg/kg	91.0	83	113
EG005T: Chromium	7440-47-3	2	mg/kg	<2	43.9 mg/kg	77.7	76	128
EG005T: Copper	7440-50-8	5	mg/kg	<5	32 mg/kg	89.6	86	120
EG005T: Lead	7439-92-1	5	mg/kg	<5	40 mg/kg	89.9	80	114
EG005T: Nickel	7440-02-0	2	mg/kg	<2	55 mg/kg	90.0	87	123
EG005T: Zinc	7440-66-6	5	mg/kg	<5	60.8 mg/kg	105	80	122
EG035T: Total Recoverable Mercury by FIMS (QCLot: 2111391)								
EG035T: Mercury	7439-97-6	0.1	mg/kg	<0.1	2.57 mg/kg	77.3	70	105
EG035T: Total Recoverable Mercury by FIMS (QCLot: 2111393)								
EG035T: Mercury	7439-97-6	0.1	mg/kg	<0.1	2.57 mg/kg	72.4	70	105
EP066: Polychlorinated Biphenyls (PCB) (QCLot: 2102248)								
EP066: Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	1 mg/kg	85.0	62	126
EP066: Polychlorinated Biphenyls (PCB) (QCLot: 2103933)								
EP066: Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	1 mg/kg	104	62	126
EP068A: Organochlorine Pesticides (OC) (QCLot: 2102249)								
EP068: alpha-BHC	319-84-6	0.05	mg/kg	<0.05	0.5 mg/kg	89.4	69	113
EP068: Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	0.5 mg/kg	93.5	65	117
EP068: beta-BHC	319-85-7	0.05	mg/kg	<0.05	0.5 mg/kg	89.4	67	119
EP068: gamma-BHC	58-89-9	0.05	mg/kg	<0.05	0.5 mg/kg	93.0	68	116
EP068: delta-BHC	319-86-8	0.05	mg/kg	<0.05	0.5 mg/kg	91.1	65	117
EP068: Heptachlor	76-44-8	0.05	mg/kg	<0.05	0.5 mg/kg	84.5	67	115
EP068: Aldrin	309-00-2	0.05	mg/kg	<0.05	0.5 mg/kg	106	69	115
EP068: Heptachlor epoxide	1024-57-3	0.05	mg/kg	<0.05	0.5 mg/kg	93.3	62	118
EP068: trans-Chlordane	5103-74-2	0.05	mg/kg	<0.05	0.5 mg/kg	91.2	63	117

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP068A: Organochlorine Pesticides (OC) (QCLot: 2102249) - continued								
EP068: alpha-Endosulfan	959-98-8	0.05	mg/kg	<0.05	0.5 mg/kg	106	66	116
EP068: cis-Chlordane	5103-71-9	0.05	mg/kg	<0.05	0.5 mg/kg	88.1	64	116
EP068: Dieldrin	60-57-1	0.05	mg/kg	<0.05	0.5 mg/kg	102	66	116
EP068: 4.4`-DDE	72-55-9	0.05	mg/kg	<0.05	0.5 mg/kg	101	67	115
EP068: Endrin	72-20-8	0.05	mg/kg	<0.05	0.5 mg/kg	93.6	67	123
EP068: beta-Endosulfan	33213-65-9	0.05	mg/kg	<0.05	0.5 mg/kg	93.2	69	115
EP068: 4.4`-DDD	72-54-8	0.05	mg/kg	<0.05	0.5 mg/kg	104	69	121
EP068: Endrin aldehyde	7421-93-4	0.05	mg/kg	<0.05	0.5 mg/kg	86.8	56	120
EP068: Endosulfan sulfate	1031-07-8	0.05	mg/kg	<0.05	0.5 mg/kg	103	62	124
EP068: 4.4`-DDT	50-29-3	0.2	mg/kg	<0.2	0.5 mg/kg	97.5	66	120
EP068: Endrin ketone	53494-70-5	0.05	mg/kg	<0.05	0.5 mg/kg	99.5	64	122
EP068: Methoxychlor	72-43-5	0.2	mg/kg	<0.2	0.5 mg/kg	109	54	130
EP068A: Organochlorine Pesticides (OC) (QCLot: 2103934)								
EP068: alpha-BHC	319-84-6	0.05	mg/kg	<0.05	0.5 mg/kg	100	69	113
EP068: Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	0.5 mg/kg	102	65	117
EP068: beta-BHC	319-85-7	0.05	mg/kg	<0.05	0.5 mg/kg	111	67	119
EP068: gamma-BHC	58-89-9	0.05	mg/kg	<0.05	0.5 mg/kg	104	68	116
EP068: delta-BHC	319-86-8	0.05	mg/kg	<0.05	0.5 mg/kg	99.9	65	117
EP068: Heptachlor	76-44-8	0.05	mg/kg	<0.05	0.5 mg/kg	88.2	67	115
EP068: Aldrin	309-00-2	0.05	mg/kg	<0.05	0.5 mg/kg	93.3	69	115
EP068: Heptachlor epoxide	1024-57-3	0.05	mg/kg	<0.05	0.5 mg/kg	103	62	118
EP068: trans-Chlordane	5103-74-2	0.05	mg/kg	<0.05	0.5 mg/kg	97.4	63	117
EP068: alpha-Endosulfan	959-98-8	0.05	mg/kg	<0.05	0.5 mg/kg	96.3	66	116
EP068: cis-Chlordane	5103-71-9	0.05	mg/kg	<0.05	0.5 mg/kg	99.3	64	116
EP068: Dieldrin	60-57-1	0.05	mg/kg	<0.05	0.5 mg/kg	91.8	66	116
EP068: 4.4`-DDE	72-55-9	0.05	mg/kg	<0.05	0.5 mg/kg	92.9	67	115
EP068: Endrin	72-20-8	0.05	mg/kg	<0.05	0.5 mg/kg	88.0	67	123
EP068: beta-Endosulfan	33213-65-9	0.05	mg/kg	<0.05	0.5 mg/kg	103	69	115
EP068: 4.4`-DDD	72-54-8	0.05	mg/kg	<0.05	0.5 mg/kg	101	69	121
EP068: Endrin aldehyde	7421-93-4	0.05	mg/kg	<0.05	0.5 mg/kg	81.6	56	120
EP068: Endosulfan sulfate	1031-07-8	0.05	mg/kg	<0.05	0.5 mg/kg	88.7	62	124
EP068: 4.4`-DDT	50-29-3	0.2	mg/kg	<0.2	0.5 mg/kg	90.6	66	120
EP068: Endrin ketone	53494-70-5	0.05	mg/kg	<0.05	0.5 mg/kg	102	64	122
EP068: Methoxychlor	72-43-5	0.2	mg/kg	<0.2	0.5 mg/kg	87.2	54	130
EP068B: Organophosphorus Pesticides (OP) (QCLot: 2102249)								
EP068: Dichlorvos	62-73-7	0.05	mg/kg	<0.05	0.5 mg/kg	86.8	59	119
EP068: Demeton-S-methyl	919-86-8	0.05	mg/kg	<0.05	0.5 mg/kg	109	62	128
EP068: Monocrotophos	6923-22-4	0.2	mg/kg	<0.2	0.5 mg/kg	62.9	54	126
EP068: Dimethoate	60-51-5	0.05	mg/kg	<0.05	0.5 mg/kg	90.5	67	119

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP068B: Organophosphorus Pesticides (OP) (QCLot: 2102249) - continued								
EP068: Diazinon	333-41-5	0.05	mg/kg	<0.05	0.5 mg/kg	97.5	70	120
EP068: Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg	<0.05	0.5 mg/kg	81.7	72	120
EP068: Parathion-methyl	298-00-0	0.2	mg/kg	<0.2	0.5 mg/kg	95.4	68	120
EP068: Malathion	121-75-5	0.05	mg/kg	<0.05	0.5 mg/kg	93.5	68	122
EP068: Fenthion	55-38-9	0.05	mg/kg	<0.05	0.5 mg/kg	96.2	69	117
EP068: Chlorpyrifos	2921-88-2	0.05	mg/kg	<0.05	0.5 mg/kg	100	76	118
EP068: Parathion	56-38-2	0.2	mg/kg	<0.2	0.5 mg/kg	102	64	122
EP068: Pirimphos-ethyl	23505-41-1	0.05	mg/kg	<0.05	0.5 mg/kg	99.5	70	116
EP068: Chlorfenvinphos	470-90-6	0.05	mg/kg	<0.05	0.5 mg/kg	84.6	69	121
EP068: Bromophos-ethyl	4824-78-6	0.05	mg/kg	<0.05	0.5 mg/kg	98.4	66	118
EP068: Fenamiphos	22224-92-6	0.05	mg/kg	<0.05	0.5 mg/kg	98.1	68	124
EP068: Prothiofos	34643-46-4	0.05	mg/kg	<0.05	0.5 mg/kg	108	62	112
EP068: Ethion	563-12-2	0.05	mg/kg	<0.05	0.5 mg/kg	100	68	120
EP068: Carbophenothion	786-19-6	0.05	mg/kg	<0.05	0.5 mg/kg	109	65	127
EP068: Azinphos Methyl	86-50-0	0.05	mg/kg	<0.05	0.5 mg/kg	75.4	41	123
EP068B: Organophosphorus Pesticides (OP) (QCLot: 2103934)								
EP068: Dichlorvos	62-73-7	0.05	mg/kg	<0.05	0.5 mg/kg	79.8	59	119
EP068: Demeton-S-methyl	919-86-8	0.05	mg/kg	<0.05	0.5 mg/kg	85.0	62	128
EP068: Monocrotophos	6923-22-4	0.2	mg/kg	<0.2	0.5 mg/kg	77.2	54	126
EP068: Dimethoate	60-51-5	0.05	mg/kg	<0.05	0.5 mg/kg	86.0	67	119
EP068: Diazinon	333-41-5	0.05	mg/kg	<0.05	0.5 mg/kg	91.6	70	120
EP068: Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg	<0.05	0.5 mg/kg	87.6	72	120
EP068: Parathion-methyl	298-00-0	0.2	mg/kg	<0.2	0.5 mg/kg	86.0	68	120
EP068: Malathion	121-75-5	0.05	mg/kg	<0.05	0.5 mg/kg	83.8	68	122
EP068: Fenthion	55-38-9	0.05	mg/kg	<0.05	0.5 mg/kg	102	69	117
EP068: Chlorpyrifos	2921-88-2	0.05	mg/kg	<0.05	0.5 mg/kg	94.2	76	118
EP068: Parathion	56-38-2	0.2	mg/kg	<0.2	0.5 mg/kg	99.2	64	122
EP068: Pirimphos-ethyl	23505-41-1	0.05	mg/kg	<0.05	0.5 mg/kg	92.5	70	116
EP068: Chlorfenvinphos	470-90-6	0.05	mg/kg	<0.05	0.5 mg/kg	84.0	69	121
EP068: Bromophos-ethyl	4824-78-6	0.05	mg/kg	<0.05	0.5 mg/kg	92.5	66	118
EP068: Fenamiphos	22224-92-6	0.05	mg/kg	<0.05	0.5 mg/kg	92.4	68	124
EP068: Prothiofos	34643-46-4	0.05	mg/kg	<0.05	0.5 mg/kg	92.0	62	112
EP068: Ethion	563-12-2	0.05	mg/kg	<0.05	0.5 mg/kg	88.5	68	120
EP068: Carbophenothion	786-19-6	0.05	mg/kg	<0.05	0.5 mg/kg	77.2	65	127
EP068: Azinphos Methyl	86-50-0	0.05	mg/kg	<0.05	0.5 mg/kg	57.0	41	123
EP074A: Monocyclic Aromatic Hydrocarbons (QCLot: 2103659)								
EP074: Benzene	71-43-2	0.2	mg/kg	<0.2	1 mg/kg	86.5	71	121
EP074: Toluene	108-88-3	0.5	mg/kg	<0.5	1 mg/kg	90.2	65	131
EP074: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	1 mg/kg	92.7	72	114

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP074A: Monocyclic Aromatic Hydrocarbons (QCLot: 2103659) - continued								
EP074: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	2 mg/kg	94.2	70	116
EP074: Styrene	100-42-5	0.5	mg/kg	<0.5	1 mg/kg	92.4	67	113
EP074: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	1 mg/kg	95.8	75	115
EP074: Isopropylbenzene	98-82-8	0.5	mg/kg	<0.5	1 mg/kg	93.1	65	117
EP074: n-Propylbenzene	103-65-1	0.5	mg/kg	<0.5	1 mg/kg	93.7	66	122
EP074: 1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg	<0.5	1 mg/kg	96.5	68	118
EP074: sec-Butylbenzene	135-98-8	0.5	mg/kg	<0.5	1 mg/kg	92.9	69	119
EP074: 1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg	<0.5	1 mg/kg	98.0	69	117
EP074: tert-Butylbenzene	98-06-6	0.5	mg/kg	<0.5	1 mg/kg	95.2	69	115
EP074: p-Isopropyltoluene	99-87-6	0.5	mg/kg	<0.5	1 mg/kg	93.8	66	118
EP074: n-Butylbenzene	104-51-8	0.5	mg/kg	<0.5	1 mg/kg	93.4	59	125
EP074A: Monocyclic Aromatic Hydrocarbons (QCLot: 2103665)								
EP074: Benzene	71-43-2	0.2	mg/kg	<0.2	1 mg/kg	97.1	71	121
EP074: Toluene	108-88-3	0.5	mg/kg	<0.5	1 mg/kg	102	65	131
EP074: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	1 mg/kg	98.8	72	114
EP074: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	2 mg/kg	96.5	70	116
EP074: Styrene	100-42-5	0.5	mg/kg	<0.5	1 mg/kg	91.5	67	113
EP074: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	1 mg/kg	101	75	115
EP074: Isopropylbenzene	98-82-8	0.5	mg/kg	<0.5	1 mg/kg	100	65	117
EP074: n-Propylbenzene	103-65-1	0.5	mg/kg	<0.5	1 mg/kg	91.3	66	122
EP074: 1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg	<0.5	1 mg/kg	91.5	68	118
EP074: sec-Butylbenzene	135-98-8	0.5	mg/kg	<0.5	1 mg/kg	94.6	69	119
EP074: 1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg	<0.5	1 mg/kg	88.9	69	117
EP074: tert-Butylbenzene	98-06-6	0.5	mg/kg	<0.5	1 mg/kg	95.2	69	115
EP074: p-Isopropyltoluene	99-87-6	0.5	mg/kg	<0.5	1 mg/kg	95.0	66	118
EP074: n-Butylbenzene	104-51-8	0.5	mg/kg	<0.5	1 mg/kg	85.8	59	125
EP074B: Oxygenated Compounds (QCLot: 2103659)								
EP074: Vinyl Acetate	108-05-4	5	mg/kg	<5	10 mg/kg	71.8	30	156
EP074: 2-Butanone (MEK)	78-93-3	5	mg/kg	<5	10 mg/kg	94.4	58	136
EP074: 4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg	<5	10 mg/kg	74.6	62	132
EP074: 2-Hexanone (MBK)	591-78-6	5	mg/kg	<5	10 mg/kg	75.3	54	136
EP074B: Oxygenated Compounds (QCLot: 2103665)								
EP074: Vinyl Acetate	108-05-4	5	mg/kg	<5	10 mg/kg	67.2	30	156
EP074: 2-Butanone (MEK)	78-93-3	5	mg/kg	<5	10 mg/kg	91.3	58	136
EP074: 4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg	<5	10 mg/kg	93.4	62	132
EP074: 2-Hexanone (MBK)	591-78-6	5	mg/kg	<5	10 mg/kg	100	54	136

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP074C: Sulfonated Compounds (QCLot: 2103659)								
EP074: Carbon disulfide	75-15-0	0.5	mg/kg	<0.5	1 mg/kg	91.4	54	126
EP074C: Sulfonated Compounds (QCLot: 2103665)								
EP074: Carbon disulfide	75-15-0	0.5	mg/kg	<0.5	1 mg/kg	84.5	54	126
EP074D: Fumigants (QCLot: 2103659)								
EP074: 2.2-Dichloropropane	594-20-7	0.5	mg/kg	<0.5	1 mg/kg	86.9	60	126
EP074: 1.2-Dichloropropane	78-87-5	0.5	mg/kg	<0.5	1 mg/kg	83.7	68	124
EP074: cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg	<0.5	1 mg/kg	87.6	51	119
EP074: trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg	<0.5	1 mg/kg	87.7	52	114
EP074: 1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg	<0.5	1 mg/kg	91.2	63	115
EP074D: Fumigants (QCLot: 2103665)								
EP074: 2.2-Dichloropropane	594-20-7	0.5	mg/kg	<0.5	1 mg/kg	87.4	60	126
EP074: 1.2-Dichloropropane	78-87-5	0.5	mg/kg	<0.5	1 mg/kg	98.1	68	124
EP074: cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg	<0.5	1 mg/kg	87.0	51	119
EP074: trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg	<0.5	1 mg/kg	85.5	52	114
EP074: 1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg	<0.5	1 mg/kg	106	63	115
EP074E: Halogenated Aliphatic Compounds (QCLot: 2103659)								
EP074: Dichlorodifluoromethane	75-71-8	5	mg/kg	<5	10 mg/kg	56.8	30	148
EP074: Chloromethane	74-87-3	5	mg/kg	<5	10 mg/kg	81.3	41	141
EP074: Vinyl chloride	75-01-4	5	mg/kg	<5	10 mg/kg	82.1	43	147
EP074: Bromomethane	74-83-9	5	mg/kg	<5	10 mg/kg	102	47	141
EP074: Chloroethane	75-00-3	5	mg/kg	<5	10 mg/kg	88.4	49	143
EP074: Trichlorofluoromethane	75-69-4	5	mg/kg	<5	10 mg/kg	87.4	49	135
EP074: 1.1-Dichloroethene	75-35-4	0.5	mg/kg	<0.5	1 mg/kg	92.0	54	126
EP074: Iodomethane	74-88-4	0.5	mg/kg	<0.5	1 mg/kg	87.7	43	129
EP074: trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg	<0.5	1 mg/kg	86.0	64	120
EP074: 1.1-Dichloroethane	75-34-3	0.5	mg/kg	<0.5	1 mg/kg	86.3	67	125
EP074: cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg	<0.5	1 mg/kg	87.2	69	121
EP074: 1.1.1-Trichloroethane	71-55-6	0.5	mg/kg	<0.5	1 mg/kg	88.0	65	117
EP074: 1.1-Dichloropropylene	563-58-6	0.5	mg/kg	<0.5	1 mg/kg	87.3	65	123
EP074: Carbon Tetrachloride	56-23-5	0.5	mg/kg	<0.5	1 mg/kg	88.0	59	125
EP074: 1.2-Dichloroethane	107-06-2	0.5	mg/kg	<0.5	1 mg/kg	83.9	65	125
EP074: Trichloroethene	79-01-6	0.5	mg/kg	<0.5	1 mg/kg	88.7	70	118
EP074: Dibromomethane	74-95-3	0.5	mg/kg	<0.5	1 mg/kg	84.8	68	118
EP074: 1.1.2-Trichloroethane	79-00-5	0.5	mg/kg	<0.5	1 mg/kg	92.6	64	126
EP074: 1.3-Dichloropropane	142-28-9	0.5	mg/kg	<0.5	1 mg/kg	89.2	68	122
EP074: Tetrachloroethene	127-18-4	0.5	mg/kg	<0.5	1 mg/kg	101	67	143
EP074: 1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg	<0.5	1 mg/kg	96.2	62	122
EP074: trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg	<0.5	1 mg/kg	85.2	54	128

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP074E: Halogenated Aliphatic Compounds (QCLot: 2103659) - continued								
EP074: cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg	<0.5	1 mg/kg	78.6	55	129
EP074: 1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg	<0.5	1 mg/kg	82.8	65	121
EP074: 1.2.3-Trichloropropane	96-18-4	0.5	mg/kg	<0.5	1 mg/kg	84.1	61	125
EP074: Pentachloroethane	76-01-7	0.5	mg/kg	<0.5	1 mg/kg	92.7	20	134
EP074: 1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg	<0.5	1 mg/kg	76.7	53	129
EP074E: Halogenated Aliphatic Compounds (QCLot: 2103665)								
EP074: Dichlorodifluoromethane	75-71-8	5	mg/kg	<5	10 mg/kg	54.1	30	148
EP074: Chloromethane	74-87-3	5	mg/kg	<5	10 mg/kg	82.7	41	141
EP074: Vinyl chloride	75-01-4	5	mg/kg	<5	10 mg/kg	78.6	43	147
EP074: Bromomethane	74-83-9	5	mg/kg	<5	10 mg/kg	83.7	47	141
EP074: Chloroethane	75-00-3	5	mg/kg	<5	10 mg/kg	96.2	49	143
EP074: Trichlorofluoromethane	75-69-4	5	mg/kg	<5	10 mg/kg	93.2	49	135
EP074: 1.1-Dichloroethene	75-35-4	0.5	mg/kg	<0.5	1 mg/kg	97.6	54	126
EP074: Iodomethane	74-88-4	0.5	mg/kg	<0.5	1 mg/kg	52.5	43	129
EP074: trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg	<0.5	1 mg/kg	106	64	120
EP074: 1.1-Dichloroethane	75-34-3	0.5	mg/kg	<0.5	1 mg/kg	114	67	125
EP074: cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg	<0.5	1 mg/kg	97.0	69	121
EP074: 1.1.1-Trichloroethane	71-55-6	0.5	mg/kg	<0.5	1 mg/kg	94.5	65	117
EP074: 1.1-Dichloropropylene	563-58-6	0.5	mg/kg	<0.5	1 mg/kg	91.9	65	123
EP074: Carbon Tetrachloride	56-23-5	0.5	mg/kg	<0.5	1 mg/kg	81.6	59	125
EP074: 1.2-Dichloroethane	107-06-2	0.5	mg/kg	<0.5	1 mg/kg	90.8	65	125
EP074: Trichloroethene	79-01-6	0.5	mg/kg	<0.5	1 mg/kg	97.0	70	118
EP074: Dibromomethane	74-95-3	0.5	mg/kg	<0.5	1 mg/kg	93.5	68	118
EP074: 1.1.2-Trichloroethane	79-00-5	0.5	mg/kg	<0.5	1 mg/kg	112	64	126
EP074: 1.3-Dichloropropane	142-28-9	0.5	mg/kg	<0.5	1 mg/kg	101	68	122
EP074: Tetrachloroethene	127-18-4	0.5	mg/kg	<0.5	1 mg/kg	103	67	143
EP074: 1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg	<0.5	1 mg/kg	95.7	62	122
EP074: trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg	<0.5	1 mg/kg	72.4	54	128
EP074: cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg	<0.5	1 mg/kg	89.8	55	129
EP074: 1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg	<0.5	1 mg/kg	95.4	65	121
EP074: 1.2.3-Trichloropropane	96-18-4	0.5	mg/kg	<0.5	1 mg/kg	94.2	61	125
EP074: Pentachloroethane	76-01-7	0.5	mg/kg	<0.5	1 mg/kg	89.5	20	134
EP074: 1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg	<0.5	1 mg/kg	89.8	53	129
EP074F: Halogenated Aromatic Compounds (QCLot: 2103659)								
EP074: Chlorobenzene	108-90-7	0.5	mg/kg	<0.5	1 mg/kg	93.6	68	116
EP074: Bromobenzene	108-86-1	0.5	mg/kg	<0.5	1 mg/kg	95.8	70	114
EP074: 2-Chlorotoluene	95-49-8	0.5	mg/kg	<0.5	1 mg/kg	92.8	68	122
EP074: 4-Chlorotoluene	106-43-4	0.5	mg/kg	<0.5	1 mg/kg	95.2	67	123
EP074: 1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg	<0.5	1 mg/kg	97.2	52	122

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP074F: Halogenated Aromatic Compounds (QCLot: 2103665)								
EP074: Chlorobenzene	108-90-7	0.5	mg/kg	<0.5	1 mg/kg	105	68	116
EP074: Bromobenzene	108-86-1	0.5	mg/kg	<0.5	1 mg/kg	94.9	70	114
EP074: 2-Chlorotoluene	95-49-8	0.5	mg/kg	<0.5	1 mg/kg	92.5	68	122
EP074: 4-Chlorotoluene	106-43-4	0.5	mg/kg	<0.5	1 mg/kg	90.2	67	123
EP074: 1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg	<0.5	1 mg/kg	90.8	52	122
EP074G: Trihalomethanes (QCLot: 2103659)								
EP074: Chloroform	67-66-3	0.5	mg/kg	<0.5	1 mg/kg	87.4	66	124
EP074: Bromodichloromethane	75-27-4	0.5	mg/kg	<0.5	1 mg/kg	88.7	61	121
EP074: Dibromochloromethane	124-48-1	0.5	mg/kg	<0.5	1 mg/kg	95.8	63	121
EP074: Bromoform	75-25-2	0.5	mg/kg	<0.5	1 mg/kg	91.0	60	126
EP074G: Trihalomethanes (QCLot: 2103665)								
EP074: Chloroform	67-66-3	0.5	mg/kg	<0.5	1 mg/kg	87.6	66	124
EP074: Bromodichloromethane	75-27-4	0.5	mg/kg	<0.5	1 mg/kg	89.6	61	121
EP074: Dibromochloromethane	124-48-1	0.5	mg/kg	<0.5	1 mg/kg	89.9	63	121
EP074: Bromoform	75-25-2	0.5	mg/kg	<0.5	1 mg/kg	81.8	60	126
EP075A: Phenolic Compounds (QCLot: 2102247)								
EP075: Phenol	108-95-2	0.5	mg/kg	<0.5	1.5 mg/kg	98.1	64	114
EP075: 2-Chlorophenol	95-57-8	0.5	mg/kg	<0.5	1.5 mg/kg	93.3	57	115
EP075: 2-Methylphenol	95-48-7	0.5	mg/kg	<0.5	1.5 mg/kg	97.0	55	117
EP075: 3- & 4-Methylphenol	1319-77-3	0.5	mg/kg	<0.5	1.5 mg/kg	97.4	46	122
EP075: 2-Nitrophenol	88-75-5	0.5	mg/kg	<0.5	1.5 mg/kg	92.6	47	117
EP075: 2.4-Dimethylphenol	105-67-9	0.5	mg/kg	<0.5	1.5 mg/kg	94.1	14	108
EP075: 2.4-Dichlorophenol	120-83-2	0.5	mg/kg	<0.5	1.5 mg/kg	94.6	47	105
EP075: 2.6-Dichlorophenol	87-65-0	0.5	mg/kg	<0.5	1.5 mg/kg	96.2	48	110
EP075: 4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg	<0.5	1.5 mg/kg	99.8	57	113
EP075: 2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg	<0.5	1.5 mg/kg	91.2	49	109
EP075: 2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg	<0.5	1.5 mg/kg	90.7	49	107
EP075: Pentachlorophenol	87-86-5	1	mg/kg	<1	3 mg/kg	44.0	12	76
EP075A: Phenolic Compounds (QCLot: 2103932)								
EP075: Phenol	108-95-2	0.5	mg/kg	<0.5	1.5 mg/kg	96.9	64	114
EP075: 2-Chlorophenol	95-57-8	0.5	mg/kg	<0.5	1.5 mg/kg	95.6	57	115
EP075: 2-Methylphenol	95-48-7	0.5	mg/kg	<0.5	1.5 mg/kg	93.2	55	117
EP075: 3- & 4-Methylphenol	1319-77-3	0.5	mg/kg	<0.5	1.5 mg/kg	99.8	46	122
EP075: 2-Nitrophenol	88-75-5	0.5	mg/kg	<0.5	1.5 mg/kg	92.5	47	117
EP075: 2.4-Dimethylphenol	105-67-9	0.5	mg/kg	<0.5	1.5 mg/kg	99.4	14	108
EP075: 2.4-Dichlorophenol	120-83-2	0.5	mg/kg	<0.5	1.5 mg/kg	94.8	47	105
EP075: 2.6-Dichlorophenol	87-65-0	0.5	mg/kg	<0.5	1.5 mg/kg	100	48	110
EP075: 4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg	<0.5	1.5 mg/kg	101	57	113

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP075A: Phenolic Compounds (QCLot: 2103932) - continued								
EP075: 2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg	<0.5	1.5 mg/kg	97.1	49	109
EP075: 2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg	<0.5	1.5 mg/kg	99.9	49	107
EP075: Pentachlorophenol	87-86-5	1	mg/kg	<1	3 mg/kg	35.1	12	76
EP075B: Polynuclear Aromatic Hydrocarbons (QCLot: 2102247)								
EP075: Naphthalene	91-20-3	0.5	mg/kg	<0.5	1.5 mg/kg	96.7	62	118
EP075: 2-Methylnaphthalene	91-57-6	0.5	mg/kg	<0.5	1.5 mg/kg	96.8	58	116
EP075: 2-Chloronaphthalene	91-58-7	0.5	mg/kg	<0.5	1.5 mg/kg	96.3	54	112
EP075: Acenaphthylene	208-96-8	0.5	mg/kg	<0.5	1.5 mg/kg	101	56	114
EP075: Acenaphthene	83-32-9	0.5	mg/kg	<0.5	1.5 mg/kg	96.2	62	112
EP075: Fluorene	86-73-7	0.5	mg/kg	<0.5	1.5 mg/kg	100	59	115
EP075: Phenanthrene	85-01-8	0.5	mg/kg	<0.5	1.5 mg/kg	99.1	63	113
EP075: Anthracene	120-12-7	0.5	mg/kg	<0.5	1.5 mg/kg	99.7	57	111
EP075: Fluoranthene	206-44-0	0.5	mg/kg	<0.5	1.5 mg/kg	104	58	114
EP075: Pyrene	129-00-0	0.5	mg/kg	<0.5	1.5 mg/kg	105	57	117
EP075: N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg	<0.5	1.5 mg/kg	91.3	58	114
EP075: Benz(a)anthracene	56-55-3	0.5	mg/kg	<0.5	1.5 mg/kg	98.3	59	115
EP075: Chrysene	218-01-9	0.5	mg/kg	<0.5	1.5 mg/kg	103	61	117
EP075: Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg	<1	3 mg/kg	103	57	119
EP075: 7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg	<0.5	1.5 mg/kg	99.5	48	106
EP075: Benzo(a)pyrene	50-32-8	0.5	mg/kg	<0.5	1.5 mg/kg	104	56	116
EP075: 3-Methylcholanthrene	56-49-5	0.5	mg/kg	<0.5	1.5 mg/kg	95.3	50	116
EP075: Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg	<0.5	1.5 mg/kg	95.4	55	117
EP075: Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg	<0.5	1.5 mg/kg	95.4	53	119
EP075: Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg	<0.5	1.5 mg/kg	97.2	56	120
EP075B: Polynuclear Aromatic Hydrocarbons (QCLot: 2103932)								
EP075: Naphthalene	91-20-3	0.5	mg/kg	<0.5	1.5 mg/kg	96.3	62	118
EP075: 2-Methylnaphthalene	91-57-6	0.5	mg/kg	<0.5	1.5 mg/kg	98.8	58	116
EP075: 2-Chloronaphthalene	91-58-7	0.5	mg/kg	<0.5	1.5 mg/kg	100	54	112
EP075: Acenaphthylene	208-96-8	0.5	mg/kg	<0.5	1.5 mg/kg	99.9	56	114
EP075: Acenaphthene	83-32-9	0.5	mg/kg	<0.5	1.5 mg/kg	94.7	62	112
EP075: Fluorene	86-73-7	0.5	mg/kg	<0.5	1.5 mg/kg	102	59	115
EP075: Phenanthrene	85-01-8	0.5	mg/kg	<0.5	1.5 mg/kg	96.1	63	113
EP075: Anthracene	120-12-7	0.5	mg/kg	<0.5	1.5 mg/kg	95.6	57	111
EP075: Fluoranthene	206-44-0	0.5	mg/kg	<0.5	1.5 mg/kg	91.1	58	114
EP075: Pyrene	129-00-0	0.5	mg/kg	<0.5	1.5 mg/kg	102	57	117
EP075: N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg	<0.5	1.5 mg/kg	85.2	58	114
EP075: Benz(a)anthracene	56-55-3	0.5	mg/kg	<0.5	1.5 mg/kg	98.5	59	115
EP075: Chrysene	218-01-9	0.5	mg/kg	<0.5	1.5 mg/kg	89.3	61	117

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP075B: Polynuclear Aromatic Hydrocarbons (QCLot: 2103932) - continued								
EP075: Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg	<1	3 mg/kg	102	57	119
EP075: 7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg	<0.5	1.5 mg/kg	102	48	106
EP075: Benzo(a)pyrene	50-32-8	0.5	mg/kg	<0.5	1.5 mg/kg	106	56	116
EP075: 3-Methylcholanthrene	56-49-5	0.5	mg/kg	<0.5	1.5 mg/kg	93.7	50	116
EP075: Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg	<0.5	1.5 mg/kg	93.9	55	117
EP075: Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg	<0.5	1.5 mg/kg	95.5	53	119
EP075: Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg	<0.5	1.5 mg/kg	97.0	56	120
EP075C: Phthalate Esters (QCLot: 2102247)								
EP075: Dimethyl phthalate	131-11-3	0.5	mg/kg	<0.5	1.5 mg/kg	101	60	118
EP075: Diethyl phthalate	84-66-2	0.5	mg/kg	<0.5	1.5 mg/kg	100	65	115
EP075: Di-n-butyl phthalate	84-74-2	0.5	mg/kg	<0.5	1.5 mg/kg	99.6	65	121
EP075: Butyl benzyl phthalate	85-68-7	0.5	mg/kg	<0.5	1.5 mg/kg	105	62	116
EP075: bis(2-ethylhexyl) phthalate	117-81-7	----	mg/kg	----	1.5 mg/kg	101	69	133
EP075: Di-n-octylphthalate	117-84-0	0.5	mg/kg	<0.5	1.5 mg/kg	96.6	62	124
EP075C: Phthalate Esters (QCLot: 2103932)								
EP075: Dimethyl phthalate	131-11-3	0.5	mg/kg	<0.5	1.5 mg/kg	99.1	60	118
EP075: Diethyl phthalate	84-66-2	0.5	mg/kg	<0.5	1.5 mg/kg	102	65	115
EP075: Di-n-butyl phthalate	84-74-2	0.5	mg/kg	<0.5	1.5 mg/kg	94.3	65	121
EP075: Butyl benzyl phthalate	85-68-7	0.5	mg/kg	<0.5	1.5 mg/kg	101	62	116
EP075: bis(2-ethylhexyl) phthalate	117-81-7	----	mg/kg	----	1.5 mg/kg	86.9	69	133
EP075: Di-n-octylphthalate	117-84-0	0.5	mg/kg	<0.5	1.5 mg/kg	87.6	62	124
EP075D: Nitrosamines (QCLot: 2102247)								
EP075: N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg	<0.5	1.5 mg/kg	91.4	39	124
EP075: N-Nitrosodiethylamine	55-18-5	0.5	mg/kg	<0.5	1.5 mg/kg	93.7	59	117
EP075: N-Nitrosopyrrolidine	930-55-2	0.5	mg/kg	<0.5	1.5 mg/kg	108	53	125
EP075: N-Nitrosomorpholine	59-89-2	0.5	mg/kg	<0.5	1.5 mg/kg	98.9	65	121
EP075: N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg	<0.5	1.5 mg/kg	96.0	59	123
EP075: N-Nitrosopiperidine	100-75-4	0.5	mg/kg	<0.5	1.5 mg/kg	98.2	57	115
EP075: N-Nitrosodibutylamine	924-16-3	0.5	mg/kg	<0.5	1.5 mg/kg	100	57	119
EP075: N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	0.5	mg/kg	<0.6	3 mg/kg	99.1	42	112
EP075: Methapyrilene	91-80-5	0.5	mg/kg	<0.5	1.5 mg/kg	102	16	123
EP075D: Nitrosamines (QCLot: 2103932)								
EP075: N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg	<0.5	1.5 mg/kg	79.9	39	124
EP075: N-Nitrosodiethylamine	55-18-5	0.5	mg/kg	<0.5	1.5 mg/kg	90.2	59	117
EP075: N-Nitrosopyrrolidine	930-55-2	0.5	mg/kg	<0.5	1.5 mg/kg	105	53	125
EP075: N-Nitrosomorpholine	59-89-2	0.5	mg/kg	<0.5	1.5 mg/kg	92.2	65	121

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP075D: Nitrosamines (QCLot: 2103932) - continued								
EP075: N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg	<0.5	1.5 mg/kg	94.7	59	123
EP075: N-Nitrosopiperidine	100-75-4	0.5	mg/kg	<0.5	1.5 mg/kg	98.0	57	115
EP075: N-Nitrosodibutylamine	924-16-3	0.5	mg/kg	<0.5	1.5 mg/kg	95.4	57	119
EP075: N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	0.5	mg/kg	<0.6	3 mg/kg	98.9	42	112
EP075: Methapyrilene	91-80-5	0.5	mg/kg	<0.5	1.5 mg/kg	92.4	16	123
EP075E: Nitroaromatics and Ketones (QCLot: 2102247)								
EP075: 2-Picoline	109-06-8	0.5	mg/kg	<0.5	1.5 mg/kg	92.1	27	129
EP075: Acetophenone	98-86-2	0.5	mg/kg	<0.5	1.5 mg/kg	97.0	60	116
EP075: Nitrobenzene	98-95-3	0.5	mg/kg	<0.5	1.5 mg/kg	101	65	119
EP075: Isophorone	78-59-1	0.5	mg/kg	<0.5	1.5 mg/kg	94.9	62	116
EP075: 2.6-Dinitrotoluene	606-20-2	0.5	mg/kg	<0.5	1.5 mg/kg	97.6	58	118
EP075: 2.4-Dinitrotoluene	121-14-2	0.5	mg/kg	<0.5	1.5 mg/kg	94.5	59	115
EP075: 1-Naphthylamine	134-32-7	0.5	mg/kg	<0.5	1.5 mg/kg	93.0	18	112
EP075: 4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg	<0.5	1.5 mg/kg	81.3	10	87
EP075: 5-Nitro-o-toluidine	99-55-8	0.5	mg/kg	<0.5	1.5 mg/kg	97.6	48	99
EP075: Azobenzene	103-33-3	1	mg/kg	<1	1.5 mg/kg	97.0	62	118
EP075: 1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg	<0.5	1.5 mg/kg	92.4	36	114
EP075: Phenacetin	62-44-2	0.5	mg/kg	<0.5	1.5 mg/kg	105	62	114
EP075: 4-Aminobiphenyl	92-67-1	0.5	mg/kg	<0.5	1.5 mg/kg	80.1	36	102
EP075: Pentachloronitrobenzene	82-68-8	0.5	mg/kg	<0.5	1.5 mg/kg	97.8	56	110
EP075: Pronamide	23950-58-5	0.5	mg/kg	<0.5	1.5 mg/kg	97.3	54	110
EP075: Dimethylaminoazobenzene	60-11-7	0.5	mg/kg	<0.5	1.5 mg/kg	106	48	108
EP075: Chlorobenzilate	510-15-6	0.5	mg/kg	<0.5	1.5 mg/kg	102	57	112
EP075E: Nitroaromatics and Ketones (QCLot: 2103932)								
EP075: 2-Picoline	109-06-8	0.5	mg/kg	<0.5	1.5 mg/kg	95.1	27	129
EP075: Acetophenone	98-86-2	0.5	mg/kg	<0.5	1.5 mg/kg	93.2	60	116
EP075: Nitrobenzene	98-95-3	0.5	mg/kg	<0.5	1.5 mg/kg	79.2	65	119
EP075: Isophorone	78-59-1	0.5	mg/kg	<0.5	1.5 mg/kg	93.3	62	116
EP075: 2.6-Dinitrotoluene	606-20-2	0.5	mg/kg	<0.5	1.5 mg/kg	98.5	58	118
EP075: 2.4-Dinitrotoluene	121-14-2	0.5	mg/kg	<0.5	1.5 mg/kg	95.4	59	115
EP075: 1-Naphthylamine	134-32-7	0.5	mg/kg	<0.5	1.5 mg/kg	74.9	18	112
EP075: 4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg	<0.5	1.5 mg/kg	82.8	10	87
EP075: 5-Nitro-o-toluidine	99-55-8	0.5	mg/kg	<0.5	1.5 mg/kg	92.2	48	99
EP075: Azobenzene	103-33-3	1	mg/kg	<1	1.5 mg/kg	86.7	62	118
EP075: 1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg	<0.5	1.5 mg/kg	97.6	36	114
EP075: Phenacetin	62-44-2	0.5	mg/kg	<0.5	1.5 mg/kg	102	62	114
EP075: 4-Aminobiphenyl	92-67-1	0.5	mg/kg	<0.5	1.5 mg/kg	89.7	36	102
EP075: Pentachloronitrobenzene	82-68-8	0.5	mg/kg	<0.5	1.5 mg/kg	97.5	56	110

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP075E: Nitroaromatics and Ketones (QCLot: 2103932) - continued								
EP075: Pronamide	23950-58-5	0.5	mg/kg	<0.5	1.5 mg/kg	93.3	54	110
EP075: Dimethylaminoazobenzene	60-11-7	0.5	mg/kg	<0.5	1.5 mg/kg	94.7	48	108
EP075: Chlorobenzilate	510-15-6	0.5	mg/kg	<0.5	1.5 mg/kg	108	57	112
EP075F: Haloethers (QCLot: 2102247)								
EP075: Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg	<0.5	1.5 mg/kg	96.8	63	121
EP075: Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg	<0.5	1.5 mg/kg	93.7	59	115
EP075: 4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg	<0.5	1.5 mg/kg	99.4	58	112
EP075: 4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg	<0.5	1.5 mg/kg	97.7	58	110
EP075F: Haloethers (QCLot: 2103932)								
EP075: Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg	<0.5	1.5 mg/kg	95.4	63	121
EP075: Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg	<0.5	1.5 mg/kg	90.0	59	115
EP075: 4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg	<0.5	1.5 mg/kg	103	58	112
EP075: 4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg	<0.5	1.5 mg/kg	101	58	110
EP075G: Chlorinated Hydrocarbons (QCLot: 2102247)								
EP075: 1.3-Dichlorobenzene	541-73-1	0.5	mg/kg	<0.5	1.5 mg/kg	93.5	58	112
EP075: 1.4-Dichlorobenzene	106-46-7	0.5	mg/kg	<0.5	1.5 mg/kg	93.9	58	116
EP075: 1.2-Dichlorobenzene	95-50-1	0.5	mg/kg	<0.5	1.5 mg/kg	94.5	57	115
EP075: Hexachloroethane	67-72-1	0.5	mg/kg	<0.5	1.5 mg/kg	91.9	54	116
EP075: 1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg	<0.5	1.5 mg/kg	95.7	63	108
EP075: Hexachloropropylene	1888-71-7	0.5	mg/kg	<0.5	1.5 mg/kg	95.8	39	110
EP075: Hexachlorobutadiene	87-68-3	0.5	mg/kg	<0.5	1.5 mg/kg	96.0	59	117
EP075: Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg	<2.5	1.5 mg/kg	52.8	24	108
EP075: Pentachlorobenzene	608-93-5	0.5	mg/kg	<0.5	1.5 mg/kg	96.6	57	109
EP075: Hexachlorobenzene (HCB)	118-74-1	0.5	mg/kg	<0.5	1.5 mg/kg	101	59	111
EP075G: Chlorinated Hydrocarbons (QCLot: 2103932)								
EP075: 1.3-Dichlorobenzene	541-73-1	0.5	mg/kg	<0.5	1.5 mg/kg	96.0	58	112
EP075: 1.4-Dichlorobenzene	106-46-7	0.5	mg/kg	<0.5	1.5 mg/kg	94.5	58	116
EP075: 1.2-Dichlorobenzene	95-50-1	0.5	mg/kg	<0.5	1.5 mg/kg	98.2	57	115
EP075: Hexachloroethane	67-72-1	0.5	mg/kg	<0.5	1.5 mg/kg	105	54	116
EP075: 1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg	<0.5	1.5 mg/kg	102	63	108
EP075: Hexachloropropylene	1888-71-7	0.5	mg/kg	<0.5	1.5 mg/kg	109	39	110
EP075: Hexachlorobutadiene	87-68-3	0.5	mg/kg	<0.5	1.5 mg/kg	105	59	117
EP075: Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg	<2.5	1.5 mg/kg	79.7	24	108
EP075: Pentachlorobenzene	608-93-5	0.5	mg/kg	<0.5	1.5 mg/kg	104	57	109
EP075: Hexachlorobenzene (HCB)	118-74-1	0.5	mg/kg	<0.5	1.5 mg/kg	102	59	111
EP075H: Anilines and Benzidines (QCLot: 2102247)								
EP075: Aniline	62-53-3	0.5	mg/kg	<0.5	1.5 mg/kg	80.9	13	108
EP075: 4-Chloroaniline	106-47-8	0.5	mg/kg	<0.5	1.5 mg/kg	37.7	21	99

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP075H: Anilines and Benzidines (QCLot: 2102247) - continued								
EP075: 2-Nitroaniline	88-74-4	0.5	mg/kg	<0.5	1.5 mg/kg	104	52	112
EP075: 3-Nitroaniline	99-09-2	0.5	mg/kg	<0.5	1.5 mg/kg	88.5	32	94
EP075: Dibenzofuran	132-64-9	0.5	mg/kg	<0.5	1.5 mg/kg	99.0	60	110
EP075: 4-Nitroaniline	100-01-8	0.5	mg/kg	<0.5	1.5 mg/kg	83.6	42	112
EP075: Carbazole	86-74-8	0.5	mg/kg	<0.5	1.5 mg/kg	99.0	59	111
EP075: 3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg	<0.5	1.5 mg/kg	93.1	23	113
EP075H: Anilines and Benzidines (QCLot: 2103932)								
EP075: Aniline	62-53-3	0.5	mg/kg	<0.5	1.5 mg/kg	91.0	13	108
EP075: 4-Chloroaniline	106-47-8	0.5	mg/kg	<0.5	1.5 mg/kg	75.5	21	99
EP075: 2-Nitroaniline	88-74-4	0.5	mg/kg	<0.5	1.5 mg/kg	91.8	52	112
EP075: 3-Nitroaniline	99-09-2	0.5	mg/kg	<0.5	1.5 mg/kg	89.1	32	94
EP075: Dibenzofuran	132-64-9	0.5	mg/kg	<0.5	1.5 mg/kg	97.3	60	110
EP075: 4-Nitroaniline	100-01-8	0.5	mg/kg	<0.5	1.5 mg/kg	92.6	42	112
EP075: Carbazole	86-74-8	0.5	mg/kg	<0.5	1.5 mg/kg	93.8	59	111
EP075: 3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg	<0.5	1.5 mg/kg	101	23	113
EP075I: Organochlorine Pesticides (QCLot: 2102247)								
EP075: alpha-BHC	319-84-6	0.5	mg/kg	<0.5	1.5 mg/kg	99.2	63	113
EP075: beta-BHC	319-85-7	0.5	mg/kg	<0.5	1.5 mg/kg	101	57	113
EP075: gamma-BHC	58-89-9	0.5	mg/kg	<0.5	1.5 mg/kg	94.1	61	117
EP075: delta-BHC	319-86-8	0.5	mg/kg	<0.5	1.5 mg/kg	100.0	64	118
EP075: Heptachlor	76-44-8	0.5	mg/kg	<0.5	1.5 mg/kg	96.9	55	115
EP075: Aldrin	309-00-2	0.5	mg/kg	<0.5	1.5 mg/kg	97.3	61	115
EP075: Heptachlor epoxide	1024-57-3	0.5	mg/kg	<0.5	1.5 mg/kg	101	56	118
EP075: alpha-Endosulfan	959-98-8	0.5	mg/kg	<0.5	1.5 mg/kg	100	65	125
EP075: 4.4`-DDE	72-55-9	0.5	mg/kg	<0.5	1.5 mg/kg	103	60	116
EP075: Dieldrin	60-57-1	0.5	mg/kg	<0.5	1.5 mg/kg	103	64	118
EP075: Endrin	72-20-8	0.5	mg/kg	<0.5	1.5 mg/kg	105	53	117
EP075: beta-Endosulfan	33213-65-9	0.5	mg/kg	<0.5	1.5 mg/kg	102	65	115
EP075: 4.4`-DDD	72-54-8	0.5	mg/kg	<0.5	1.5 mg/kg	106	62	118
EP075: Endosulfan sulfate	1031-07-8	0.5	mg/kg	<0.5	1.5 mg/kg	98.7	63	129
EP075: 4.4`-DDT	50-29-3	0.5	mg/kg	<0.5	1.5 mg/kg	99.4	46	122
EP075I: Organochlorine Pesticides (QCLot: 2103932)								
EP075: alpha-BHC	319-84-6	0.5	mg/kg	<0.5	1.5 mg/kg	103	63	113
EP075: beta-BHC	319-85-7	0.5	mg/kg	<0.5	1.5 mg/kg	93.1	57	113
EP075: gamma-BHC	58-89-9	0.5	mg/kg	<0.5	1.5 mg/kg	94.7	61	117
EP075: delta-BHC	319-86-8	0.5	mg/kg	<0.5	1.5 mg/kg	96.4	64	118
EP075: Heptachlor	76-44-8	0.5	mg/kg	<0.5	1.5 mg/kg	104	55	115
EP075: Aldrin	309-00-2	0.5	mg/kg	<0.5	1.5 mg/kg	102	61	115

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP075I: Organochlorine Pesticides (QCLot: 2103932) - continued								
EP075: Heptachlor epoxide	1024-57-3	0.5	mg/kg	<0.5	1.5 mg/kg	103	56	118
EP075: alpha-Endosulfan	959-98-8	0.5	mg/kg	<0.5	1.5 mg/kg	99.9	65	125
EP075: 4.4`-DDE	72-55-9	0.5	mg/kg	<0.5	1.5 mg/kg	96.4	60	116
EP075: Dieldrin	60-57-1	0.5	mg/kg	<0.5	1.5 mg/kg	93.8	64	118
EP075: Endrin	72-20-8	0.5	mg/kg	<0.5	1.5 mg/kg	99.9	53	117
EP075: beta-Endosulfan	33213-65-9	0.5	mg/kg	<0.5	1.5 mg/kg	99.8	65	115
EP075: 4.4`-DDD	72-54-8	0.5	mg/kg	<0.5	1.5 mg/kg	92.8	62	118
EP075: Endosulfan sulfate	1031-07-8	0.5	mg/kg	<0.5	1.5 mg/kg	97.6	63	129
EP075: 4.4`-DDT	50-29-3	0.5	mg/kg	<0.5	1.5 mg/kg	93.9	46	122
EP075J: Organophosphorus Pesticides (QCLot: 2102247)								
EP075: Dichlorvos	62-73-7	0.5	mg/kg	<0.5	1.5 mg/kg	51.6	46	112
EP075: Dimethoate	60-51-5	0.5	mg/kg	<0.5	1.5 mg/kg	103	63	119
EP075: Diazinon	333-41-5	0.5	mg/kg	<0.5	1.5 mg/kg	96.3	68	134
EP075: Chlorpyrifos-methyl	5598-13-0	0.5	mg/kg	<0.5	1.5 mg/kg	99.0	60	130
EP075: Malathion	121-75-5	0.5	mg/kg	<0.5	1.5 mg/kg	112	65	127
EP075: Fenthion	55-38-9	0.5	mg/kg	<0.5	1.5 mg/kg	103	60	116
EP075: Chlorpyrifos	2921-88-2	0.5	mg/kg	<0.5	1.5 mg/kg	97.7	63	113
EP075: Pirimphos-ethyl	23505-41-1	0.5	mg/kg	<0.5	1.5 mg/kg	99.2	65	115
EP075: Chlorfenvinphos	470-90-6	0.5	mg/kg	<0.5	1.5 mg/kg	103	59	103
EP075: Prothiofos	34643-46-4	0.5	mg/kg	<0.5	1.5 mg/kg	104	59	119
EP075: Ethion	563-12-2	0.5	mg/kg	<0.5	1.5 mg/kg	108	62	118
EP075J: Organophosphorus Pesticides (QCLot: 2103932)								
EP075: Dichlorvos	62-73-7	0.5	mg/kg	<0.5	1.5 mg/kg	61.5	46	112
EP075: Dimethoate	60-51-5	0.5	mg/kg	<0.5	1.5 mg/kg	86.3	63	119
EP075: Diazinon	333-41-5	0.5	mg/kg	<0.5	1.5 mg/kg	90.7	68	134
EP075: Chlorpyrifos-methyl	5598-13-0	0.5	mg/kg	<0.5	1.5 mg/kg	107	60	130
EP075: Malathion	121-75-5	0.5	mg/kg	<0.5	1.5 mg/kg	104	65	127
EP075: Fenthion	55-38-9	0.5	mg/kg	<0.5	1.5 mg/kg	108	60	116
EP075: Chlorpyrifos	2921-88-2	0.5	mg/kg	<0.5	1.5 mg/kg	97.3	63	113
EP075: Pirimphos-ethyl	23505-41-1	0.5	mg/kg	<0.5	1.5 mg/kg	97.4	65	115
EP075: Chlorfenvinphos	470-90-6	0.5	mg/kg	<0.5	1.5 mg/kg	92.8	59	103
EP075: Prothiofos	34643-46-4	0.5	mg/kg	<0.5	1.5 mg/kg	99.0	59	119
EP075: Ethion	563-12-2	0.5	mg/kg	<0.5	1.5 mg/kg	99.3	62	118
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2102250)								
EP071: C10 - C14 Fraction	----	50	mg/kg	<50	300 mg/kg	99.2	75	129
EP071: C15 - C28 Fraction	----	100	mg/kg	<100	450 mg/kg	103	77	131
EP071: C29 - C36 Fraction	----	100	mg/kg	<100	300 mg/kg	108	71	129
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2103660)								

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2103660) - continued								
EP080: C6 - C9 Fraction	----	10	mg/kg	<10	26 mg/kg	107	68	128
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2103664)								
EP080: C6 - C9 Fraction	----	10	mg/kg	<10	26 mg/kg	84.8	68	128
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2103935)								
EP071: C10 - C14 Fraction	----	50	mg/kg	<50	300 mg/kg	103	75	129
EP071: C15 - C28 Fraction	----	100	mg/kg	<100	450 mg/kg	102	77	131
EP071: C29 - C36 Fraction	----	100	mg/kg	<100	300 mg/kg	101	71	129
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2102250)								
EP071: >C10 - C16 Fraction	----	50	mg/kg	<50	375 mg/kg	98.4	77	125
EP071: >C16 - C34 Fraction	----	100	mg/kg	<100	525 mg/kg	107	74	138
EP071: >C34 - C40 Fraction	----	100	mg/kg	<100	225 mg/kg	87.3	63	131
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2103660)								
EP080: C6 - C10 Fraction	C6_C10	10	mg/kg	<10	31 mg/kg	108	68	128
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2103664)								
EP080: C6 - C10 Fraction	C6_C10	10	mg/kg	<10	31 mg/kg	89.7	68	128
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2103935)								
EP071: >C10 - C16 Fraction	----	50	mg/kg	<50	375 mg/kg	102	77	125
EP071: >C16 - C34 Fraction	----	100	mg/kg	<100	525 mg/kg	106	74	138
EP071: >C34 - C40 Fraction	----	100	mg/kg	<100	225 mg/kg	86.6	63	131
EP080: BTEXN (QCLot: 2103660)								
EP080: Benzene	71-43-2	0.2	mg/kg	<0.2	1 mg/kg	99.8	62	116
EP080: Toluene	108-88-3	0.5	mg/kg	<0.5	1 mg/kg	99.9	67	121
EP080: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	1 mg/kg	101	65	117
EP080: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	2 mg/kg	102	66	118
EP080: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	1 mg/kg	99.8	68	120
EP080: Naphthalene	91-20-3	1	mg/kg	<1	1 mg/kg	90.0	63	119
EP080: BTEXN (QCLot: 2103664)								
EP080: Benzene	71-43-2	0.2	mg/kg	<0.2	1 mg/kg	90.2	62	116
EP080: Toluene	108-88-3	0.5	mg/kg	<0.5	1 mg/kg	91.6	67	121
EP080: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	1 mg/kg	91.5	65	117
EP080: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	2 mg/kg	90.5	66	118
EP080: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	1 mg/kg	93.0	68	120
EP080: Naphthalene	91-20-3	1	mg/kg	<1	1 mg/kg	89.7	63	119
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 2107101)								
EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	0.00125 mg/kg	118	57	121

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 2107101) - continued								
EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	0.00125 mg/kg	104	55	125
EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	<0.0002	0.00125 mg/kg	123	52	126
EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	<0.0002	0.00125 mg/kg	68.8	54	123
EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	73.6	55	127
EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	<0.0002	0.00125 mg/kg	65.2	54	125
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 2107101)								
EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	0.00625 mg/kg	102	52	128
EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	0.00125 mg/kg	120	54	129
EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	0.00125 mg/kg	118	58	127
EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	0.00125 mg/kg	120	57	128
EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	89.2	60	134
EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	97.2	63	130
EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	0.00125 mg/kg	91.6	55	130
EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	0.00125 mg/kg	106	62	130
EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	109	53	134
EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg	<0.0002	0.00125 mg/kg	74.4	49	129
EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	0.00312 mg/kg	82.8	59	129
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 2107101)								
EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	0.00125 mg/kg	86.4	52	132
EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	0.00312 mg/kg	84.4	65	126
EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	0.00312 mg/kg	80.9	64	126
EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	0.00312 mg/kg	72.6	63	124
EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	0.00312 mg/kg	78.4	58	125
EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	0.00125 mg/kg	90.4	61	130
EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	0.00125 mg/kg	72.4	55	130
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 2107101)								
EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	0.00125 mg/kg	102	54	130
EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	0.00125 mg/kg	85.2	61	130
EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	0.00125 mg/kg	90.8	62	130
EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	0.00125 mg/kg	88.8	60	130

Matrix Spike (MS) Report

The quality control term Matrix Spike (MS) refers to an intralaboratory split sample spiked with a representative set of target analytes. The purpose of this QC parameter is to monitor potential matrix effects on analyte recoveries. Static Recovery Limits as per laboratory Data Quality Objectives (DQOs). Ideal recovery ranges stated may be waived in the event of sample matrix interference.

Sub-Matrix: **SOIL**

				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Recovery Limits (%)	
Laboratory sample ID	Client sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EG005T: Total Metals by ICP-AES (QCLot: 2111392)							
ES1838116-005	BH03@2.00	EG005T: Arsenic	7440-38-2	50 mg/kg	92.9	70	130
		EG005T: Cadmium	7440-43-9	50 mg/kg	94.2	70	130
		EG005T: Chromium	7440-47-3	50 mg/kg	94.0	70	130
		EG005T: Copper	7440-50-8	250 mg/kg	92.0	70	130
		EG005T: Lead	7439-92-1	250 mg/kg	92.7	70	130
		EG005T: Nickel	7440-02-0	50 mg/kg	92.3	70	130
		EG005T: Zinc	7440-66-6	250 mg/kg	102	70	130
EG005T: Total Metals by ICP-AES (QCLot: 2111394)							
ES1838116-043	BH16@3.00	EG005T: Arsenic	7440-38-2	50 mg/kg	91.3	70	130
		EG005T: Cadmium	7440-43-9	50 mg/kg	93.0	70	130
		EG005T: Chromium	7440-47-3	50 mg/kg	83.0	70	130
		EG005T: Copper	7440-50-8	250 mg/kg	90.7	70	130
		EG005T: Lead	7439-92-1	250 mg/kg	93.4	70	130
		EG005T: Nickel	7440-02-0	50 mg/kg	92.2	70	130
		EG005T: Zinc	7440-66-6	250 mg/kg	101	70	130
EG035T: Total Recoverable Mercury by FIMS (QCLot: 2111391)							
ES1838116-005	BH03@2.00	EG035T: Mercury	7439-97-6	5 mg/kg	95.4	70	130
EG035T: Total Recoverable Mercury by FIMS (QCLot: 2111393)							
ES1838116-043	BH16@3.00	EG035T: Mercury	7439-97-6	5 mg/kg	90.3	70	130
EP066: Polychlorinated Biphenyls (PCB) (QCLot: 2102248)							
ES1838116-005	BH03@2.00	EP066: Total Polychlorinated biphenyls	----	1 mg/kg	92.0	70	130
EP066: Polychlorinated Biphenyls (PCB) (QCLot: 2103933)							
ES1838116-043	BH16@3.00	EP066: Total Polychlorinated biphenyls	----	1 mg/kg	116	70	130
EP068A: Organochlorine Pesticides (OC) (QCLot: 2102249)							
ES1838116-005	BH03@2.00	EP068: gamma-BHC	58-89-9	0.5 mg/kg	85.0	70	130
		EP068: Heptachlor	76-44-8	0.5 mg/kg	112	70	130
		EP068: Aldrin	309-00-2	0.5 mg/kg	113	70	130
		EP068: Dieldrin	60-57-1	0.5 mg/kg	83.8	70	130
		EP068: Endrin	72-20-8	2 mg/kg	126	70	130
		EP068: 4.4`-DDT	50-29-3	2 mg/kg	104	70	130
EP068A: Organochlorine Pesticides (OC) (QCLot: 2103934)							
ES1838116-043	BH16@3.00	EP068: gamma-BHC	58-89-9	0.5 mg/kg	80.5	70	130
		EP068: Heptachlor	76-44-8	0.5 mg/kg	78.2	70	130
		EP068: Aldrin	309-00-2	0.5 mg/kg	98.5	70	130
		EP068: Dieldrin	60-57-1	0.5 mg/kg	90.8	70	130
		EP068: Endrin	72-20-8	2 mg/kg	125	70	130
		EP068: 4.4`-DDT	50-29-3	2 mg/kg	122	70	130

Sub-Matrix: **SOIL**

				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Recovery Limits (%)	
Laboratory sample ID	Client sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP068B: Organophosphorus Pesticides (OP) (QCLot: 2102249)							
ES1838116-005	BH03@2.00	EP068: Diazinon	333-41-5	0.5 mg/kg	84.6	70	130
		EP068: Chlorpyrifos-methyl	5598-13-0	0.5 mg/kg	96.4	70	130
		EP068: Pirimphos-ethyl	23505-41-1	0.5 mg/kg	114	70	130
		EP068: Bromophos-ethyl	4824-78-6	0.5 mg/kg	118	70	130
		EP068: Prothiofos	34643-46-4	0.5 mg/kg	88.1	70	130
EP068B: Organophosphorus Pesticides (OP) (QCLot: 2103934)							
ES1838116-043	BH16@3.00	EP068: Diazinon	333-41-5	0.5 mg/kg	74.8	70	130
		EP068: Chlorpyrifos-methyl	5598-13-0	0.5 mg/kg	97.8	70	130
		EP068: Pirimphos-ethyl	23505-41-1	0.5 mg/kg	94.3	70	130
		EP068: Bromophos-ethyl	4824-78-6	0.5 mg/kg	87.8	70	130
		EP068: Prothiofos	34643-46-4	0.5 mg/kg	105	70	130
EP074A: Monocyclic Aromatic Hydrocarbons (QCLot: 2103659)							
ES1838116-005	BH03@2.00	EP074: Benzene	71-43-2	2.5 mg/kg	84.7	70	130
		EP074: Toluene	108-88-3	2.5 mg/kg	87.9	70	130
EP074A: Monocyclic Aromatic Hydrocarbons (QCLot: 2103665)							
ES1837145-001	Anonymous	EP074: Benzene	71-43-2	2.5 mg/kg	101	70	130
		EP074: Toluene	108-88-3	2.5 mg/kg	94.9	70	130
EP074E: Halogenated Aliphatic Compounds (QCLot: 2103659)							
ES1838116-005	BH03@2.00	EP074: 1.1-Dichloroethene	75-35-4	2.5 mg/kg	76.2	70	130
		EP074: Trichloroethene	79-01-6	2.5 mg/kg	83.4	70	130
EP074E: Halogenated Aliphatic Compounds (QCLot: 2103665)							
ES1837145-001	Anonymous	EP074: 1.1-Dichloroethene	75-35-4	2.5 mg/kg	111	70	130
		EP074: Trichloroethene	79-01-6	2.5 mg/kg	96.3	70	130
EP074F: Halogenated Aromatic Compounds (QCLot: 2103659)							
ES1838116-005	BH03@2.00	EP074: Chlorobenzene	108-90-7	2.5 mg/kg	96.0	70	130
EP074F: Halogenated Aromatic Compounds (QCLot: 2103665)							
ES1837145-001	Anonymous	EP074: Chlorobenzene	108-90-7	2.5 mg/kg	102	70	130
EP075A: Phenolic Compounds (QCLot: 2102247)							
ES1838116-005	BH03@2.00	EP075: Phenol	108-95-2	10 mg/kg	76.8	60	130
		EP075: 2-Chlorophenol	95-57-8	10 mg/kg	76.3	60	130
		EP075: 2-Nitrophenol	88-75-5	10 mg/kg	77.1	50	130
		EP075: 4-Chloro-3-methylphenol	59-50-7	10 mg/kg	73.1	50	130
		EP075: Pentachlorophenol	87-86-5	10 mg/kg	94.0	10	130
EP075A: Phenolic Compounds (QCLot: 2103932)							
ES1838116-043	BH16@3.00	EP075: Phenol	108-95-2	10 mg/kg	89.8	60	130
		EP075: 2-Chlorophenol	95-57-8	10 mg/kg	89.4	60	130

Sub-Matrix: **SOIL**

				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Recovery Limits (%)	
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*Concentration*	*MS*	*Low*	*High*
EP075A: Phenolic Compounds (QCLot: 2103932) - continued							
ES1838116-043	BH16@3.00	EP075: 2-Nitrophenol	88-75-5	10 mg/kg	83.8	50	130
		EP075: 4-Chloro-3-methylphenol	59-50-7	10 mg/kg	83.5	50	130
		EP075: Pentachlorophenol	87-86-5	10 mg/kg	79.3	10	130
EP075B: Polynuclear Aromatic Hydrocarbons (QCLot: 2102247)							
ES1838116-005	BH03@2.00	EP075: Acenaphthene	83-32-9	10 mg/kg	79.1	50	130
		EP075: Pyrene	129-00-0	10 mg/kg	75.8	50	130
EP075B: Polynuclear Aromatic Hydrocarbons (QCLot: 2103932)							
ES1838116-043	BH16@3.00	EP075: Acenaphthene	83-32-9	10 mg/kg	91.7	50	130
		EP075: Pyrene	129-00-0	10 mg/kg	86.9	50	130
EP075D: Nitrosamines (QCLot: 2102247)							
ES1838116-005	BH03@2.00	EP075: N-Nitrosodi-n-propylamine	621-64-7	10 mg/kg	72.5	50	130
EP075D: Nitrosamines (QCLot: 2103932)							
ES1838116-043	BH16@3.00	EP075: N-Nitrosodi-n-propylamine	621-64-7	10 mg/kg	85.4	50	130
EP075E: Nitroaromatics and Ketones (QCLot: 2102247)							
ES1838116-005	BH03@2.00	EP075: 2.4-Dinitrotoluene	121-14-2	10 mg/kg	76.1	40	130
EP075E: Nitroaromatics and Ketones (QCLot: 2103932)							
ES1838116-043	BH16@3.00	EP075: 2.4-Dinitrotoluene	121-14-2	10 mg/kg	82.4	40	130
EP075G: Chlorinated Hydrocarbons (QCLot: 2102247)							
ES1838116-005	BH03@2.00	EP075: 1.4-Dichlorobenzene	106-46-7	10 mg/kg	77.2	60	130
		EP075: 1.2.4-Trichlorobenzene	120-82-1	10 mg/kg	84.8	50	130
EP075G: Chlorinated Hydrocarbons (QCLot: 2103932)							
ES1838116-043	BH16@3.00	EP075: 1.4-Dichlorobenzene	106-46-7	10 mg/kg	93.1	60	130
		EP075: 1.2.4-Trichlorobenzene	120-82-1	10 mg/kg	99.0	50	130
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2102250)							
ES1838116-005	BH03@2.00	EP071: C10 - C14 Fraction	----	523 mg/kg	101	73	137
		EP071: C15 - C28 Fraction	----	2319 mg/kg	103	53	131
		EP071: C29 - C36 Fraction	----	1714 mg/kg	114	52	132
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2103660)							
ES1838116-005	BH03@2.00	EP080: C6 - C9 Fraction	----	32.5 mg/kg	121	70	130
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2103664)							
ES1837145-001	Anonymous	EP080: C6 - C9 Fraction	----	32.5 mg/kg	90.9	70	130
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2103935)							
ES1838116-043	BH16@3.00	EP071: C10 - C14 Fraction	----	523 mg/kg	106	73	137
		EP071: C15 - C28 Fraction	----	2319 mg/kg	115	53	131
		EP071: C29 - C36 Fraction	----	1714 mg/kg	116	52	132

Sub-Matrix: **SOIL**

				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Recovery Limits (%)	
Laboratory sample ID	Client sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2102250)							
ES1838116-005	BH03@2.00	EP071: >C10 - C16 Fraction	----	860 mg/kg	102	73	137
		EP071: >C16 - C34 Fraction	----	3223 mg/kg	122	53	131
		EP071: >C34 - C40 Fraction	----	1058 mg/kg	114	52	132
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2103660)							
ES1838116-005	BH03@2.00	EP080: C6 - C10 Fraction	C6_C10	37.5 mg/kg	119	70	130
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2103664)							
ES1837145-001	Anonymous	EP080: C6 - C10 Fraction	C6_C10	37.5 mg/kg	95.8	70	130
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2103935)							
ES1838116-043	BH16@3.00	EP071: >C10 - C16 Fraction	----	860 mg/kg	99.9	73	137
		EP071: >C16 - C34 Fraction	----	3223 mg/kg	119	53	131
		EP071: >C34 - C40 Fraction	----	1058 mg/kg	117	52	132
EP080: BTEXN (QCLot: 2103660)							
ES1838116-005	BH03@2.00	EP080: Benzene	71-43-2	2.5 mg/kg	100	70	130
		EP080: Toluene	108-88-3	2.5 mg/kg	103	70	130
		EP080: Ethylbenzene	100-41-4	2.5 mg/kg	105	70	130
		EP080: meta- & para-Xylene	108-38-3 106-42-3	2.5 mg/kg	104	70	130
		EP080: ortho-Xylene	95-47-6	2.5 mg/kg	103	70	130
		EP080: Naphthalene	91-20-3	2.5 mg/kg	92.2	70	130
EP080: BTEXN (QCLot: 2103664)							
ES1837145-001	Anonymous	EP080: Benzene	71-43-2	2.5 mg/kg	93.4	70	130
		EP080: Toluene	108-88-3	2.5 mg/kg	88.4	70	130
		EP080: Ethylbenzene	100-41-4	2.5 mg/kg	89.2	70	130
		EP080: meta- & para-Xylene	108-38-3 106-42-3	2.5 mg/kg	88.5	70	130
		EP080: ortho-Xylene	95-47-6	2.5 mg/kg	94.9	70	130
		EP080: Naphthalene	91-20-3	2.5 mg/kg	108	70	130
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 2107101)							
EP1814768-001	Anonymous	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.00125 mg/kg	109	50	130
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.00125 mg/kg	107	50	130
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.00125 mg/kg	116	50	130
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.00125 mg/kg	68.8	50	130
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.00125 mg/kg	75.6	50	130
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.00125 mg/kg	66.4	50	130
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 2107101)							
EP1814768-001	Anonymous	EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.00625 mg/kg	105	30	130
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.00125 mg/kg	116	50	130

Sub-Matrix: **SOIL**

				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Recovery Limits (%)	
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*Concentration*	*MS*	*Low*	*High*
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 2107101) - continued							
EP1814768-001	Anonymous	EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.00125 mg/kg	120	50	130
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.00125 mg/kg	121	50	130
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.00125 mg/kg	89.6	50	130
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.00125 mg/kg	90.8	50	130
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.00125 mg/kg	89.6	50	130
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.00125 mg/kg	101	50	130
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.00125 mg/kg	103	50	130
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.00125 mg/kg	77.6	30	130
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.00312 mg/kg	84.6	30	130
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 2107101)							
EP1814768-001	Anonymous	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.00125 mg/kg	83.6	50	130
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.00312 mg/kg	89.9	30	130
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.00312 mg/kg	85.1	30	130
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.00312 mg/kg	52.4	30	130
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.00312 mg/kg	55.4	30	130
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.00125 mg/kg	84.0	30	130
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.00125 mg/kg	72.4	30	130
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 2107101)							
EP1814768-001	Anonymous	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.00125 mg/kg	84.8	50	130
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.00125 mg/kg	82.4	50	130
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.00125 mg/kg	88.0	50	130
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.00125 mg/kg	89.2	50	130

ALS Environmental

QA/QC Compliance Assessment to assist with Quality Review

Work Order	: **ES1838116**	Page	: 1 of 25
Client	: **ARCADIS AUSTRALIA PACIFIC PTY LTD**	Laboratory	: Environmental Division Sydney
Contact	: MR DEAN STAFFORD	Telephone	: +61 2 8784 8555
Project	: King St North ESA	Date Samples Received	: 17-Dec-2018
Site	: ----	Issue Date	: 07-Jan-2019
Sampler	: CAITLAIN REGENA	No. of samples received	: 60
Order number	: 10026439	No. of samples analysed	: 30

This report is automatically generated by the ALS LIMS through interpretation of the ALS Quality Control Report and several Quality Assurance parameters measured by ALS. This automated reporting highlights any non-conformances, facilitates faster and more accurate data validation and is designed to assist internal expert and external Auditor review. Many components of this report contribute to the overall DQO assessment and reporting for guideline compliance.

Brief method summaries and references are also provided to assist in traceability.

Summary of Outliers

Outliers : Quality Control Samples

This report highlights outliers flagged in the Quality Control (QC) Report.

- **NO Method Blank value outliers occur.**
- **NO Laboratory Control outliers occur.**
- **NO Matrix Spike outliers occur.**
- **Duplicate outliers exist - please see following pages for full details.**
- **Surrogate recovery outliers exist for all regular sample matrices - please see following pages for full details.**

Outliers : Analysis Holding Time Compliance

- **Analysis Holding Time Outliers exist - please see following pages for full details.**

Outliers : Frequency of Quality Control Samples

- **NO Quality Control Sample Frequency Outliers exist.**

Outliers : Quality Control Samples

Duplicates, Method Blanks, Laboratory Control Samples and Matrix Spikes

Matrix: **SOIL**

Compound Group Name	Laboratory Sample ID	Client Sample ID	Analyte	CAS Number	Data	Limits	Comment
Duplicate (DUP) RPDs							
EG005T: Total Metals by ICP-AES	ES1838118--003	Anonymous	**Zinc**	7440-66-6	95.5 %	0% - 50%	**RPD exceeds LOR based limits**

Regular Sample Surrogates

Sub-Matrix: **SOIL**

Compound Group Name	Laboratory Sample ID	Client Sample ID	Analyte	CAS Number	Data	Limits	Comment
Samples Submitted							
EP074S: VOC Surrogates	ES1838116-021	BH08@3.00	**Toluene-D8**	2037-26-5	45.0 %	66-136 %	**Recovery less than lower data quality objective**
EP074S: VOC Surrogates	ES1838116-021	BH08@3.00	**4-Bromofluorobenzene**	460-00-4	27.3 %	60-122 %	**Recovery less than lower data quality objective**
EP074S: VOC Surrogates	ES1838116-031	BH12@1.00	**4-Bromofluorobenzene**	460-00-4	56.7 %	60-122 %	**Recovery less than lower data quality objective**
EP080S: TPH(V)/BTEX Surrogates	ES1838116-021	BH08@3.00	**Toluene-D8**	2037-26-5	46.0 %	74-132 %	**Recovery less than lower data quality objective**
EP080S: TPH(V)/BTEX Surrogates	ES1838116-021	BH08@3.00	**4-Bromofluorobenzene**	460-00-4	27.1 %	72-130 %	**Recovery less than lower data quality objective**
EP080S: TPH(V)/BTEX Surrogates	ES1838116-031	BH12@1.00	**4-Bromofluorobenzene**	460-00-4	55.7 %	72-130 %	**Recovery less than lower data quality objective**

Outliers : Analysis Holding Time Compliance

Matrix: **SOIL**

Method / Container / Client Sample ID(s)		Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Days overdue	Date analysed	Due for analysis	Days overdue
EP074A: Monocyclic Aromatic Hydrocarbons							
Soil Glass Jar - Unpreserved							
BH03@2.00, BH01@2.00, BH02@1.00, MW02@1.00,	BH01@0.50, DUP1, BH02@2.50, MW02@6.00	20-Dec-2018	19-Dec-2018	**1**	22-Dec-2018	19-Dec-2018	**3**
Soil Glass Jar - Unpreserved							
MW06@1.50, BH15@1.50, BH24@1.50, BH19@0.40	MW06@4.50, BH12@1.00, BH24@4.50,	----	----	----	22-Dec-2018	20-Dec-2018	**2**
Soil Glass Jar - Unpreserved							
BH06@0.50, BH08@1.00, BH16@0.50	BH06@2.40, BH08@3.00,	----	----	----	22-Dec-2018	21-Dec-2018	**1**
EP074B: Oxygenated Compounds							

Matrix: **SOIL**

Method / Container / Client Sample ID(s)		Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Days overdue	Date analysed	Due for analysis	Days overdue
EP074B: Oxygenated Compounds - Analysis Holding Time Compliance							
Soil Glass Jar - Unpreserved							
BH03@2.00,	BH01@0.50,	20-Dec-2018	19-Dec-2018	1	22-Dec-2018	19-Dec-2018	3
BH01@2.00,	DUP1,						
BH02@1.00,	BH02@2.50,						
MW02@1.00,	MW02@6.00						
Soil Glass Jar - Unpreserved							
MW06@1.50,	MW06@4.50,	----	----	----	22-Dec-2018	20-Dec-2018	2
BH15@1.50,	BH12@1.00,						
BH24@1.50,	BH24@4.50,						
BH19@0.40							
Soil Glass Jar - Unpreserved							
BH06@0.50,	BH06@2.40,	----	----	----	22-Dec-2018	21-Dec-2018	1
BH08@1.00,	BH08@3.00,						
BH16@0.50							
EP074C: Sulfonated Compounds							
Soil Glass Jar - Unpreserved							
BH03@2.00,	BH01@0.50,	20-Dec-2018	19-Dec-2018	1	22-Dec-2018	19-Dec-2018	3
BH01@2.00,	DUP1,						
BH02@1.00,	BH02@2.50,						
MW02@1.00,	MW02@6.00						
Soil Glass Jar - Unpreserved							
MW06@1.50,	MW06@4.50,	----	----	----	22-Dec-2018	20-Dec-2018	2
BH15@1.50,	BH12@1.00,						
BH24@1.50,	BH24@4.50,						
BH19@0.40							
Soil Glass Jar - Unpreserved							
BH06@0.50,	BH06@2.40,	----	----	----	22-Dec-2018	21-Dec-2018	1
BH08@1.00,	BH08@3.00,						
BH16@0.50							
EP074D: Fumigants							
Soil Glass Jar - Unpreserved							
BH03@2.00,	BH01@0.50,	20-Dec-2018	19-Dec-2018	1	22-Dec-2018	19-Dec-2018	3
BH01@2.00,	DUP1,						
BH02@1.00,	BH02@2.50,						
MW02@1.00,	MW02@6.00						
Soil Glass Jar - Unpreserved							
MW06@1.50,	MW06@4.50,	----	----	----	22-Dec-2018	20-Dec-2018	2
BH15@1.50,	BH12@1.00,						
BH24@1.50,	BH24@4.50,						
BH19@0.40							

Matrix: **SOIL**

Method / Container / Client Sample ID(s)		Extraction / Preparation: Date extracted	Extraction / Preparation: Due for extraction	Extraction / Preparation: Days overdue	Analysis: Date analysed	Analysis: Due for analysis	Analysis: Days overdue
EP074D: Fumigants - Analysis Holding Time Compliance							
Soil Glass Jar - Unpreserved							
BH06@0.50,	BH06@2.40,	----	----	----	22-Dec-2018	21-Dec-2018	1
BH08@1.00,	BH08@3.00,						
BH16@0.50							
EP074E: Halogenated Aliphatic Compounds							
Soil Glass Jar - Unpreserved							
BH03@2.00,	BH01@0.50,	20-Dec-2018	19-Dec-2018	1	22-Dec-2018	19-Dec-2018	3
BH01@2.00,	DUP1,						
BH02@1.00,	BH02@2.50,						
MW02@1.00,	MW02@6.00						
Soil Glass Jar - Unpreserved							
MW06@1.50,	MW06@4.50,	----	----	----	22-Dec-2018	20-Dec-2018	2
BH15@1.50,	BH12@1.00,						
BH24@1.50,	BH24@4.50,						
BH19@0.40							
Soil Glass Jar - Unpreserved							
BH06@0.50,	BH06@2.40,	----	----	----	22-Dec-2018	21-Dec-2018	1
BH08@1.00,	BH08@3.00,						
BH16@0.50							
EP074F: Halogenated Aromatic Compounds							
Soil Glass Jar - Unpreserved							
BH03@2.00,	BH01@0.50,	20-Dec-2018	19-Dec-2018	1	22-Dec-2018	19-Dec-2018	3
BH01@2.00,	DUP1,						
BH02@1.00,	BH02@2.50,						
MW02@1.00,	MW02@6.00						
Soil Glass Jar - Unpreserved							
MW06@1.50,	MW06@4.50,	----	----	----	22-Dec-2018	20-Dec-2018	2
BH15@1.50,	BH12@1.00,						
BH24@1.50,	BH24@4.50,						
BH19@0.40							
Soil Glass Jar - Unpreserved							
BH06@0.50,	BH06@2.40,	----	----	----	22-Dec-2018	21-Dec-2018	1
BH08@1.00,	BH08@3.00,						
BH16@0.50							
EP074G: Trihalomethanes							
Soil Glass Jar - Unpreserved							
BH03@2.00,	BH01@0.50,	20-Dec-2018	19-Dec-2018	1	22-Dec-2018	19-Dec-2018	3
BH01@2.00,	DUP1,						
BH02@1.00,	BH02@2.50,						
MW02@1.00,	MW02@6.00						

Matrix: **SOIL**

Method / Container / Client Sample ID(s)	Extraction / Preparation: Date extracted	Extraction / Preparation: Due for extraction	Extraction / Preparation: Days overdue	Analysis: Date analysed	Analysis: Due for analysis	Analysis: Days overdue
EP074G: Trihalomethanes - Analysis Holding Time Compliance						
Soil Glass Jar - Unpreserved MW06@1.50, MW06@4.50, BH15@1.50, BH12@1.00, BH24@1.50, BH24@4.50, BH19@0.40	----	----	----	22-Dec-2018	20-Dec-2018	**2**
Soil Glass Jar - Unpreserved BH06@0.50, BH06@2.40, BH08@1.00, BH08@3.00, BH16@0.50	----	----	----	22-Dec-2018	21-Dec-2018	**1**

Analysis Holding Time Compliance

If samples are identified below as having been analysed or extracted outside of recommended holding times, this should be taken into consideration when interpreting results.

This report summarizes extraction / preparation and analysis times and compares each with ALS recommended holding times (referencing USEPA SW 846, APHA, AS and NEPM) based on the sample container provided. Dates reported represent first date of extraction or analysis and preclude subsequent dilutions and reruns. A listing of breaches (if any) is provided herein.

Holding time for leachate methods (e.g. TCLP) vary according to the analytes reported. Assessment compares the leach date with the shortest analyte holding time for the equivalent soil method. These are: organics 14 days, mercury 28 days & other metals 180 days. A recorded breach does not guarantee a breach for all non-volatile parameters.

Holding times for ***VOC in soils*** vary according to analytes of interest. Vinyl Chloride and Styrene holding time is 7 days; others 14 days. A recorded breach does not guarantee a breach for all VOC analytes and should be verified in case the reported breach is a false positive or Vinyl Chloride and Styrene are not key analytes of interest/concern.

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation: Date extracted	Extraction / Preparation: Due for extraction	Extraction / Preparation: Evaluation	Analysis: Date analysed	Analysis: Due for analysis	Analysis: Evaluation
EA055: Moisture Content (Dried @ 105-110°C)							
Soil Glass Jar - Unpreserved (EA055) BH03@2.00, BH01@0.50, BH01@2.00, DUP1, BH02@1.00, BH02@2.50, MW02@1.00, MW02@6.00	**12-Dec-2018**	**----**	----	----	**20-Dec-2018**	26-Dec-2018	✓
Soil Glass Jar - Unpreserved (EA055) MW06@1.50, MW06@4.50, BH15@1.50, BH12@1.00, BH24@1.50, BH24@4.50, BH19@0.40	**13-Dec-2018**	**----**	----	----	**20-Dec-2018**	27-Dec-2018	✓
Soil Glass Jar - Unpreserved (EA055)							

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EA055: Moisture Content (Dried @ 105-110°C) - Continued							
BH06@0.50, BH06@2.40, BH08@1.00, BH08@3.00, BH16@0.50, BH16@3.00, BH18@1.00, BH18@3.00, BH17@1.50, BH10@.020, BH10@4.00, BH09@1 .50, BH09@3.00, BH11@1 .00, BH11@3.00	**14-Dec-2018**	**----**	----	----	**20-Dec-2018**	28-Dec-2018	✓
EA200: AS 4964 - 2004 Identification of Asbestos in Soils							
Snap Lock Bag - Subsampled by ALS (EA200) BH01@0.50	**12-Dec-2018**	**----**	----	----	**24-Dec-2018**	10-Jun-2019	✓
Snap Lock Bag - Subsampled by ALS (EA200) BH24@1.50	**13-Dec-2018**	**----**	----	----	**24-Dec-2018**	11-Jun-2019	✓
Snap Lock Bag: Separate bag received (EA200) BH02@1.00, MW02@1.00	**12-Dec-2018**	**----**	----	----	**20-Dec-2018**	10-Jun-2019	✓
Snap Lock Bag: Separate bag received (EA200) MW06@1.50, BH15@1.50, BH12@1.00, BH19@0.40	**13-Dec-2018**	**----**	----	----	**20-Dec-2018**	11-Jun-2019	✓
Snap Lock Bag: Separate bag received (EA200) BH06@0.50, BH08@1.00, BH16@0.50, BH18@1.00, BH17@1.50, BH10@.020, BH09@1 .50, BH11@1 .00	**14-Dec-2018**	**----**	----	----	**20-Dec-2018**	12-Jun-2019	✓
EA200N: Asbestos Quantification (non-NATA)							
Snap Lock Bag: Separate bag received (EA200N) BH02@1.00, MW02@1.00	**12-Dec-2018**	**----**	----	----	**20-Dec-2018**	10-Jun-2019	✓
Snap Lock Bag: Separate bag received (EA200N) MW06@1.50, BH15@1.50, BH12@1.00, BH19@0.40	**13-Dec-2018**	**----**	----	----	**20-Dec-2018**	11-Jun-2019	✓
Snap Lock Bag: Separate bag received (EA200N) BH06@0.50, BH08@1.00, BH16@0.50, BH18@1.00, BH17@1.50, BH10@.020, BH09@1 .50, BH11@1 .00	**14-Dec-2018**	**----**	----	----	**20-Dec-2018**	12-Jun-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EG005T: Total Metals by ICP-AES							
Soil Glass Jar - Unpreserved (EG005T)							
BH03@2.00, BH01@0.50, BH01@2.00, DUP1, BH02@1.00, BH02@2.50, MW02@1.00, MW02@6.00	**12-Dec-2018**	**22-Dec-2018**	10-Jun-2019	✓	**24-Dec-2018**	10-Jun-2019	✓
Soil Glass Jar - Unpreserved (EG005T)							
MW06@1.50, MW06@4.50, BH15@1.50, BH12@1.00, BH24@1.50, BH24@4.50, BH19@0.40	**13-Dec-2018**	**22-Dec-2018**	11-Jun-2019	✓	**24-Dec-2018**	11-Jun-2019	✓
Soil Glass Jar - Unpreserved (EG005T)							
BH06@0.50, BH06@2.40, BH08@1.00, BH08@3.00, BH16@0.50, BH16@3.00, BH18@1.00, BH18@3.00, BH17@1.50, BH10@.020, BH10@4.00, BH09@1 .50, BH09@3.00, BH11@1 .00, BH11@3.00	**14-Dec-2018**	**22-Dec-2018**	12-Jun-2019	✓	**24-Dec-2018**	12-Jun-2019	✓
EG035T: Total Recoverable Mercury by FIMS							
Soil Glass Jar - Unpreserved (EG035T)							
BH03@2.00, BH01@0.50, BH01@2.00, DUP1, BH02@1.00, BH02@2.50, MW02@1.00, MW02@6.00	**12-Dec-2018**	**22-Dec-2018**	09-Jan-2019	✓	**22-Dec-2018**	09-Jan-2019	✓
Soil Glass Jar - Unpreserved (EG035T)							
MW06@1.50, MW06@4.50, BH15@1.50, BH12@1.00, BH24@1.50, BH24@4.50, BH19@0.40	**13-Dec-2018**	**22-Dec-2018**	10-Jan-2019	✓	**22-Dec-2018**	10-Jan-2019	✓
Soil Glass Jar - Unpreserved (EG035T)							
BH06@0.50, BH06@2.40, BH08@1.00, BH08@3.00, BH16@0.50, BH16@3.00, BH18@1.00, BH18@3.00, BH17@1.50, BH10@.020, BH10@4.00, BH09@1 .50, BH09@3.00, BH11@1 .00, BH11@3.00	**14-Dec-2018**	**22-Dec-2018**	11-Jan-2019	✓	**22-Dec-2018**	11-Jan-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP066: Polychlorinated Biphenyls (PCB)							
Soil Glass Jar - Unpreserved (EP066) BH03@2.00, BH01@0.50, BH01@2.00, DUP1, BH02@1.00, BH02@2.50, MW02@1.00, MW02@6.00	**12-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**23-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP066) MW06@1.50, MW06@4.50, BH15@1.50, BH12@1.00, BH24@1.50, BH24@4.50, BH19@0.40	**13-Dec-2018**	**21-Dec-2018**	27-Dec-2018	✓	**23-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP066) BH06@0.50, BH06@2.40, BH08@1.00, BH08@3.00, BH16@0.50, BH16@3.00, BH18@1.00, BH18@3.00, BH17@1.50, BH10@.020, BH10@4.00, BH09@1 .50, BH09@3.00, BH11@1 .00, BH11@3.00	**14-Dec-2018**	**21-Dec-2018**	28-Dec-2018	✓	**23-Dec-2018**	30-Jan-2019	✓
EP068A: Organochlorine Pesticides (OC)							
Soil Glass Jar - Unpreserved (EP068) BH03@2.00, BH01@0.50, BH01@2.00, DUP1, BH02@1.00, BH02@2.50, MW02@1.00, MW02@6.00	**12-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**23-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP068) MW06@1.50, MW06@4.50, BH15@1.50, BH12@1.00, BH24@1.50, BH24@4.50, BH19@0.40	**13-Dec-2018**	**21-Dec-2018**	27-Dec-2018	✓	**23-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP068) BH06@0.50, BH06@2.40, BH08@1.00, BH08@3.00, BH16@0.50, BH16@3.00, BH18@1.00, BH18@3.00, BH17@1.50, BH10@.020, BH10@4.00, BH09@1 .50, BH09@3.00, BH11@1 .00, BH11@3.00	**14-Dec-2018**	**21-Dec-2018**	28-Dec-2018	✓	**23-Dec-2018**	30-Jan-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP068B: Organophosphorus Pesticides (OP)							
Soil Glass Jar - Unpreserved (EP068) BH03@2.00, BH01@0.50, BH01@2.00, DUP1, BH02@1.00, BH02@2.50, MW02@1.00, MW02@6.00	**12-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**23-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP068) MW06@1.50, MW06@4.50, BH15@1.50, BH12@1.00, BH24@1.50, BH24@4.50, BH19@0.40	**13-Dec-2018**	**21-Dec-2018**	27-Dec-2018	✓	**23-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP068) BH06@0.50, BH06@2.40, BH08@1.00, BH08@3.00, BH16@0.50, BH16@3.00, BH18@1.00, BH18@3.00, BH17@1.50, BH10@.020, BH10@4.00, BH09@1 .50, BH09@3.00, BH11@1 .00, BH11@3.00	**14-Dec-2018**	**21-Dec-2018**	28-Dec-2018	✓	**23-Dec-2018**	30-Jan-2019	✓
EP074A: Monocyclic Aromatic Hydrocarbons							
Soil Glass Jar - Unpreserved (EP074) BH03@2.00, BH01@0.50, BH01@2.00, DUP1, BH02@1.00, BH02@2.50, MW02@1.00, MW02@6.00	**12-Dec-2018**	**20-Dec-2018**	19-Dec-2018	×	**22-Dec-2018**	19-Dec-2018	×
Soil Glass Jar - Unpreserved (EP074) MW06@1.50, MW06@4.50, BH15@1.50, BH12@1.00, BH24@1.50, BH24@4.50, BH19@0.40	**13-Dec-2018**	**20-Dec-2018**	20-Dec-2018	✓	**22-Dec-2018**	20-Dec-2018	×
Soil Glass Jar - Unpreserved (EP074) BH16@3.00, BH18@1.00, BH18@3.00, BH17@1.50, BH10@.020, BH10@4.00, BH09@1 .50, BH09@3.00, BH11@1 .00, BH11@3.00	**14-Dec-2018**	**19-Dec-2018**	21-Dec-2018	✓	**21-Dec-2018**	21-Dec-2018	✓
Soil Glass Jar - Unpreserved (EP074) BH06@0.50, BH06@2.40, BH08@1.00, BH08@3.00, BH16@0.50	**14-Dec-2018**	**20-Dec-2018**	21-Dec-2018	✓	**22-Dec-2018**	21-Dec-2018	×

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP074B: Oxygenated Compounds							
Soil Glass Jar - Unpreserved (EP074) BH03@2.00, BH01@0.50, BH01@2.00, DUP1, BH02@1.00, BH02@2.50, MW02@1.00, MW02@6.00	**12-Dec-2018**	**20-Dec-2018**	19-Dec-2018	×	**22-Dec-2018**	19-Dec-2018	×
Soil Glass Jar - Unpreserved (EP074) MW06@1.50, MW06@4.50, BH15@1.50, BH12@1.00, BH24@1.50, BH24@4.50, BH19@0.40	**13-Dec-2018**	**20-Dec-2018**	20-Dec-2018	✓	**22-Dec-2018**	20-Dec-2018	×
Soil Glass Jar - Unpreserved (EP074) BH16@3.00, BH18@1.00, BH18@3.00, BH17@1.50, BH10@.020, BH10@4.00, BH09@1 .50, BH09@3.00, BH11@1 .00, BH11@3.00	**14-Dec-2018**	**19-Dec-2018**	21-Dec-2018	✓	**21-Dec-2018**	21-Dec-2018	✓
Soil Glass Jar - Unpreserved (EP074) BH06@0.50, BH06@2.40, BH08@1.00, BH08@3.00, BH16@0.50	**14-Dec-2018**	**20-Dec-2018**	21-Dec-2018	✓	**22-Dec-2018**	21-Dec-2018	×
EP074C: Sulfonated Compounds							
Soil Glass Jar - Unpreserved (EP074) BH03@2.00, BH01@0.50, BH01@2.00, DUP1, BH02@1.00, BH02@2.50, MW02@1.00, MW02@6.00	**12-Dec-2018**	**20-Dec-2018**	19-Dec-2018	×	**22-Dec-2018**	19-Dec-2018	×
Soil Glass Jar - Unpreserved (EP074) MW06@1.50, MW06@4.50, BH15@1.50, BH12@1.00, BH24@1.50, BH24@4.50, BH19@0.40	**13-Dec-2018**	**20-Dec-2018**	20-Dec-2018	✓	**22-Dec-2018**	20-Dec-2018	×
Soil Glass Jar - Unpreserved (EP074) BH16@3.00, BH18@1.00, BH18@3.00, BH17@1.50, BH10@.020, BH10@4.00, BH09@1 .50, BH09@3.00, BH11@1 .00, BH11@3.00	**14-Dec-2018**	**19-Dec-2018**	21-Dec-2018	✓	**21-Dec-2018**	21-Dec-2018	✓
Soil Glass Jar - Unpreserved (EP074) BH06@0.50, BH06@2.40, BH08@1.00, BH08@3.00, BH16@0.50	**14-Dec-2018**	**20-Dec-2018**	21-Dec-2018	✓	**22-Dec-2018**	21-Dec-2018	×

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP074D: Fumigants							
Soil Glass Jar - Unpreserved (EP074)							
BH03@2.00, BH01@0.50, BH01@2.00, DUP1, BH02@1.00, BH02@2.50, MW02@1.00, MW02@6.00	**12-Dec-2018**	**20-Dec-2018**	19-Dec-2018	×	**22-Dec-2018**	19-Dec-2018	×
Soil Glass Jar - Unpreserved (EP074)							
MW06@1.50, MW06@4.50, BH15@1.50, BH12@1.00, BH24@1.50, BH24@4.50, BH19@0.40	**13-Dec-2018**	**20-Dec-2018**	20-Dec-2018	✓	**22-Dec-2018**	20-Dec-2018	×
Soil Glass Jar - Unpreserved (EP074)							
BH16@3.00, BH18@1.00, BH18@3.00, BH17@1.50, BH10@.020, BH10@4.00, BH09@1 .50, BH09@3.00, BH11@1 .00, BH11@3.00	**14-Dec-2018**	**19-Dec-2018**	21-Dec-2018	✓	**21-Dec-2018**	21-Dec-2018	✓
Soil Glass Jar - Unpreserved (EP074)							
BH06@0.50, BH06@2.40, BH08@1.00, BH08@3.00, BH16@0.50	**14-Dec-2018**	**20-Dec-2018**	21-Dec-2018	✓	**22-Dec-2018**	21-Dec-2018	×
EP074E: Halogenated Aliphatic Compounds							
Soil Glass Jar - Unpreserved (EP074)							
BH03@2.00, BH01@0.50, BH01@2.00, DUP1, BH02@1.00, BH02@2.50, MW02@1.00, MW02@6.00	**12-Dec-2018**	**20-Dec-2018**	19-Dec-2018	×	**22-Dec-2018**	19-Dec-2018	×
Soil Glass Jar - Unpreserved (EP074)							
MW06@1.50, MW06@4.50, BH15@1.50, BH12@1.00, BH24@1.50, BH24@4.50, BH19@0.40	**13-Dec-2018**	**20-Dec-2018**	20-Dec-2018	✓	**22-Dec-2018**	20-Dec-2018	×
Soil Glass Jar - Unpreserved (EP074)							
BH16@3.00, BH18@1.00, BH18@3.00, BH17@1.50, BH10@.020, BH10@4.00, BH09@1 .50, BH09@3.00, BH11@1 .00, BH11@3.00	**14-Dec-2018**	**19-Dec-2018**	21-Dec-2018	✓	**21-Dec-2018**	21-Dec-2018	✓
Soil Glass Jar - Unpreserved (EP074)							
BH06@0.50, BH06@2.40, BH08@1.00, BH08@3.00, BH16@0.50	**14-Dec-2018**	**20-Dec-2018**	21-Dec-2018	✓	**22-Dec-2018**	21-Dec-2018	×

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP074F: Halogenated Aromatic Compounds							
Soil Glass Jar - Unpreserved (EP074) BH03@2.00, BH01@0.50, BH01@2.00, DUP1, BH02@1.00, BH02@2.50, MW02@1.00, MW02@6.00	**12-Dec-2018**	**20-Dec-2018**	19-Dec-2018	×	**22-Dec-2018**	19-Dec-2018	×
Soil Glass Jar - Unpreserved (EP074) MW06@1.50, MW06@4.50, BH15@1.50, BH12@1.00, BH24@1.50, BH24@4.50, BH19@0.40	**13-Dec-2018**	**20-Dec-2018**	20-Dec-2018	✓	**22-Dec-2018**	20-Dec-2018	×
Soil Glass Jar - Unpreserved (EP074) BH16@3.00, BH18@1.00, BH18@3.00, BH17@1.50, BH10@.020, BH10@4.00, BH09@1 .50, BH09@3.00, BH11@1 .00, BH11@3.00	**14-Dec-2018**	**19-Dec-2018**	21-Dec-2018	✓	**21-Dec-2018**	21-Dec-2018	✓
Soil Glass Jar - Unpreserved (EP074) BH06@0.50, BH06@2.40, BH08@1.00, BH08@3.00, BH16@0.50	**14-Dec-2018**	**20-Dec-2018**	21-Dec-2018	✓	**22-Dec-2018**	21-Dec-2018	×
EP074G: Trihalomethanes							
Soil Glass Jar - Unpreserved (EP074) BH03@2.00, BH01@0.50, BH01@2.00, DUP1, BH02@1.00, BH02@2.50, MW02@1.00, MW02@6.00	**12-Dec-2018**	**20-Dec-2018**	19-Dec-2018	×	**22-Dec-2018**	19-Dec-2018	×
Soil Glass Jar - Unpreserved (EP074) MW06@1.50, MW06@4.50, BH15@1.50, BH12@1.00, BH24@1.50, BH24@4.50, BH19@0.40	**13-Dec-2018**	**20-Dec-2018**	20-Dec-2018	✓	**22-Dec-2018**	20-Dec-2018	×
Soil Glass Jar - Unpreserved (EP074) BH16@3.00, BH18@1.00, BH18@3.00, BH17@1.50, BH10@.020, BH10@4.00, BH09@1 .50, BH09@3.00, BH11@1 .00, BH11@3.00	**14-Dec-2018**	**19-Dec-2018**	21-Dec-2018	✓	**21-Dec-2018**	21-Dec-2018	✓
Soil Glass Jar - Unpreserved (EP074) BH06@0.50, BH06@2.40, BH08@1.00, BH08@3.00, BH16@0.50	**14-Dec-2018**	**20-Dec-2018**	21-Dec-2018	✓	**22-Dec-2018**	21-Dec-2018	×

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP075A: Phenolic Compounds							
Soil Glass Jar - Unpreserved (EP075)							
BH03@2.00, BH01@0.50, BH01@2.00, DUP1, BH02@1.00, BH02@2.50, MW02@1.00, MW02@6.00	**12-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075)							
MW06@1.50, MW06@4.50, BH15@1.50, BH12@1.00, BH24@1.50, BH24@4.50, BH19@0.40	**13-Dec-2018**	**21-Dec-2018**	27-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075)							
BH06@0.50, BH06@2.40, BH08@1.00, BH08@3.00, BH16@0.50, BH16@3.00, BH18@1.00, BH18@3.00, BH17@1.50, BH10@.020, BH10@4.00, BH09@1 .50, BH09@3.00, BH11@1 .00, BH11@3.00	**14-Dec-2018**	**21-Dec-2018**	28-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
EP075B: Polynuclear Aromatic Hydrocarbons							
Soil Glass Jar - Unpreserved (EP075)							
BH03@2.00, BH01@0.50, BH01@2.00, DUP1, BH02@1.00, BH02@2.50, MW02@1.00, MW02@6.00	**12-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075)							
MW06@1.50, MW06@4.50, BH15@1.50, BH12@1.00, BH24@1.50, BH24@4.50, BH19@0.40	**13-Dec-2018**	**21-Dec-2018**	27-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075)							
BH06@0.50, BH06@2.40, BH08@1.00, BH08@3.00, BH16@0.50, BH16@3.00, BH18@1.00, BH18@3.00, BH17@1.50, BH10@.020, BH10@4.00, BH09@1 .50, BH09@3.00, BH11@1 .00, BH11@3.00	**14-Dec-2018**	**21-Dec-2018**	28-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP075C: Phthalate Esters							
Soil Glass Jar - Unpreserved (EP075)							
BH03@2.00, BH01@0.50, BH01@2.00, DUP1, BH02@1.00, BH02@2.50, MW02@1.00, MW02@6.00	**12-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075)							
MW06@1.50, MW06@4.50, BH15@1.50, BH12@1.00, BH24@1.50, BH24@4.50, BH19@0.40	**13-Dec-2018**	**21-Dec-2018**	27-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075)							
BH06@0.50, BH06@2.40, BH08@1.00, BH08@3.00, BH16@0.50, BH16@3.00, BH18@1.00, BH18@3.00, BH17@1.50, BH10@.020, BH10@4.00, BH09@1 .50, BH09@3.00, BH11@1 .00, BH11@3.00	**14-Dec-2018**	**21-Dec-2018**	28-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
EP075D: Nitrosamines							
Soil Glass Jar - Unpreserved (EP075)							
BH03@2.00, BH01@0.50, BH01@2.00, DUP1, BH02@1.00, BH02@2.50, MW02@1.00, MW02@6.00	**12-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075)							
MW06@1.50, MW06@4.50, BH15@1.50, BH12@1.00, BH24@1.50, BH24@4.50, BH19@0.40	**13-Dec-2018**	**21-Dec-2018**	27-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075)							
BH06@0.50, BH06@2.40, BH08@1.00, BH08@3.00, BH16@0.50, BH16@3.00, BH18@1.00, BH18@3.00, BH17@1.50, BH10@.020, BH10@4.00, BH09@1 .50, BH09@3.00, BH11@1 .00, BH11@3.00	**14-Dec-2018**	**21-Dec-2018**	28-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP075E: Nitroaromatics and Ketones							
Soil Glass Jar - Unpreserved (EP075)							
BH03@2.00, BH01@0.50, BH01@2.00, DUP1, BH02@1.00, BH02@2.50, MW02@1.00, MW02@6.00	**12-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075)							
MW06@1.50, MW06@4.50, BH15@1.50, BH12@1.00, BH24@1.50, BH24@4.50, BH19@0.40	**13-Dec-2018**	**21-Dec-2018**	27-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075)							
BH06@0.50, BH06@2.40, BH08@1.00, BH08@3.00, BH16@0.50, BH16@3.00, BH18@1.00, BH18@3.00, BH17@1.50, BH10@.020, BH10@4.00, BH09@1 .50, BH09@3.00, BH11@1 .00, BH11@3.00	**14-Dec-2018**	**21-Dec-2018**	28-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
EP075F: Haloethers							
Soil Glass Jar - Unpreserved (EP075)							
BH03@2.00, BH01@0.50, BH01@2.00, DUP1, BH02@1.00, BH02@2.50, MW02@1.00, MW02@6.00	**12-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075)							
MW06@1.50, MW06@4.50, BH15@1.50, BH12@1.00, BH24@1.50, BH24@4.50, BH19@0.40	**13-Dec-2018**	**21-Dec-2018**	27-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075)							
BH06@0.50, BH06@2.40, BH08@1.00, BH08@3.00, BH16@0.50, BH16@3.00, BH18@1.00, BH18@3.00, BH17@1.50, BH10@.020, BH10@4.00, BH09@1 .50, BH09@3.00, BH11@1 .00, BH11@3.00	**14-Dec-2018**	**21-Dec-2018**	28-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP075G: Chlorinated Hydrocarbons							
Soil Glass Jar - Unpreserved (EP075) BH03@2.00, BH01@0.50, BH01@2.00, DUP1, BH02@1.00, BH02@2.50, MW02@1.00, MW02@6.00	**12-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075) MW06@1.50, MW06@4.50, BH15@1.50, BH12@1.00, BH24@1.50, BH24@4.50, BH19@0.40	**13-Dec-2018**	**21-Dec-2018**	27-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075) BH06@0.50, BH06@2.40, BH08@1.00, BH08@3.00, BH16@0.50, BH16@3.00, BH18@1.00, BH18@3.00, BH17@1.50, BH10@.020, BH10@4.00, BH09@1 .50, BH09@3.00, BH11@1 .00, BH11@3.00	**14-Dec-2018**	**21-Dec-2018**	28-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
EP075H: Anilines and Benzidines							
Soil Glass Jar - Unpreserved (EP075) BH03@2.00, BH01@0.50, BH01@2.00, DUP1, BH02@1.00, BH02@2.50, MW02@1.00, MW02@6.00	**12-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075) MW06@1.50, MW06@4.50, BH15@1.50, BH12@1.00, BH24@1.50, BH24@4.50, BH19@0.40	**13-Dec-2018**	**21-Dec-2018**	27-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075) BH06@0.50, BH06@2.40, BH08@1.00, BH08@3.00, BH16@0.50, BH16@3.00, BH18@1.00, BH18@3.00, BH17@1.50, BH10@.020, BH10@4.00, BH09@1 .50, BH09@3.00, BH11@1 .00, BH11@3.00	**14-Dec-2018**	**21-Dec-2018**	28-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP075I: Organochlorine Pesticides							
Soil Glass Jar - Unpreserved (EP075) BH03@2.00, BH01@0.50, BH01@2.00, DUP1, BH02@1.00, BH02@2.50, MW02@1.00, MW02@6.00	**12-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075) MW06@1.50, MW06@4.50, BH15@1.50, BH12@1.00, BH24@1.50, BH24@4.50, BH19@0.40	**13-Dec-2018**	**21-Dec-2018**	27-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075) BH06@0.50, BH06@2.40, BH08@1.00, BH08@3.00, BH16@0.50, BH16@3.00, BH18@1.00, BH18@3.00, BH17@1.50, BH10@.020, BH10@4.00, BH09@1 .50, BH09@3.00, BH11@1 .00, BH11@3.00	**14-Dec-2018**	**21-Dec-2018**	28-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
EP075J: Organophosphorus Pesticides							
Soil Glass Jar - Unpreserved (EP075) BH03@2.00, BH01@0.50, BH01@2.00, DUP1, BH02@1.00, BH02@2.50, MW02@1.00, MW02@6.00	**12-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075) MW06@1.50, MW06@4.50, BH15@1.50, BH12@1.00, BH24@1.50, BH24@4.50, BH19@0.40	**13-Dec-2018**	**21-Dec-2018**	27-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075) BH06@0.50, BH06@2.40, BH08@1.00, BH08@3.00, BH16@0.50, BH16@3.00, BH18@1.00, BH18@3.00, BH17@1.50, BH10@.020, BH10@4.00, BH09@1 .50, BH09@3.00, BH11@1 .00, BH11@3.00	**14-Dec-2018**	**21-Dec-2018**	28-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP080/071: Total Petroleum Hydrocarbons							
Soil Glass Jar - Unpreserved (EP080)							
BH03@2.00, BH01@0.50, BH01@2.00, DUP1, BH02@1.00, BH02@2.50, MW02@1.00, MW02@6.00	**12-Dec-2018**	**20-Dec-2018**	26-Dec-2018	✓	**22-Dec-2018**	26-Dec-2018	✓
Soil Glass Jar - Unpreserved (EP071)							
BH03@2.00, BH01@0.50, BH01@2.00, DUP1, BH02@1.00, BH02@2.50, MW02@1.00, MW02@6.00	**12-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**22-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP080)							
MW06@1.50, MW06@4.50, BH15@1.50, BH12@1.00, BH24@1.50, BH24@4.50, BH19@0.40	**13-Dec-2018**	**20-Dec-2018**	27-Dec-2018	✓	**22-Dec-2018**	27-Dec-2018	✓
Soil Glass Jar - Unpreserved (EP071)							
MW06@1.50, MW06@4.50, BH15@1.50, BH12@1.00, BH24@1.50, BH24@4.50, BH19@0.40	**13-Dec-2018**	**21-Dec-2018**	27-Dec-2018	✓	**22-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP080)							
BH16@3.00, BH18@1.00, BH18@3.00, BH17@1.50, BH10@.020, BH10@4.00, BH09@1 .50, BH09@3.00, BH11@1 .00, BH11@3.00	**14-Dec-2018**	**19-Dec-2018**	28-Dec-2018	✓	**21-Dec-2018**	28-Dec-2018	✓
Soil Glass Jar - Unpreserved (EP080)							
BH06@0.50, BH06@2.40, BH08@1.00, BH08@3.00, BH16@0.50	**14-Dec-2018**	**20-Dec-2018**	28-Dec-2018	✓	**22-Dec-2018**	28-Dec-2018	✓
Soil Glass Jar - Unpreserved (EP071)							
BH06@0.50, BH06@2.40, BH08@1.00, BH08@3.00, BH16@0.50, BH16@3.00, BH18@1.00, BH18@3.00, BH17@1.50, BH10@.020, BH10@4.00, BH09@1 .50, BH09@3.00, BH11@1 .00, BH11@3.00	**14-Dec-2018**	**21-Dec-2018**	28-Dec-2018	✓	**22-Dec-2018**	30-Jan-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions							
Soil Glass Jar - Unpreserved (EP080)							
BH03@2.00, BH01@0.50, BH01@2.00, DUP1, BH02@1.00, BH02@2.50, MW02@1.00, MW02@6.00	**12-Dec-2018**	**20-Dec-2018**	26-Dec-2018	✓	**22-Dec-2018**	26-Dec-2018	✓
Soil Glass Jar - Unpreserved (EP071)							
BH03@2.00, BH01@0.50, BH01@2.00, DUP1, BH02@1.00, BH02@2.50, MW02@1.00, MW02@6.00	**12-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**22-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP080)							
MW06@1.50, MW06@4.50, BH15@1.50, BH12@1.00, BH24@1.50, BH24@4.50, BH19@0.40	**13-Dec-2018**	**20-Dec-2018**	27-Dec-2018	✓	**22-Dec-2018**	27-Dec-2018	✓
Soil Glass Jar - Unpreserved (EP071)							
MW06@1.50, MW06@4.50, BH15@1.50, BH12@1.00, BH24@1.50, BH24@4.50, BH19@0.40	**13-Dec-2018**	**21-Dec-2018**	27-Dec-2018	✓	**22-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP080)							
BH16@3.00, BH18@1.00, BH18@3.00, BH17@1.50, BH10@.020, BH10@4.00, BH09@1 .50, BH09@3.00, BH11@1 .00, BH11@3.00	**14-Dec-2018**	**19-Dec-2018**	28-Dec-2018	✓	**21-Dec-2018**	28-Dec-2018	✓
Soil Glass Jar - Unpreserved (EP080)							
BH06@0.50, BH06@2.40, BH08@1.00, BH08@3.00, BH16@0.50	**14-Dec-2018**	**20-Dec-2018**	28-Dec-2018	✓	**22-Dec-2018**	28-Dec-2018	✓
Soil Glass Jar - Unpreserved (EP071)							
BH06@0.50, BH06@2.40, BH08@1.00, BH08@3.00, BH16@0.50, BH16@3.00, BH18@1.00, BH18@3.00, BH17@1.50, BH10@.020, BH10@4.00, BH09@1 .50, BH09@3.00, BH11@1 .00, BH11@3.00	**14-Dec-2018**	**21-Dec-2018**	28-Dec-2018	✓	**22-Dec-2018**	30-Jan-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP080: BTEXN							
Soil Glass Jar - Unpreserved (EP080)							
BH03@2.00, BH01@0.50, BH01@2.00, DUP1, BH02@1.00, BH02@2.50, MW02@1.00, MW02@6.00	**12-Dec-2018**	**20-Dec-2018**	26-Dec-2018	✓	**22-Dec-2018**	26-Dec-2018	✓
Soil Glass Jar - Unpreserved (EP080)							
MW06@1.50, MW06@4.50, BH15@1.50, BH12@1.00, BH24@1.50, BH24@4.50, BH19@0.40	**13-Dec-2018**	**20-Dec-2018**	27-Dec-2018	✓	**22-Dec-2018**	27-Dec-2018	✓
Soil Glass Jar - Unpreserved (EP080)							
BH16@3.00, BH18@1.00, BH18@3.00, BH17@1.50, BH10@.020, BH10@4.00, BH09@1 .50, BH09@3.00, BH11@1 .00, BH11@3.00	**14-Dec-2018**	**19-Dec-2018**	28-Dec-2018	✓	**21-Dec-2018**	28-Dec-2018	✓
Soil Glass Jar - Unpreserved (EP080)							
BH06@0.50, BH06@2.40, BH08@1.00, BH08@3.00, BH16@0.50	**14-Dec-2018**	**20-Dec-2018**	28-Dec-2018	✓	**22-Dec-2018**	28-Dec-2018	✓
EP231A: Perfluoroalkyl Sulfonic Acids							
HDPE Soil Jar (EP231X)							
MW06@4.50, BH19@0.40	**13-Dec-2018**	**21-Dec-2018**	11-Jun-2019	✓	**21-Dec-2018**	30-Jan-2019	✓
HDPE Soil Jar (EP231X)							
BH06@0.50, BH11@3.00	**14-Dec-2018**	**21-Dec-2018**	12-Jun-2019	✓	**21-Dec-2018**	30-Jan-2019	✓
EP231B: Perfluoroalkyl Carboxylic Acids							
HDPE Soil Jar (EP231X)							
MW06@4.50, BH19@0.40	**13-Dec-2018**	**21-Dec-2018**	11-Jun-2019	✓	**21-Dec-2018**	30-Jan-2019	✓
HDPE Soil Jar (EP231X)							
BH06@0.50, BH11@3.00	**14-Dec-2018**	**21-Dec-2018**	12-Jun-2019	✓	**21-Dec-2018**	30-Jan-2019	✓
EP231C: Perfluoroalkyl Sulfonamides							
HDPE Soil Jar (EP231X)							
MW06@4.50, BH19@0.40	**13-Dec-2018**	**21-Dec-2018**	11-Jun-2019	✓	**21-Dec-2018**	30-Jan-2019	✓
HDPE Soil Jar (EP231X)							
BH06@0.50, BH11@3.00	**14-Dec-2018**	**21-Dec-2018**	12-Jun-2019	✓	**21-Dec-2018**	30-Jan-2019	✓
EP231D: (n:2) Fluorotelomer Sulfonic Acids							
HDPE Soil Jar (EP231X)							
MW06@4.50, BH19@0.40	**13-Dec-2018**	**21-Dec-2018**	11-Jun-2019	✓	**21-Dec-2018**	30-Jan-2019	✓
HDPE Soil Jar (EP231X)							
BH06@0.50, BH11@3.00	**14-Dec-2018**	**21-Dec-2018**	12-Jun-2019	✓	**21-Dec-2018**	30-Jan-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP231P: PFAS Sums							
HDPE Soil Jar (EP231X) MW06@4.50, BH19@0.40	**13-Dec-2018**	**21-Dec-2018**	11-Jun-2019	✓	**21-Dec-2018**	30-Jan-2019	✓
HDPE Soil Jar (EP231X) BH06@0.50, BH11@3.00	**14-Dec-2018**	**21-Dec-2018**	12-Jun-2019	✓	**21-Dec-2018**	30-Jan-2019	✓

Quality Control Parameter Frequency Compliance

The following report summarises the frequency of laboratory QC samples analysed within the analytical lot(s) in which the submitted sample(s) was(were) processed. Actual rate should be greater than or equal to the expected rate. A listing of breaches is provided in the Summary of Outliers.

Matrix: **SOIL**

Evaluation: × = Quality Control frequency not within specification ; ✓ = Quality Control frequency within specification.

Quality Control Sample Type		Count		Rate (%)			Quality Control Specification
Analytical Methods	*Method*	*QC*	*Regular*	***Actual***	***Expected***	*Evaluation*	
Laboratory Duplicates (DUP)							
Moisture Content	EA055	4	40	**10.00**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	2	20	**10.00**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Pesticides by GCMS	EP068	4	31	**12.90**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Polychlorinated Biphenyls (PCB)	EP066	4	31	**12.90**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Semivolatile Organic Compounds	EP075	4	31	**12.90**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Total Mercury by FIMS	EG035T	4	40	**10.00**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Total Metals by ICP-AES	EG005T	4	40	**10.00**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH - Semivolatile Fraction	EP071	4	31	**12.90**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH Volatiles/BTEX	EP080	4	39	**10.26**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Volatile Organic Compounds	EP074	4	38	**10.53**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Laboratory Control Samples (LCS)							
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	1	20	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Pesticides by GCMS	EP068	2	31	**6.45**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Polychlorinated Biphenyls (PCB)	EP066	2	31	**6.45**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Semivolatile Organic Compounds	EP075	2	31	**6.45**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Total Mercury by FIMS	EG035T	2	40	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Total Metals by ICP-AES	EG005T	2	40	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH - Semivolatile Fraction	EP071	2	31	**6.45**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH Volatiles/BTEX	EP080	2	39	**5.13**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Volatile Organic Compounds	EP074	2	38	**5.26**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Method Blanks (MB)							
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	1	20	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Pesticides by GCMS	EP068	2	31	**6.45**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Polychlorinated Biphenyls (PCB)	EP066	2	31	**6.45**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Semivolatile Organic Compounds	EP075	2	31	**6.45**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Total Mercury by FIMS	EG035T	2	40	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Total Metals by ICP-AES	EG005T	2	40	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH - Semivolatile Fraction	EP071	2	31	**6.45**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH Volatiles/BTEX	EP080	2	39	**5.13**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Volatile Organic Compounds	EP074	2	38	**5.26**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Matrix Spikes (MS)							
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	1	20	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Pesticides by GCMS	EP068	2	31	**6.45**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Polychlorinated Biphenyls (PCB)	EP066	2	31	**6.45**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Semivolatile Organic Compounds	EP075	2	31	**6.45**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Total Mercury by FIMS	EG035T	2	40	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard

Matrix: **SOIL**

Evaluation: × = Quality Control frequency not within specification ; ✓ = Quality Control frequency within specification.

Quality Control Sample Type		Count		Rate (%)			Quality Control Specification
Analytical Methods	*Method*	*QC*	*Regular*	***Actual***	***Expected***	*Evaluation*	
Matrix Spikes (MS) - Continued							
Total Metals by ICP-AES	EG005T	2	40	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH - Semivolatile Fraction	EP071	2	31	**6.45**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH Volatiles/BTEX	EP080	2	39	**5.13**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Volatile Organic Compounds	EP074	2	38	**5.26**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard

Brief Method Summaries

The analytical procedures used by the Environmental Division have been developed from established internationally recognized procedures such as those published by the US EPA, APHA, AS and NEPM. In house developed procedures are employed in the absence of documented standards or by client request. The following report provides brief descriptions of the analytical procedures employed for results reported in the Certificate of Analysis. Sources from which ALS methods have been developed are provided within the Method Descriptions.

Analytical Methods	Method	Matrix	Method Descriptions
Moisture Content	EA055	SOIL	In house: A gravimetric procedure based on weight loss over a 12 hour drying period at 105-110 degrees C. This method is compliant with NEPM (2013) Schedule B(3) Section 7.1 and Table 1 (14 day holding time).
Asbestos Identification in Soils	EA200	SOIL	AS 4964 - 2004 Method for the qualitative identification of asbestos in bulk samples Analysis by Polarised Light Microscopy including dispersion staining
Asbestos Classification and Quantitation per NEPM 2013	* EA200N	SOIL	Asbestos Classification and Quantitation per NEPM 2013 with Confirmation of Identification by AS 4964 - 2004 Gravimetric determination of Asbestos Containing Material, Fibrous Asbestos, Asbestos Fines and sample weight and calculation of percentage concentrations per NEPM protocols. Asbestos (Fines and Fibrous FA+AF) is reported as the equivalent weight in the sample received after accounting for sub-sampling (where applicable for the <7mm and/or <2mm fractions).
Total Metals by ICP-AES	EG005T	SOIL	In house: Referenced to APHA 3120; USEPA SW 846 - 6010. Metals are determined following an appropriate acid digestion of the soil. The ICPAES technique ionises samples in a plasma, emitting a characteristic spectrum based on metals present. Intensities at selected wavelengths are compared against those of matrix matched standards. This method is compliant with NEPM (2013) Schedule B(3)
Total Mercury by FIMS	EG035T	SOIL	In house: Referenced to AS 3550, APHA 3112 Hg - B (Flow-injection (SnCl2) (Cold Vapour generation) AAS) FIM-AAS is an automated flameless atomic absorption technique. Mercury in solids are determined following an appropriate acid digestion. Ionic mercury is reduced online to atomic mercury vapour by SnCl2 which is then purged into a heated quartz cell. Quantification is by comparing absorbance against a calibration curve. This method is compliant with NEPM (2013) Schedule B(3)
Polychlorinated Biphenyls (PCB)	EP066	SOIL	In house: Referenced to USEPA SW 846 - 8270D Extracts are analysed by Capillary GC/MS and quantification is by comparison against an established 5 point calibration curve. This method is compliant with NEPM (2013) Schedule B(3) (Method 504)
Pesticides by GCMS	EP068	SOIL	In house: Referenced to USEPA SW 846 - 8270D Extracts are analysed by Capillary GC/MS and quantification is by comparison against an established 5 point calibration curve. This technique is compliant with NEPM (2013) Schedule B(3) (Method 504,505)
TRH - Semivolatile Fraction	EP071	SOIL	In house: Referenced to USEPA SW 846 - 8015A Sample extracts are analysed by Capillary GC/FID and quantified against alkane standards over the range C10 - C40. Compliant with NEPM amended 2013.
Volatile Organic Compounds	EP074	SOIL	In house: Referenced to USEPA SW 846 - 8260B Extracts are analysed by Purge and Trap, Capillary GC/MS. Quantification is by comparison against an established 5 point calibration curve. This method is compliant with NEPM (2013) Schedule B(3) (Method 501)
Semivolatile Organic Compounds	EP075	SOIL	In house: Referenced to USEPA SW 846 - 8270D Extracts are analysed by Capillary GC/MS and quantification is by comparison against an established 5 point calibration curve. This technique is compliant with NEPM (2013) Schedule B(3) (Method 502)
TRH Volatiles/BTEX	EP080	SOIL	In house: Referenced to USEPA SW 846 - 8260B. Extracts are analysed by Purge and Trap, Capillary GC/MS. Quantification is by comparison against an established 5 point calibration curve. Compliant with NEPM amended 2013.

Analytical Methods	Method	Matrix	Method Descriptions
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	SOIL	In-House. A portion of soil is extracted with MTBE. The extract is taken to dryness, made up in mobile phase. Analysis is by LC/MSMS, ESI Negative Mode using MRM. Where commercially available, isotopically labelled analogues of the target analytes are used as internal standards for quantification. Where a labelled analogue is not commercially available, the internal standard with similar chemistry and the closest retention time to the target is used for quantification. The DQO for internal standard response is 50-150% of that established at initial calibration. PFOS is quantified using a certified, traceable standard consisting of linear and branched PFOS isomers. This method complies with the quality control definitions as stated in QSM 5.1. Data is reviewed in line with the DQOs as stated in QSM5.1

Preparation Methods	Method	Matrix	Method Descriptions
Hot Block Digest for metals in soils sediments and sludges	EN69	SOIL	In house: Referenced to USEPA 200.2. Hot Block Acid Digestion 1.0g of sample is heated with Nitric and Hydrochloric acids, then cooled. Peroxide is added and samples heated and cooled again before being filtered and bulked to volume for analysis. Digest is appropriate for determination of selected metals in sludge, sediments, and soils. This method is compliant with NEPM (2013) Schedule B(3) (Method 202)
Sample Extraction for PFAS	EP231-PR	SOIL	In house
Methanolic Extraction of Soils for Purge and Trap	ORG16	SOIL	In house: Referenced to USEPA SW 846 - 5030A. 5g of solid is shaken with surrogate and 10mL methanol prior to analysis by Purge and Trap - GC/MS.
Tumbler Extraction of Solids	ORG17	SOIL	In house: Mechanical agitation (tumbler). 10g of sample, Na2SO4 and surrogate are extracted with 30mL 1:1 DCM/Acetone by end over end tumble. The solvent is decanted, dehydrated and concentrated (by KD) to the desired volume for analysis.

Enviroleads

CHAIN OF CUSTODY

ALS Laboratory: please tick →

ADELAIDE: 21 Burma Road Pooraka SA 5095 Ph: 08 8359 0890 E: adelaide@alsglobal.com

BRISBANE: 32 Shand Street Stafford QLD 4053 Ph: 07 7251 7222 E: samples.brisbane@alsglobal.com

GLADSTONE: 46 Callemondah Drive Clinton QLD 4680 Ph: 07 4971 6800 E: gladstone@alsglobal.com

MACKAY: 78 Harbour Road Mackay QLD 4740 Ph: 07 4944 0177 E: mackay@alsglobal.com

MELBOURNE: 24 Westall Road Springvale VIC 3171 Ph: 03 8549 9600 E: samples.melbourne@alsglobal.com

MUDGEE: 27 Sydney Road Mudgee NSW 2850 Ph: 02 6372 6735 E: mudgee.mail@alsglobal.com

NEWCASTLE: 5/585 Maitland Rd Mayfield West NSW 2304 Ph: 02 4968 9500 E: samples.newcastle@alsglobal.com

NOWRA: 4/13 Geary Place North Nowra NSW 2541 Ph: 02 4423 2063 E: nowra@alsglobal.com

PERTH: 10 Hod Way Malaga WA 6090 Ph: 08 9209 7655 E: samples.perth@alsglobal.com

SYDNEY: Unit 1, 14-20 Woodpark Road Smithfield NSW 2164 Ph: 02 8784 8555 E: samples.sydney@alsglobal.com

TOWNSVILLE: 14-15 Desma Court Bohle QLD 4818 Ph: 07 4796 0600 E: townsville.environmental@alsglobal.com

WOLLONGONG: 99 Kenny Street Wollongong NSW 2500 Ph: 02 4225 3125 E: northernbla@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	TURNAROUND REQUIREMENTS : (Standard TAT may be longer for some tests e.g. Ultra Trace Organics)	☒ Standard TAT (List due date):	FOR LABORATORY USE ONLY (Circle)
OFFICE:		☐ Non Standard or urgent TAT (List due date):	Custody Seal Intact? Yes No N/A
PROJECT: King St North ESA	ALS QUOTE NO.:	COC SEQUENCE NUMBER (Circle)	Free ice / frozen ice bricks present upon receipt? Yes No N/A
ORDER NUMBER: 10026439		COC: 1 2 3 4 5 6 7	Random Sample Temperature on Receipt: °C
PROJECT MANAGER: Dean Stafford	CONTACT PH: 0434 657 155	OF: 1 2 3 4 5 6 7	Other comment: S-7
SAMPLER: Caitlain Regena	SAMPLER MOBILE: 0438 263 112		
COC emailed to ALS? (NO)	EDD FORMAT (or default):		
Email Reports to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com			
Email Invoice to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com			

RELINQUISHED BY:	RECEIVED BY:	RELINQUISHED BY:	RECEIVED BY:
Caitlain Regena			
DATE/TIME: 17/12/18	DATE/TIME: 17/12/18 1730	DATE/TIME:	DATE/TIME:

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)			CONTAINER INFORMATION		ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).								Additional Information
LAB ID	SAMPLE ID	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	TOTAL CONTAINERS	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Analytes)	BTEX			Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
1	DUP2		S		1									
2	TRIP2		S		1									
3	TB		S		1						x			
4	TS		S		1						x			
				TOTAL	4									

Subcon / Forward Lab / Split PO
Lab / Analysis: Asbestos - Newcastle
Organised By / Date: ES1838116
Relinquished By / Date:
Connote / Courier:
WO No: TB+TS, TRIP1 - Enviroleads
Attach By PO / Internal Sheet:

Environmental Division Sydney
Work Order Reference
ES1838116

Telephone : + 61-2-8784 8555

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Al.
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric ...
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

Idehyde Preserved Glass;

CHAIN OF CUSTODY

ALS Laboratory: please tick →

ADELAIDE 21 Burma Road Pooraka SA 5095 Ph: 08 8359 0890 E: adelaide@alsglobal.com

BRISBANE 32 Shand Street Stafford QLD 4053 Ph: 07 3243 7222 E: samples.brisbane@alsglobal.com

GLADSTONE 46 Callemondah Drive Clinton QLD 4680 Ph: 07 4971 6300 E: gladstone@alsglobal.com

MACKAY 78 Harbour Road Mackay QLD 4740 Ph: 07 4944 0177 E: mackay@alsglobal.com

MELBOURNE 24 Westall Road Springvale VIC 3171 Ph: 03 8549 9600 E: samples.melbourne@alsglobal.com

MUDGEE 27 Sydney Road Mudgee NSW 2850 Ph: 02 6372 6735 E: mudgee.mail@alsglobal.com

NEWCASTLE 5/585 Maitland Rd Mayfield West NSW 2304 Ph: 02 4014 2500 E: samples.newcastle@alsglobal.com

NOWRA 4/19 Bearry Place North Nowra NSW 2541 Ph: 02 4422 2063 E: nowra@alsglobal.com

PERTH 10 Hod Way Malaga WA 6090 Ph: 08 9209 7655 E: samples.perth@alsglobal.com

SYDNEY 277-289 Woodpark Road Smithfield NSW 2164 Ph: 02 8784 8555 E: samples.sydney@alsglobal.com

TOWNSVILLE 14-15 Desma Court Bohle QLD 4818 Ph: 07 4796 0600 E: townsville.environmental@alsglobal.com

WOLLONGONG 99 Kenny Street Wollongong NSW 2500 Ph: 02 4225 3125 E: portkembla@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	**TURNAROUND REQUIREMENTS :** (Standard TAT may be longer for some tests e.g., Ultra Trace Organics)	☒ Standard TAT (List due date):	**FOR LABORATORY USE ONLY (Circle)**
OFFICE:		☐ Non Standard or urgent TAT (List due date):	Custody Seal Intact? Yes No N/A
PROJECT: King St North ESA	**ALS QUOTE NO.:**	**COC SEQUENCE NUMBER (Circle)**	Free ice / frozen ice bricks present upon receipt? Yes No N/A
ORDER NUMBER: 10026439		COC: 1 2 3 4 5 6 7	Random Sample Temperature on Receipt: °C
PROJECT MANAGER: Dean Stafford	**CONTACT PH:** 0434 657 155	OF: 1 2 3 4 5 6 7	Other comment: S-7
SAMPLER: Caitlain Regena	**SAMPLER MOBILE:** 0438 263 112		
COC emailed to ALS? (NO)	**EDD FORMAT (or default):**		
Email Reports to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com			
Email Invoice to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com			

RELINQUISHED BY:	RECEIVED BY:	RELINQUISHED BY:	RECEIVED BY:
Caitlain Regena	Stacy Wyllie ALS		
DATE/TIME: 17/12/18	DATE/TIME: 17/12/18 1730	DATE/TIME:	DATE/TIME:

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)			CONTAINER INFORMATION		ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).								Additional Information
LAB ID	SAMPLE ID	DATE / TIME	MATRIX	TYPE & PRESERVATIVE *(refer to codes below)*	TOTAL CONTAINERS	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Analytes)				Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
5	BH03@2.00	12-12-18	S		1	x	x	x						
6	BH01@0.50	12-12-18	S		1	x	x	x	x					
7	BH01@1.00	12-12-18	S		1									
8	BH01@2.00	12-12-18	S		1	x	x	x						
9	DUP1	12-12-18	S		1	x	x	x						
-	TRIP1	12-12-18	S		1	x	x	x						Please send to ~~ALS~~ ENVIROLAB
10	BH02@1.00	12-12-18	S		1	x	x	x	x					
11	BH02@1.50	12-12-18	S		1									
12	BH02@2.50	12-12-18	S		1	x	x	x						
13	MW02@1.00	12-12-18	S		1	x	x	x	x					
14	MW02@3.00	12-12-18	S		1									
15	MW02@6.00	12-12-18	S		1	x	x	x						
				TOTAL	12									

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass;
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

CHAIN OF CUSTODY

ALS Laboratory: please tick →

ADELAIDE 21 Burma Road Pooraka SA 5095 Ph: 08 8359 0890 E: adelaide@alsglobal.com

BRISBANE 32 Shand Street Stafford QLD 4053 Ph: 07 3243 7222 E: samples.brisbane@alsglobal.com

GLADSTONE 46 Callemondah Drive Clinton QLD 4680 Ph: 07 4971 9600 E: gladstone@alsglobal.com

MACKAY 78 Harbour Road Mackay QLD 4740 Ph: 07 4944 0177 E: mackay@alsglobal.com

MELBOURNE 24 Woorinen Road Springvale VIC 3171 Ph: 03 8549 9600 E: samples.melbourne@alsglobal.com

MURARRIE 27 Sydney Road Brisbane NSW 2650 Ph: 02 6030 1778 E: murarrie.mail@alsglobal.com

NEWCASTLE 5/585 Maitland Rd Mayfield West NSW 2304 Ph: 02 4014 2500 E: samples.newcastle@alsglobal.com

NOWRA 4/15 Geary Place North Nowra NSW 2541 Ph: 02 4423 2063 E: nowra@alsglobal.com

PERTH 10 Hod Way Malaga WA 6090 Ph: 08 9209 7555 E: samples.perth@alsglobal.com

SYDNEY 277-289 Woodpark Road Smithfield NSW 2164 Ph: 02 8784 8555 E: samples.sydney@alsglobal.com

TOWNSVILLE 14-15 Desma Court Bohle QLD 4818 Ph: 07 4796 0600 E: townsville.environmental@alsglobal.com

WOLLONGONG 99 Kenny Street Wollongong NSW 2500 Ph: 02 4225 3125 E: canberra@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	TURNAROUND REQUIREMENTS : (Standard TAT may be longer for some tests e.g.. Ultra Trace Organics)	☒ Standard TAT (List due date):	FOR LABORATORY USE ONLY (Circle)
OFFICE:		☐ Non Standard or urgent TAT (List due date):	Custody Seal Intact? Yes No N/A
PROJECT: King St North ESA	ALS QUOTE NO.:	COC SEQUENCE NUMBER (Circle)	Free ice / frozen ice bricks present upon receipt? Yes No N/A
ORDER NUMBER: 10026439		COC: 1 2 3 4 5 6 7	Random Sample Temperature on Receipt: °C
PROJECT MANAGER: Dean Stafford	CONTACT PH: 0434 657 155	OF: 1 2 3 4 5 6 7	Other comment: S-7
SAMPLER: Caitlain Regena	SAMPLER MOBILE: 0438 263 112		
COC emailed to ALS? (NO)	EDD FORMAT (or default):		
Email Reports to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com			
Email Invoice to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com			

RELINQUISHED BY:	RECEIVED BY:	RELINQUISHED BY:	RECEIVED BY:
Caitlain Regena			
DATE/TIME: 17/12/18	DATE/TIME: 17/12/18 1730	DATE/TIME:	DATE/TIME:

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)			CONTAINER INFORMATION		ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).								Additional Information
LAB ID	SAMPLE ID	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	TOTAL CONTAINERS	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Analytes)				Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
16	BH06@0.50	14-12-18	S		2	x	x	x	x	x				
17	BH06@1.50	14-12-18	S		1									
18	BH06@2.40	14-12-18	S		1	x	x	x						
19	BH08@0.30	14-12-18	S		1									
20	BH08@1.00	14-12-18	S		2	x	x	x	x					
21	BH08@3.00	14-12-18	S		1	x	x	x						
22	MW06@0.50	13-12-18	S		1									
23	MW06@1.50	13-12-18	S		1	x	x	x	x					
24	MW06@3.00	13-12-18	S		1									
25	MW06@4.50	13-12-18	S		2	x	x	x		x				
26	MW06@6.00	13-12-18	S		1									
27	BH15@0.30	13-12-18	S		1									
				TOTAL	15									

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass;
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

CHAIN OF CUSTODY

ALS Laboratory: please tick →

ADELAIDE: 21 Burma Road Pooraka SA 5095 Ph: 08 8359 0890 E: adelaide@alsglobal.com

BRISBANE: 32 Shand Street Stafford QLD 4053 Ph: 07 3243 7222 E: samples.brisbane@alsglobal.com

GLADSTONE: 46 Callemondah Drive Clinton QLD 4680 Ph: 07 7471 5600 E: gladstone@alsglobal.com

MACKAY: 78 Harbour Road Mackay QLD 4740 Ph: 07 4944 0177 E: mackay@alsglobal.com

MELBOURNE: 3-4 Westall Road Springvale VIC 3171 Ph: 03 8549 9600 E: samples.melbourne@alsglobal.com

MUDGEE: 27 Sydney Road Mudgee NSW 2850 Ph: 02 6372 6735 E: mudgee.mail@alsglobal.com

NEWCASTLE: 5/585 Maitland Rd Mayfield West NSW 2304 Ph: 02 4014 2500 E: samples.newcastle@alsglobal.com

NOWRA: 4/19 Geary Place North Nowra NSW 2541 Ph: 02 4423 2063 E: nowra@alsglobal.com

PERTH: 10 Hod Way Malaga WA 6090 Ph: 08 9209 7655 E: samples.perth@alsglobal.com

SYDNEY: 277-289 Woodpark Road Smithfield NSW 2164 Ph: 02 8784 8555 E: samples.sydney@alsglobal.com

TOWNSVILLE: 14-15 Desma Court Bohle QLD 4818 Ph: 07 4796 0600 E: townsville.environmental@alsglobal.com

WOLLONGONG: 99 Kenny Street Wollongong NSW 2500 Ph: 02 4225 3125 E: portkembla@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	**TURNAROUND REQUIREMENTS :** (Standard TAT may be longer for some tests e.g. Ultra Trace Organics)	☒ Standard TAT (List due date):	**FOR LABORATORY USE ONLY (Circle)**
OFFICE:		☐ Non Standard or urgent TAT (List due date):	Custody Seal Intact? Yes / No / N/A
PROJECT: King St North ESA	**ALS QUOTE NO.:**	**COC SEQUENCE NUMBER (Circle)**	Free ice / frozen ice bricks present upon receipt? Yes / No / N/A
ORDER NUMBER: 10026439		COC: 1 2 3 4 5 6 7	Random Sample Temperature on Receipt: °C
PROJECT MANAGER: Dean Stafford	**CONTACT PH:** 0434 657 155	OF: 1 2 3 4 5 6 7	Other comment: S7
SAMPLER: Caitlain Regena	**SAMPLER MOBILE:** 0438 263 112		
COC emailed to ALS? (NO)	**EDD FORMAT (or default):**		
Email Reports to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com			
Email Invoice to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com			

RELINQUISHED BY:	RECEIVED BY:	RELINQUISHED BY:	RECEIVED BY:
Caitlain Regena	Bayly Lo AS		
DATE/TIME: 17/12/18	DATE/TIME: 17/12/18 1730	DATE/TIME:	DATE/TIME:

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)			CONTAINER INFORMATION		ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).								Additional Information
LAB ID	SAMPLE ID	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	TOTAL CONTAINERS	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Analytes)				Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
28	BH15@1.50	13-12-18	S		1	x	x	x	x					
29	BH15@3.00	13-12-18	S		1									
30	BH12@0.30	13-12-18	S		1									
31	BH12@1.00	13-12-18	S		1	x	x	x	x					
32	BH12@2.00	13-12-18	S		1									
33	BH12@3.00	13-12-18	S		1									
34	BH24@0.30	13-12-18	S		1									
35	BH24@1.50	13-12-18	S		1	x	x	x	x					
36	BH24@3.00	13-12-18	S		1									
37	BH24@4.50	13-12-18	S		1	x	x	x						
38	BH19@0.40	13-12-18	S		2	x	x	x	x	x				
39	BH19@1.00	13-12-18	S		1									
				TOTAL	13									

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass;
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

CHAIN OF CUSTODY

ALS Laboratory: please tick →

ADELAIDE 21 Burma Road Pooraka SA 5095 Ph: 08 8359 0890 E: adelaide@alsglobal.com

BRISBANE 32 Shand Street Stafford QLD 4053 Ph: 07 3243 7222 E: samples.brisbane@alsglobal.com

GLADSTONE 46 Callemondah Drive Clinton QLD 4680 Ph: 07 7471 5630 E: gladstone@alsglobal.com

MACKAY 78 Harbour Road Mackay QLD 4740 Ph: 07 4944 0177 E: mackay@alsglobal.com

MELBOURNE 3-4 Westall Road Springvale VIC 3171 Ph: 03 8549 9600 E: samples.melbourne@alsglobal.com

MUDGEE 27 Evelyn Road Mudgee NSW 2850 Ph: 02 6372 6735 E: mudgee.mail@alsglobal.com

NEWCASTLE 5/585 Maitland Rd Mayfield West NSW 2304 Ph: 02 4014 2500 E: samples.newcastle@alsglobal.com

NOWRA 4/10 Geary Place North Nowra NSW 2541 Ph: 02 4422 2505 E: nowra@alsglobal.com

PERTH 10 Hod Way Malaga WA 6090 Ph: 08 9209 7655 E: samples.perth@alsglobal.com

SYDNEY 277-289 Woodpark Road Smithfield NSW 2164 Ph: 02 8784 8555 E: samples.sydney@alsglobal.com

TOWNSVILLE 14-15 Desma Court Bohle QLD 4818 Ph: 07 4796 0600 E: townsville.environmental@alsglobal.com

WOLLONGONG 99 Kenny Street Wollongong NSW 2500 Ph: 02 4225 3125 E: portkembla@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	TURNAROUND REQUIREMENTS : (Standard TAT may be longer for some tests e.g.. Ultra Trace Organics)	☒ Standard TAT (List due date):	FOR LABORATORY USE ONLY (Circle)
OFFICE:		☐ Non Standard or urgent TAT (List due date):	Custody Seal Intact? Yes No N/A
PROJECT: King St North ESA	ALS QUOTE NO.:	COC SEQUENCE NUMBER (Circle)	Free ice / frozen ice bricks present upon receipt? Yes No N/A
ORDER NUMBER: 10026439		COC: 1 2 3 4 5 6 7	Random Sample Temperature on Receipt: °C
PROJECT MANAGER: Dean Stafford	CONTACT PH: 0434 657 155	OF: 1 2 3 4 5 6 7	Other comment: S-7
SAMPLER: Caitlain Regena	SAMPLER MOBILE: 0438 263 112	RELINQUISHED BY:	RECEIVED BY:
COC emailed to ALS? (NO)	EDD FORMAT (or default):	*Caitlain Regena*	
Email Reports to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com		DATE/TIME: 17/12/18	DATE/TIME: 17/12/18 1730
Email Invoice to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com		RELINQUISHED BY:	RECEIVED BY:
COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:		DATE/TIME:	DATE/TIME:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)			CONTAINER INFORMATION		ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).								Additional Information
LAB ID	SAMPLE ID	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	TOTAL CONTAINERS	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Analytes)				Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
40	BH16@0.50	14-12-18	S		1	x	x	x	x					
41	BH16@1.50	14-12-18	S		1									
42	BH16@2.50	14-12-18	S		1									
43	BH16@3.00	14-12-18	S		1	x	x	x						
44	BH18@0.20	14-12-18	S		1									
45	BH18@1.00	14-12-18	S		1	x	x	x	x					
46	BH18@2.00	14-12-18	S		1									
47	BH18@3.00	14-12-18	S		1	x	x	x						
48	BH17@0.30	14-12-18	S		1									
49	BH17@1.50	14-12-18	S		1	x	x	x	x					
50	BH17@2.60	14-12-18	S		1									
51	BH17@3.00	14-12-18	S		1									
				TOTAL	12									

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass;
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

CHAIN OF CUSTODY

ALS Laboratory: please tick →

☐ADELAIDE 21 Burma Road Pooraka SA 5095 Ph: 08 8359 0890 E: adelaide@alsglobal.com

☐BRISBANE 32 Shand Street Stafford QLD 4053 Ph: 07 3243 7222 E: samples.brisbane@alsglobal.com

☐GLADSTONE 46 Callemondah Drive Clinton QLD 4680 Ph: 07 7471 5600 E: gladstone@alsglobal.com

☐MACKAY 78 Harbour Road Mackay QLD 4740 Ph: 07 4944 0177 E: mackay@alsglobal.com

☐MELBOURNE 2-4 Westall Road Springvale VIC 3171 Ph: 03 8549 9600 E: samples.melbourne@alsglobal.com

☐MUDGEE 27 Sydney Road Mudgee NSW 2850 Ph: 02 6372 6735 E: mudgee.mail@alsglobal.com

☐NEWCASTLE 5/585 Maitland Rd Mayfield West NSW 2304 Ph: 02 4014 2500 E: samples.newcastle@alsglobal.com

☐NOWRA 4/13 Geary Place North Nowra NSW 2541 Ph: 024423 2063 E: nowra@alsglobal.com

☐PERTH 10 Hod Way Malaga WA 6090 Ph: 08 9209 7655 E: samples.perth@alsglobal.com

☐SYDNEY 277-289 Woodpark Road Smithfield NSW 2164 Ph: 02 8784 8555 E: samples.sydney@alsglobal.com

☐TOWNSVILLE 14-15 Desma Court Bohle QLD 4818 Ph: 07 4796 0600 E: townsville.environmental@alsglobal.com

☐WOLLONGONG 99 Kenny Street Wollongong NSW 2500 Ph: 02 4225 3125 E: portkembla@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	**TURNAROUND REQUIREMENTS :** (Standard TAT may be longer for some tests e.g.. Ultra Trace Organics)	☒ Standard TAT **(List due date):** ☐ Non Standard or urgent TAT **(List due date):**
OFFICE: Level 16, 680 George Street Sydney NSW 2000		
PROJECT: King St North ESA	**ALS QUOTE NO.:**	
ORDER NUMBER: 10026439		
PROJECT MANAGER: Dean Stafford	**CONTACT PH:** 0434 657 155	
SAMPLER: Caitlain Regena	**SAMPLER MOBILE:** 0438 263 112	
COC emailed to ALS? (NO)	**EDD FORMAT (or default):**	
Email Reports to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com		
Email Invoice to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com		

COC SEQUENCE NUMBER (Circle)

COC: 1 2 3 4 5 6 7

OF: 1 2 3 4 5 6 7

FOR LABORATORY USE ONLY (Circle)

Custody Seal Intact?	Yes	No	N/A
Free ice / frozen ice bricks present upon receipt?	Yes	No	N/A
Random Sample Temperature on Receipt:		°C	
Other comments:	S7		

RELINQUISHED BY:	RECEIVED BY:	RELINQUISHED BY:	RECEIVED BY:
Caitlain Regena	Sarah Lee AA		
DATE/TIME: 17/12/18	DATE/TIME: 17/12/18 1730	DATE/TIME:	DATE/TIME:

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)			CONTAINER INFORMATION	ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).								Additional Information
LAB ID	SAMPLE ID	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	TOTAL CONTAINERS	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Analytes)			Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
52	BH10@.020	14-12-18	S		1	x	x	x	x				
53	BH10@1.50	14-12-18	S		1								
54	BH10@3.00	14-12-18	S		1								
55	BH10@4.00	14-12-18	S		1	x	x	x					
56	BH09@0.30	14-12-18	S		1								
57	BH09@1.50	14-12-18	S		1	x	x	x	x				
58	BH09@2.50	14-12-18	S		1								
59	BH09@3.00	14-12-18	S		1	x	x	x					
60	BH11@1.00	14-12-18	S		1	x	x	x	x				
61	BH11@3.00	14-12-18	S		2	x	x	x		x			
				TOTAL	11								

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass;
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

CHAIN OF CUSTODY

ALS Laboratory: please tick →

☐ADELAIDE 21 Burma Road Pooraka SA 5095 Ph: 08 8359 0890 E: adelaide@alsglobal.com

☐BRISBANE 32 Shand Street Stafford QLD 4053 Ph: 07 3243 7222 E: samples.brisbane@alsglobal.com

☐GLADSTONE 46 Callemondah Drive Clinton QLD 4680 Ph: 07 7471 5600 E: gladstone@alsglobal.com

☐MACKAY 78 Harbour Road Mackay QLD 4740 Ph: 07 4944 0177 E: mackay@alsglobal.com

☐MELBOURNE 2-4 Westall Road Springvale VIC 3171 Ph: 03 8549 9600 E: samples.melbourne@alsglobal.com

☐MUDGEE 27 Sydney Road Mudgee NSW 2850 Ph: 02 6372 6735 E: mudgee.mail@alsglobal.com

☐NEWCASTLE 5/585 Maitland Rd Mayfield West NSW 2304 Ph: 02 4014 2500 E: samples.newcastle@alsglobal.com

☐NOWRA 4/13 Geary Place North Nowra NSW 2541 Ph: 024423 2063 E: nowra@alsglobal.com

☐PERTH 10 Hod Way Malaga WA 6090 Ph: 08 9209 7655 E: samples.perth@alsglobal.com

☐SYDNEY 277-289 Woodpark Road Smithfield NSW 2164 Ph: 02 8784 8555 E: samples.sydney@alsglobal.com

☐TOWNSVILLE 14-15 Desma Court Bohle QLD 4818 Ph: 07 4796 0600 E: townsville environmental@alsglobal.com

☐WOLLONGONG 99 Kenny Street Wollongong NSW 2500 Ph: 02 4225 3125 E: portkembla@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	**TURNAROUND REQUIREMENTS :** (Standard TAT may be longer for some tests e.g. Ultra Trace Organics)	☒ Standard TAT (List due date): ☐ Non Standard or urgent TAT (List due date):
OFFICE: [illegible]		
PROJECT: King St North ESA	**ALS QUOTE NO.:**	
ORDER NUMBER: 10026439		
PROJECT MANAGER: Dean Stafford	**CONTACT PH:** 0434 657 155	
SAMPLER: Caitlain Regena	**SAMPLER MOBILE:** 0438 263 112	
COC emailed to ALS? (NO)	**EDD FORMAT (or default):**	
Email Reports to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com		
Email Invoice to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com		

COC SEQUENCE NUMBER (Circle)

COC: 1 2 3 4 5 6 7

OF: 1 2 3 4 5 6 7

FOR LABORATORY USE ONLY (Circle)

Custody Seal Intact? Yes No N/A

Free ice / Frozen ice bricks present upon receipt? Yes No N/A

Random Sample Temperature on Receipt: °C

Other comment: S2

RELINQUISHED BY:	RECEIVED BY:	RELINQUISHED BY:	RECEIVED BY:
Caitlain Regena	Sonya Hyun ALS		
DATE/TIME: 17/12/18	DATE/TIME: 17/12/18 1730	DATE/TIME:	DATE/TIME:

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)			CONTAINER INFORMATION		ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).								Additional Information
LAB ID	SAMPLE ID	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	TOTAL CONTAINERS	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Analytes)				Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
	BH19@2.00	13-12-18	S		1									
	BH19@3.00	13-12-18	S		1									
	BH19@4.00	13-12-18	S		1	x	x	x						
	BH27@0.50	13-12-18	S		1	x	x	x	x					
	BH27@1.50	13-12-18	S		1									
	BH27@3.00	13-12-18	S		1									
	BH28@0.50	13-12-18	S		1	x	x	x	x					
	BH28@1.50	13-12-18	S		1									
	BH28@3.00	13-12-18	S		2	x	x	x		x				
	BH26@0.20	13-12-18	S		1									
	BH26@1.00	13-12-18	S		1	x	x	x	x					
	BH26@3.00	13-12-18	S		1	x	x	x						
				TOTAL	13									

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass;
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

CHAIN OF CUSTODY

ALS Laboratory: please tick →

☐ADELAIDE 21 Burma Road Pooraka SA 5095 Ph: 08 8359 0890 E: adelaide@alsglobal.com

☐BRISBANE 32 Shand Street Stafford QLD 4053 Ph: 07 3243 7222 E: samples.brisbane@alsglobal.com

☐GLADSTONE 46 Callemondah Drive Clinton QLD 4680 Ph: 07 7471 5600 E: gladstone@alsglobal.com

☐MACKAY 78 Harbour Road Mackay QLD 4740 Ph: 07 4944 0177 E: mackay@alsglobal.com

☐MELBOURNE 2-4 Westall Road Springvale VIC 3171 Ph: 03 8549 9600 E: samples.melbourne@alsglobal.com

☐MUDGEE 27 Sydney Road Mudgee NSW 2850 Ph: 02 6372 6735 E: mudgee.mail@alsglobal.com

☐NEWCASTLE 5/585 Maitland Rd Mayfield West NSW 2304 Ph: 02 4014 2500 E: samples.newcastle@alsglobal.com

☐NOWRA 4/13 Geary Place North Nowra NSW 2541 Ph: 024423 2063 E: nowra@alsglobal.com

☐PERTH 10 Hod Way Malaga WA 6090 Ph: 08 9209 7655 E: samples.perth@alsglobal.com

☐SYDNEY 277-289 Woodpark Road Smithfield NSW 2164 Ph: 02 8784 8555 E: samples.sydney@alsglobal.com

☐TOWNSVILLE 14-15 Desma Court Bohle QLD 4818 Ph: 07 4796 0600 E: townsville.environmental@alsglobal.com

☐WOLLONGONG 99 Kenny Street Wollongong NSW 2500 Ph: 02 4225 3125 E: portkembla@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	**TURNAROUND REQUIREMENTS :** (Standard TAT may be longer for some tests e.g. Ultra Trace Organics)	☒ Standard TAT (List due date): ☐ Non Standard or urgent TAT (List due date):
OFFICE: Level 16, 580 George Street Sydney NSW 2000		
PROJECT: King St North ESA	**ALS QUOTE NO.:**	
ORDER NUMBER: 10026439		
PROJECT MANAGER: Dean Stafford	**CONTACT PH:** 0434 657 155	
SAMPLER: Caitlain Regena	**SAMPLER MOBILE:** 0438 263 112	
COC emailed to ALS? (NO)	**EDD FORMAT** (or default):	
Email Reports to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com		
Email Invoice to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com		

COC SEQUENCE NUMBER (Circle)

COC: 1 2 3 4 5 6 7

OF: 1 2 3 4 5 6 7

FOR LABORATORY USE ONLY (Circle)

Custody Seal Intact? Yes No N/A

Free ice / frozen ice bricks present upon receipt? Yes No N/A

Random Sample Temperature on Receipt: °C

Other comment:

RELINQUISHED BY:	RECEIVED BY:	RELINQUISHED BY:	RECEIVED BY:
Caitlain Regena	Sam Stafford ALS		
DATE/TIME: 17/12/18	DATE/TIME: 17/12/18 1730	DATE/TIME:	DATE/TIME:

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)			CONTAINER INFORMATION		ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).								Additional Information
LAB ID	SAMPLE ID	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	TOTAL CONTAINERS	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Analytes)				Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
	BH13@0.20	14-12-18	S		1									
	BH13@1.50	14-12-18	S		1	x	x	x	x					
	BH13@2.50	14-12-18	S		1									
	BH14@0.80	14-12-18	S		2	x	x	x	x	x				
	BH14@1.50	14-12-18	S		1									
	BH14@2.00	14-12-18	S		1	x	x	x						
	BH21@1.00	14-12-18	S		1	x	x	x	x					
	BH21@3.00	14-12-18	S		1	x	x	x						
	BH07@0.20	14-12-18	S		1	x	x	x	x					
	BH07@1.50	14-12-18	S		1									
	BH07@2.00	14-12-18	S		1									
	BH07@3.00	14-12-18	S		1									
				TOTAL	13									

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass;
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

CHAIN OF CUSTODY

ALS Laboratory: please tick →

☐ADELAIDE 21 Burma Road Pooraka SA 5095 Ph: 08 8359 0890 E: adelaide@alsglobal.com

☐BRISBANE 32 Shand Street Stafford QLD 4053 Ph: 07 3243 7222 E: samples.brisbane@alsglobal.com

☐GLADSTONE 46 Callemondah Drive Clinton QLD 4680 Ph: 07 7471 5600 E: gladstone@alsglobal.com

☐MACKAY 78 Harbour Road Mackay QLD 4740 Ph: 07 4944 0177 E: mackay@alsglobal.com

☐MELBOURNE 2-4 Westall Road Springvale VIC 3171 Ph: 03 8549 9600 E: samples.melbourne@alsglobal.com

☐MUDGEE 27 Sydney Road Mudgee NSW 2850 Ph: 02 6372 6735 E: mudgee.mail@alsglobal.com

☐NEWCASTLE 5/585 Maitland Rd Mayfield West NSW 2304 Ph: 02 4014 2500 E: samples.newcastle@alsglobal.com

☐NOWRA 4/13 Geary Place North Nowra NSW 2541 Ph: 024423 2063 E: nowra@alsglobal.com

☐PERTH 10 Hod Way Malaga WA 6090 Ph: 08 9209 7655 E: samples.perth@alsglobal.com

☐SYDNEY 277-289 Woodpark Road Smithfield NSW 2164 Ph: 02 8784 8555 E: samples.sydney@alsglobal.com

☐TOWNSVILLE 14-15 Desma Court Bohle QLD 4818 Ph: 07 4796 0600 E: townsville.environmental@alsglobal.com

☐WOLLONGONG 99 Kenny Street Wollongong NSW 2500 Ph: 02 4225 3125 E: portkembla@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	**TURNAROUND REQUIREMENTS :** (Standard TAT may be longer for some tests e.g. Ultra Trace Organics)	☒ Standard TAT **(List due date):**	**FOR LABORATORY USE ONLY (Circle)**
OFFICE:		☐ Non Standard or urgent TAT **(List due date):**	Custody Seal Intact? Yes / No / N/A
PROJECT: King St North ESA	**ALS QUOTE NO.:**	**COC SEQUENCE NUMBER (Circle)**	Free Ice / frozen ice bricks present upon receipt? Yes / No / N/A
ORDER NUMBER: 10026439		COC: 1 2 3 4 5 6 7	Random Sample Temperature on Receipt: °C
PROJECT MANAGER: Dean Stafford	**CONTACT PH:** 0434 657 155	OF: 1 2 3 4 5 6 7	Other comment: S7
SAMPLER: Caitlain Regena	**SAMPLER MOBILE:** 0438 263 112		
COC emailed to ALS? (NO)	**EDD FORMAT (or default):**		
Email Reports to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com			
Email Invoice to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com			

RELINQUISHED BY:	**RECEIVED BY:**	**RELINQUISHED BY:**	**RECEIVED BY:**
Caitlain Regena	Sophie ALS		
DATE/TIME: 17/12/18	DATE/TIME: 17/12/18 1730	DATE/TIME:	DATE/TIME:

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)			CONTAINER INFORMATION		ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).								Additional Information
LAB ID	SAMPLE ID	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	TOTAL CONTAINERS	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Analytes)				Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
	BH23@0.15	13-12-18	S		1									
	BH23@1.00	13-12-18	S		1	x	x	x	x					
	BH23@2.00	13-12-18	S		2					x				
	BH23@3.00	13-12-18	S		1	x	x	x						
	BH25@1.00	12-12-18	S		1	x	x	x	x					
	BH25@2.00	12-12-18	S		1									
	BH22@1.00	12-12-18	S		1	x	x	x	x					
	BH22@2.00	12-12-18	S		1									
	BH22@3.00	12-12-18	S		1									
	BH03@0.50	12-12-18	S		1									
	BH03@1.00	12-12-18	S		1	x	x	x	x					
	BH03@1.50	12-12-18	S		1									
				TOTAL	13									

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass;
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

CHAIN OF CUSTODY

ALS Laboratory: please tick →

☐ADELAIDE 21 Burma Road Pooraka SA 5095 Ph: 08 8359 0890 E: adelaide@alsglobal.com

☐BRISBANE 32 Shand Street Stafford QLD 4053 Ph: 07 3243 7222 E: samples.brisbane@alsglobal.com

☐GLADSTONE 46 Callemondah Drive Clinton QLD 4680 Ph: 07 7471 5600 E: gladstone@alsglobal.com

☐MACKAY 78 Harbour Road Mackay QLD 4740 Ph: 07 4944 0177 E: mackay@alsglobal.com

☐MELBOURNE 2-4 Westall Road Springvale VIC 3171 Ph: 03 8549 9600 E: samples.melbourne@alsglobal.com

☐MUDGEE 27 Sydney Road Mudgee NSW 2850 Ph: 02 6372 6735 E: mudgee.mail@alsglobal.com

☐NEWCASTLE 5/585 Maitland Rd Mayfield West NSW 2304 Ph: 02 4014 2500 E: samples.newcastle@alsglobal.com

☐NOWRA 4/13 Geary Place North Nowra NSW 2541 Ph: 024423 2063 E: nowra@alsglobal.com

☐PERTH 10 Hod Way Malaga WA 6090 Ph: 08 9209 7655 E: samples.perth@alsglobal.com

☐SYDNEY 277-289 Woodpark Road Smithfield NSW 2164 Ph: 02 8784 8555 E: samples.sydney@alsglobal.com

☐TOWNSVILLE 14-15 Desma Court Bohle QLD 4818 Ph: 07 4796 0600 E: townsville.environmental@alsglobal.com

☐WOLLONGONG 99 Kenny Street Wollongong NSW 2500 Ph: 02 4225 3125 E: portkembla@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	**TURNAROUND REQUIREMENTS :** (Standard TAT may be longer for some tests e.g. Ultra Trace Organics)	☒ Standard TAT **(List due date):**	**FOR LABORATORY USE ONLY (Circle)**
OFFICE: Level 16, 580 George Street, Sydney, NSW 2000		☐ Non Standard or urgent TAT **(List due date):**	Custody Seal Intact? Yes / No / N/A
PROJECT: King St North ESA	**ALS QUOTE NO.:**	**COC SEQUENCE NUMBER (Circle)**	Free Ice / frozen ice bricks present upon receipt? Yes / No / N/A
ORDER NUMBER: 10026439		COC: 1 2 3 4 5 6 7	Random Sample Temperature on Receipt: °C
PROJECT MANAGER: Dean Stafford	**CONTACT PH:** 0434 657 155	OF: 1 2 3 4 5 6 7	Other comment: S-7
SAMPLER: Caitlain Regena	**SAMPLER MOBILE:** 0438 263 112	**RELINQUISHED BY:**	**RECEIVED BY:**
COC emailed to ALS? (NO)	**EDD FORMAT (or default):**	*Caitlain Regena*	Sonya Stafford ALS
Email Reports to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com		DATE/TIME: 17/12/18	DATE/TIME: 17/12/18 1730
Email Invoice to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com		**RELINQUISHED BY:**	**RECEIVED BY:**
COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:		DATE/TIME:	DATE/TIME:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)			CONTAINER INFORMATION		ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).								Additional Information
	SAMPLE ID	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	TOTAL CONTAINERS	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Analytes)				Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
	BH05@0.30	12-12-18	S		1									
	BH05@1.00	12-12-18	S		1	x	x	x	x					
	BH05@2.00	12-12-18	S		1									
	BH05@3.00	12-12-18	S		1									
	BH04@0.20	12-12-18	S		1	x	x	x	x					
	BH04@1.00	12-12-18	S		1									
	BH04@3.00	12-12-18	S		1									
	MW01@0.20	12-12-18	S		1									
	MW01@1.00	12-12-18	S		2	x	x	x	x	x				
	MW01@2.00	12-12-18	S		1									
	MW01@4.00	12-12-18	S		1	x	x	x						
		12-12-18	S		1									
				TOTAL	13									

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass;
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

ALS Environmental

CERTIFICATE OF ANALYSIS

Work Order	: **ES1838118**	Page	: 1 of 58
Client	: **ARCADIS AUSTRALIA PACIFIC PTY LTD**	Laboratory	: Environmental Division Sydney
Contact	: MR DEAN STAFFORD	Contact	: Loren Schiavon
Address	: L16, 480 GEORGE STREET SYDNEY NSW 2000	Address	: 277-289 Woodpark Road Smithfield NSW Australia 2164
Telephone	: 02 9690 2555	Telephone	: +61 2 8784 8555
Project	: King St North ESA	Date Samples Received	: 17-Dec-2018 17:30
Order number	: 10026439	Date Analysis Commenced	: 20-Dec-2018
C-O-C number	: ----	Issue Date	: 07-Jan-2019 13:54
Sampler	: CAITLAIN REGENA		
Site	: ----		
Quote number	: EN/091/17 (Primary Work only)		
No. of samples received	: 47		
No. of samples analysed	: 22		

ilac-MRA NATA
Accreditation No. 825
Accredited for compliance with ISO/IEC 17025 - Testing

This report supersedes any previous report(s) with this reference. Results apply to the sample(s) as submitted. This document shall not be reproduced, except in full.

This Certificate of Analysis contains the following information:

- General Comments
- Analytical Results
- Descriptive Results
- Surrogate Control Limits

Additional information pertinent to this report will be found in the following separate attachments: Quality Control Report, QA/QC Compliance Assessment to assist with Quality Review and Sample Receipt Notification.

Signatories

This document has been electronically signed by the authorized signatories below. Electronic signing is carried out in compliance with procedures specified in 21 CFR Part 11.

Signatories	*Position*	*Accreditation Category*
Alana Smylie	Asbestos Identifier	Newcastle - Asbestos, Mayfield West, NSW
Alex Rossi	Organic Chemist	Sydney Organics, Smithfield, NSW
Celine Conceicao	Senior Spectroscopist	Sydney Inorganics, Smithfield, NSW
Edwandy Fadjar	Organic Coordinator	Sydney Inorganics, Smithfield, NSW
Edwandy Fadjar	Organic Coordinator	Sydney Organics, Smithfield, NSW
Ivan Taylor	Analyst	Sydney Inorganics, Smithfield, NSW

General Comments

The analytical procedures used by the Environmental Division have been developed from established internationally recognized procedures such as those published by the USEPA, APHA, AS and NEPM. In house developed procedures are employed in the absence of documented standards or by client request.

Where moisture determination has been performed, results are reported on a dry weight basis.

Where a reported less than (<) result is higher than the LOR, this may be due to primary sample extract/digestate dilution and/or insufficient sample for analysis.

Where the LOR of a reported result differs from standard LOR, this may be due to high moisture content, insufficient sample (reduced weight employed) or matrix interference.

When sampling time information is not provided by the client, sampling dates are shown without a time component. In these instances, the time component has been assumed by the laboratory for processing purposes.

Where a result is required to meet compliance limits the associated uncertainty must be considered. Refer to the ALS Contact for details.

Key : CAS Number = CAS registry number from database maintained by Chemical Abstracts Services. The Chemical Abstracts Service is a division of the American Chemical Society.
LOR = Limit of reporting
^ = This result is computed from individual analyte detections at or above the level of reporting
ø = ALS is not NATA accredited for these tests.
~ = Indicates an estimated value.

- EG005: Poor precision was obtained for Zinc on sample ES1838118-3. Results have been confirmed by re-extraction and re-analysis.
- EP074/EP080: Surrogate recovery bias low for sample ES1838818-14 due for sample matrix interferences, confirmed by re-extraction and re-analysis.
- EP075: 'Sum of PAH' is the sum of the USEPA 16 priority PAHs
- EA200N: Asbestos weights and percentages are not covered under the Scope of NATA Accreditation.
  Weights of Asbestos are based on extracted bulk asbestos, fibre bundles, and/or ACM and do not include respirable fibres (if present)
  The Asbestos (Fines and Fibrous) weight is calculated from the extracted Fibrous Asbestos and Asbestos Fines as an equivalent weight of 100% Asbestos
  Percentages for Asbestos content in ACM are based on the 2013 NEPM default values.
  All calculations of percentage Asbestos under this method are approximate and should be used as a guide only.
- EA200 'Am' Amosite (brown asbestos)
- EA200 'Cr' Crocidolite (blue asbestos)
- EA200 'Trace' - Asbestos fibres ("Free Fibres") detected by trace analysis per AS4964. The result can be interpreted that the sample contains detectable 'respirable' asbestos fibres
- EA200: Asbestos Identification Samples were analysed by Polarised Light Microscopy including dispersion staining.
- EA200 Legend
- EA200 'Ch' Chrysotile (white asbestos)
- EA200: 'UMF' Unknown Mineral Fibres. "-" indicates fibres detected may or may not be asbestos fibres. Confirmation by alternative techniques is recommended.
- EA200: Negative results for vinyl tiles should be confirmed by an independent analytical technique.
- EA200N: ALS laboratory procedures and methods used for the identification and quantitation of asbestos are consistent with AS4964-2004 and the requirements of the 2013 NEPM for Assessment of Site Contamination
- Benzo(a)pyrene Toxicity Equivalent Quotient (TEQ) is the sum total of the concentration of the eight carcinogenic PAHs multiplied by their Toxicity Equivalence Factor (TEF) relative to Benzo(a)pyrene. TEF values are provided in brackets as follows: Benz(a)anthracene (0.1), Chrysene (0.01), Benzo(b+j) & Benzo(k)fluoranthene (0.1), Benzo(a)pyrene (1.0), Indeno(1.2.3.cd)pyrene (0.1), Dibenz(a.h)anthracene (1.0), Benzo(g.h.i)perylene (0.01). Less than LOR results for 'TEQ Zero' are treated as zero, for 'TEQ 1/2LOR' are treated as half the reported LOR, and for 'TEQ LOR' are treated as being equal to the reported LOR.
  Note: TEQ 1/2LOR and TEQ LOR will calculate as 0.6mg/Kg and 1.2mg/Kg respectively for samples with non-detects for all of the eight TEQ PAHs.
- EA200: For samples larger than 30g, the <2mm fraction may be sub-sampled prior to trace analysis as outlined in ISO23909:2008(E) Sect 6.3.2-2
- EA200: 'Yes' - Asbestos detected by polarised light microscopy including dispersion staining.
- EA200: 'No*' - No asbestos found, at the reporting limit of 0.1g/kg, by polarised light microscopy including dispersion staining. Asbestos material was detected and positively identified at concentrations estimated to be below 0.1g/kg.
- EA200: 'No' - No asbestos found at the reporting limit 0.1g/kg, by polarised light microscopy including dispersion staining.

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH19@4.00	BH27@0.50	BH28@0.50	BH28@3.00	BH26@1 .00
			Client sampling date / time	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00
Compound	CAS Number	LOR	Unit	ES1838118-003	ES1838118-004	ES1838118-007	ES1838118-009	ES1838118-011
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	----	1.0	%	16.5	2.6	4.0	19.4	20.3
EA200: AS 4964 - 2004 Identification of Asbestos in Soils								
Asbestos Detected	1332-21-4	0.1	g/kg	----	No	No	----	No
Asbestos (Trace)	1332-21-4	5	Fibres	----	No	No	----	No
Asbestos Type	1332-21-4	-	--	----	-	-	----	-
Sample weight (dry)	----	0.01	g	----	395	184	----	340
APPROVED IDENTIFIER:	----	-	--	----	A. SMYLIE	A. SMYLIE	----	A. SMYLIE
EA200N: Asbestos Quantification (non-NATA)								
ø Asbestos (Fines and Fibrous <7mm)	1332-21-4	0.0004	g	----	<0.0004	<0.0004	----	<0.0004
ø Asbestos (Fines and Fibrous FA+AF)	----	0.001	% (w/w)	----	<0.001	<0.001	----	<0.001
ø Asbestos Containing Material	1332-21-4	0.1	g	----	<0.1	<0.1	----	<0.1
ø Asbestos Containing Material (as 15% Asbestos in ACM >7mm)	1332-21-4	0.01	% (w/w)	----	<0.01	<0.01	----	<0.01
ø Weight Used for % Calculation	----	0.0001	kg	----	0.395	0.184	----	0.340
EG005T: Total Metals by ICP-AES								
Arsenic	7440-38-2	5	mg/kg	<5	<5	<5	<5	<5
Cadmium	7440-43-9	1	mg/kg	<1	<1	<1	<1	<1
Chromium	7440-47-3	2	mg/kg	9	4	<2	<2	<2
Copper	7440-50-8	5	mg/kg	12	6	<5	<5	<5
Lead	7439-92-1	5	mg/kg	30	8	<5	<5	<5
Nickel	7440-02-0	2	mg/kg	3	3	<2	<2	<2
Zinc	7440-66-6	5	mg/kg	28	27	12	22	22
EG035T: Total Recoverable Mercury by FIMS								
Mercury	7439-97-6	0.1	mg/kg	0.4	<0.1	<0.1	<0.1	<0.1
EP066: Polychlorinated Biphenyls (PCB)								
Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
EP068A: Organochlorine Pesticides (OC)								
alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
delta-BHC	319-86-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
Heptachlor	76-44-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH19@4.00	BH27@0.50	BH28@0.50	BH28@3.00	BH26@1 .00
				Client sampling date / time	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-003	ES1838118-004	ES1838118-007	ES1838118-009	ES1838118-011
					Result	Result	Result	Result	Result
EP068A: Organochlorine Pesticides (OC) - Continued									
Aldrin	309-00-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Heptachlor epoxide	1024-57-3	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
^ Total Chlordane (sum)	----	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
trans-Chlordane	5103-74-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
alpha-Endosulfan	959-98-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
cis-Chlordane	5103-71-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Dieldrin	60-57-1	0.05	mg/kg		<0.05	**0.08**	<0.05	<0.05	<0.05
4.4`-DDE	72-55-9	0.05	mg/kg		**0.05**	<0.05	<0.05	<0.05	<0.05
Endrin	72-20-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
beta-Endosulfan	33213-65-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
^ Endosulfan (sum)	115-29-7	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
4.4`-DDD	72-54-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Endrin aldehyde	7421-93-4	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Endosulfan sulfate	1031-07-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
4.4`-DDT	50-29-3	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Endrin ketone	53494-70-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Methoxychlor	72-43-5	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
^ Sum of Aldrin + Dieldrin	309-00-2/60-57-1	0.05	mg/kg		<0.05	**0.08**	<0.05	<0.05	<0.05
^ Sum of DDD + DDE + DDT	72-54-8/72-55-9/50-2	0.05	mg/kg		**0.05**	<0.05	<0.05	<0.05	<0.05
EP068B: Organophosphorus Pesticides (OP)									
Dichlorvos	62-73-7	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Demeton-S-methyl	919-86-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Monocrotophos	6923-22-4	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Dimethoate	60-51-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Diazinon	333-41-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Parathion-methyl	298-00-0	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Malathion	121-75-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Fenthion	55-38-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Chlorpyrifos	2921-88-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Parathion	56-38-2	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Pirimphos-ethyl	23505-41-1	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Chlorfenvinphos	470-90-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Bromophos-ethyl	4824-78-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH19@4.00	BH27@0.50	BH28@0.50	BH28@3.00	BH26@1 .00
				Client sampling date / time	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-003	ES1838118-004	ES1838118-007	ES1838118-009	ES1838118-011
					Result	Result	Result	Result	Result
EP068B: Organophosphorus Pesticides (OP) - Continued									
Fenamiphos	22224-92-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Prothiofos	34643-46-4	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Ethion	563-12-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Carbophenothion	786-19-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Azinphos Methyl	86-50-0	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
EP074A: Monocyclic Aromatic Hydrocarbons									
Styrene	100-42-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Isopropylbenzene	98-82-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
n-Propylbenzene	103-65-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
sec-Butylbenzene	135-98-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
tert-Butylbenzene	98-06-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
p-Isopropyltoluene	99-87-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
n-Butylbenzene	104-51-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074B: Oxygenated Compounds									
Vinyl Acetate	108-05-4	5	mg/kg		<5	<5	<5	<5	<5
2-Butanone (MEK)	78-93-3	5	mg/kg		<5	<5	<5	<5	<5
4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg		<5	<5	<5	<5	<5
2-Hexanone (MBK)	591-78-6	5	mg/kg		<5	<5	<5	<5	<5
EP074C: Sulfonated Compounds									
Carbon disulfide	75-15-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074D: Fumigants									
2.2-Dichloropropane	594-20-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichloropropane	78-87-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074E: Halogenated Aliphatic Compounds									
Dichlorodifluoromethane	75-71-8	5	mg/kg		<5	<5	<5	<5	<5
Chloromethane	74-87-3	5	mg/kg		<5	<5	<5	<5	<5
Vinyl chloride	75-01-4	5	mg/kg		<5	<5	<5	<5	<5
Bromomethane	74-83-9	5	mg/kg		<5	<5	<5	<5	<5
Chloroethane	75-00-3	5	mg/kg		<5	<5	<5	<5	<5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH19@4.00	BH27@0.50	BH28@0.50	BH28@3.00	BH26@1 .00
				Client sampling date / time	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-003	ES1838118-004	ES1838118-007	ES1838118-009	ES1838118-011
					Result	Result	Result	Result	Result
EP074E: Halogenated Aliphatic Compounds - Continued									
Trichlorofluoromethane	75-69-4	5	mg/kg		<5	<5	<5	<5	<5
1.1-Dichloroethene	75-35-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Iodomethane	74-88-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1-Dichloroethane	75-34-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.1-Trichloroethane	71-55-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1-Dichloropropylene	563-58-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Carbon Tetrachloride	56-23-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichloroethane	107-06-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Trichloroethene	79-01-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dibromomethane	74-95-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.2-Trichloroethane	79-00-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.3-Dichloropropane	142-28-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Tetrachloroethene	127-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.3-Trichloropropane	96-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pentachloroethane	76-01-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074F: Halogenated Aromatic Compounds									
Chlorobenzene	108-90-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bromobenzene	108-86-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Chlorotoluene	95-49-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chlorotoluene	106-43-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074G: Trihalomethanes									
Chloroform	67-66-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bromodichloromethane	75-27-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dibromochloromethane	124-48-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bromoform	75-25-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075A: Phenolic Compounds									

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH19@4.00	BH27@0.50	BH28@0.50	BH28@3.00	BH26@1 .00
			Client sampling date / time	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00
Compound	CAS Number	LOR	Unit	ES1838118-003	ES1838118-004	ES1838118-007	ES1838118-009	ES1838118-011
				Result	Result	Result	Result	Result
EP075A: Phenolic Compounds - Continued								
Phenol	108-95-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2-Chlorophenol	95-57-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2-Methylphenol	95-48-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
3- & 4-Methylphenol	1319-77-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2-Nitrophenol	88-75-5	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.4-Dimethylphenol	105-67-9	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.4-Dichlorophenol	120-83-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.6-Dichlorophenol	87-65-0	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Pentachlorophenol	87-86-5	1	mg/kg	<1	<1	<1	<1	<1
EP075B: Polynuclear Aromatic Hydrocarbons								
Naphthalene	91-20-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2-Methylnaphthalene	91-57-6	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2-Chloronaphthalene	91-58-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Acenaphthylene	208-96-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Acenaphthene	83-32-9	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Fluorene	86-73-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Phenanthrene	85-01-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Anthracene	120-12-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Fluoranthene	206-44-0	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Pyrene	129-00-0	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Benz(a)anthracene	56-55-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Chrysene	218-01-9	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg	<1	<1	<1	<1	<1
7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Benzo(a)pyrene	50-32-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
3-Methylcholanthrene	56-49-5	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
^ Sum of PAHs	----	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH19@4.00	BH27@0.50	BH28@0.50	BH28@3.00	BH26@1 .00
				Client sampling date / time	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-003	ES1838118-004	ES1838118-007	ES1838118-009	ES1838118-011
					Result	Result	Result	Result	Result
EP075B: Polynuclear Aromatic Hydrocarbons - Continued									
^ Benzo(a)pyrene TEQ (zero)	----	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
^ Benzo(a)pyrene TEQ (half LOR)	----	0.5	mg/kg		**0.6**	**0.6**	**0.6**	**0.6**	**0.6**
^ Benzo(a)pyrene TEQ (LOR)	----	0.5	mg/kg		**1.2**	**1.2**	**1.2**	**1.2**	**1.2**
EP075C: Phthalate Esters									
Dimethyl phthalate	131-11-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Diethyl phthalate	84-66-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Di-n-butyl phthalate	84-74-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Butyl benzyl phthalate	85-68-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
bis(2-ethylhexyl) phthalate	117-81-7	5.0	mg/kg		<5.0	<5.0	<5.0	<5.0	<5.0
Di-n-octylphthalate	117-84-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075D: Nitrosamines									
N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodiethylamine	55-18-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosopyrrolidine	930-55-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
N-Nitrosomorpholine	59-89-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosopiperidine	100-75-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodibutylamine	924-16-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
Methapyrilene	91-80-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075E: Nitroaromatics and Ketones									
2-Picoline	109-06-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Acetophenone	98-86-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Nitrobenzene	98-95-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Isophorone	78-59-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.6-Dinitrotoluene	606-20-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
2.4-Dinitrotoluene	121-14-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
1-Naphthylamine	134-32-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
5-Nitro-o-toluidine	99-55-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Azobenzene	103-33-3	1	mg/kg		<1	<1	<1	<1	<1
1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Phenacetin	62-44-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH19@4.00	BH27@0.50	BH28@0.50	BH28@3.00	BH26@1 .00
				Client sampling date / time	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-003	ES1838118-004	ES1838118-007	ES1838118-009	ES1838118-011
					Result	Result	Result	Result	Result
EP075E: Nitroaromatics and Ketones - Continued									
4-Aminobiphenyl	92-67-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pentachloronitrobenzene	82-68-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pronamide	23950-58-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dimethylaminoazobenzene	60-11-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorobenzilate	510-15-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075F: Haloethers									
Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075G: Chlorinated Hydrocarbons									
1.3-Dichlorobenzene	541-73-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.4-Dichlorobenzene	106-46-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichlorobenzene	95-50-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachloroethane	67-72-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachloropropylene	1888-71-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorobutadiene	87-68-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg		<2.5	<2.5	<2.5	<2.5	<2.5
Pentachlorobenzene	608-93-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorobenzene (HCB)	118-74-1	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
EP075H: Anilines and Benzidines									
Aniline	62-53-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chloroaniline	106-47-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Nitroaniline	88-74-4	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
3-Nitroaniline	99-09-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
Dibenzofuran	132-64-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Nitroaniline	100-01-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Carbazole	86-74-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075I: Organochlorine Pesticides									
alpha-BHC	319-84-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
beta-BHC	319-85-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
gamma-BHC	58-89-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH19@4.00	BH27@0.50	BH28@0.50	BH28@3.00	BH26@1 .00
				Client sampling date / time	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-003	ES1838118-004	ES1838118-007	ES1838118-009	ES1838118-011
					Result	Result	Result	Result	Result
EP075I: Organochlorine Pesticides - Continued									
delta-BHC	319-86-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Heptachlor	76-44-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Aldrin	309-00-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Heptachlor epoxide	1024-57-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
alpha-Endosulfan	959-98-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4.4`-DDE	72-55-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dieldrin	60-57-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Endrin	72-20-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
beta-Endosulfan	33213-65-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4.4`-DDD	72-54-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Endosulfan sulfate	1031-07-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4.4`-DDT	50-29-3	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
EP075J: Organophosphorus Pesticides									
Dichlorvos	62-73-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dimethoate	60-51-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Diazinon	333-41-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorpyrifos-methyl	5598-13-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Malathion	121-75-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Fenthion	55-38-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorpyrifos	2921-88-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pirimphos-ethyl	23505-41-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorfenvinphos	470-90-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Prothiofos	34643-46-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Ethion	563-12-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP080/071: Total Petroleum Hydrocarbons									
C6 - C9 Fraction	----	10	mg/kg		<10	<10	<10	<10	<10
C10 - C14 Fraction	----	50	mg/kg		<50	<50	<50	<50	<50
C15 - C28 Fraction	----	100	mg/kg		<100	<100	<100	<100	<100
C29 - C36 Fraction	----	100	mg/kg		<100	<100	<100	<100	<100
^ C10 - C36 Fraction (sum)	----	50	mg/kg		<50	<50	<50	<50	<50
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions									
C6 - C10 Fraction	C6_C10	10	mg/kg		<10	<10	<10	<10	<10
^ C6 - C10 Fraction minus BTEX (F1)	C6_C10-BTEX	10	mg/kg		<10	<10	<10	<10	<10

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH19@4.00	BH27@0.50	BH28@0.50	BH28@3.00	BH26@1 .00
				Client sampling date / time	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-003	ES1838118-004	ES1838118-007	ES1838118-009	ES1838118-011
					Result	Result	Result	Result	Result
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions - Continued									
>C10 - C16 Fraction	----	50	mg/kg		<50	<50	<50	<50	<50
>C16 - C34 Fraction	----	100	mg/kg		<100	<100	<100	<100	<100
>C34 - C40 Fraction	----	100	mg/kg		<100	<100	<100	<100	<100
^ **>C10 - C40 Fraction (sum)**	----	50	mg/kg		<50	<50	<50	<50	<50
^ **>C10 - C16 Fraction minus Naphthalene (F2)**	----	50	mg/kg		<50	<50	<50	<50	<50
EP080: BTEXN									
Benzene	71-43-2	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Toluene	108-88-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Ethylbenzene	100-41-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
ortho-Xylene	95-47-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
^ **Sum of BTEX**	----	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
^ **Total Xylenes**	----	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Naphthalene	91-20-3	1	mg/kg		<1	<1	<1	<1	<1
EP231A: Perfluoroalkyl Sulfonic Acids									
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg		----	----	----	**0.0003**	----
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg		----	----	----	<0.0002	----
EP231B: Perfluoroalkyl Carboxylic Acids									
Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg		----	----	----	<0.001	----
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg		----	----	----	<0.0002	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH19@4.00	BH27@0.50	BH28@0.50	BH28@3.00	BH26@1 .00
				Client sampling date / time	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-003	ES1838118-004	ES1838118-007	ES1838118-009	ES1838118-011
					Result	Result	Result	Result	Result
EP231B: Perfluoroalkyl Carboxylic Acids - Continued									
Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg		----	----	----	<0.0005	----
EP231C: Perfluoroalkyl Sulfonamides									
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg		----	----	----	<0.0002	----
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg		----	----	----	<0.0005	----
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg		----	----	----	<0.0005	----
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg		----	----	----	<0.0005	----
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg		----	----	----	<0.0005	----
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg		----	----	----	<0.0002	----
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg		----	----	----	<0.0002	----
EP231D: (n:2) Fluorotelomer Sulfonic Acids									
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg		----	----	----	<0.0005	----
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg		----	----	----	<0.0005	----
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg		----	----	----	<0.0005	----
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg		----	----	----	<0.0005	----
EP231P: PFAS Sums									

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH19@4.00	BH27@0.50	BH28@0.50	BH28@3.00	BH26@1 .00
				Client sampling date / time	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-003	ES1838118-004	ES1838118-007	ES1838118-009	ES1838118-011
					Result	Result	Result	Result	Result
EP231P: PFAS Sums - Continued									
Sum of PFAS	----	0.0002	mg/kg		----	----	----	0.0003	----
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	mg/kg		----	----	----	0.0003	----
Sum of PFAS (WA DER List)	----	0.0002	mg/kg		----	----	----	0.0003	----
EP066S: PCB Surrogate									
Decachlorobiphenyl	2051-24-3	0.1	%		85.6	115	101	109	95.9
EP068S: Organochlorine Pesticide Surrogate									
Dibromo-DDE	21655-73-2	0.05	%		100	92.9	117	114	130
EP068T: Organophosphorus Pesticide Surrogate									
DEF	78-48-8	0.05	%		64.3	93.3	76.9	80.5	74.7
EP074S: VOC Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.5	%		110	124	126	114	116
Toluene-D8	2037-26-5	0.5	%		103	111	114	99.8	102
4-Bromofluorobenzene	460-00-4	0.5	%		103	109	112	99.3	103
EP075S: Acid Extractable Surrogates									
2-Fluorophenol	367-12-4	0.5	%		92.2	64.0	104	69.5	97.6
Phenol-d6	13127-88-3	0.5	%		91.9	91.8	98.0	64.6	92.6
2-Chlorophenol-D4	93951-73-6	0.5	%		97.9	69.3	111	73.6	108
2.4.6-Tribromophenol	118-79-6	0.5	%		46.7	44.3	49.7	52.2	95.2
EP075T: Base/Neutral Extractable Surrogates									
Nitrobenzene-D5	4165-60-0	0.5	%		93.8	97.0	108	69.6	103
1.2-Dichlorobenzene-D4	2199-69-1	0.5	%		92.2	97.1	106	68.1	105
2-Fluorobiphenyl	321-60-8	0.5	%		109	110	112	93.8	99.9
Anthracene-d10	1719-06-8	0.5	%		96.1	98.9	104	78.0	120
4-Terphenyl-d14	1718-51-0	0.5	%		93.2	98.7	112	83.1	122
EP080S: TPH(V)/BTEX Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.2	%		112	126	128	116	118
Toluene-D8	2037-26-5	0.2	%		99.0	107	109	95.8	98.2
4-Bromofluorobenzene	460-00-4	0.2	%		102	106	110	97.4	101
EP231S: PFAS Surrogate									
13C4-PFOS	----	0.0002	%		----	----	----	63.5	----
13C8-PFOA	----	0.0002	%		----	----	----	64.5	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH26@3.00	BH13@1.50	BH14@0.80	BH14@2.00	BH21@1.00
			Client sampling date / time	13-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00
Compound	CAS Number	LOR	Unit	ES1838118-012	ES1838118-014	ES1838118-016	ES1838118-018	ES1838118-019
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	----	1.0	%	10.5	41.8	6.0	12.7	5.2
EA200: AS 4964 - 2004 Identification of Asbestos in Soils								
Asbestos Detected	1332-21-4	0.1	g/kg	----	No	No	----	No
Asbestos (Trace)	1332-21-4	5	Fibres	----	No	No	----	No
Asbestos Type	1332-21-4	-	--	----	-	-	----	-
Sample weight (dry)	----	0.01	g	----	5.77	224	----	243
APPROVED IDENTIFIER:	----	-	--	----	A. SMYLIE	A. SMYLIE	----	A. SMYLIE
EA200N: Asbestos Quantification (non-NATA)								
ø Asbestos (Fines and Fibrous <7mm)	1332-21-4	0.0004	g	----	----	<0.0004	----	<0.0004
ø Asbestos (Fines and Fibrous FA+AF)	----	0.001	% (w/w)	----	----	<0.001	----	<0.001
ø Asbestos Containing Material	1332-21-4	0.1	g	----	----	<0.1	----	<0.1
ø Asbestos Containing Material (as 15% Asbestos in ACM >7mm)	1332-21-4	0.01	% (w/w)	----	----	<0.01	----	<0.01
ø Weight Used for % Calculation	----	0.0001	kg	----	----	0.224	----	0.243
EG005T: Total Metals by ICP-AES								
Arsenic	7440-38-2	5	mg/kg	<5	7	<5	<5	<5
Cadmium	7440-43-9	1	mg/kg	<1	<1	<1	<1	<1
Chromium	7440-47-3	2	mg/kg	<2	6	<2	<2	<2
Copper	7440-50-8	5	mg/kg	<5	17	<5	<5	<5
Lead	7439-92-1	5	mg/kg	<5	11	<5	<5	<5
Nickel	7440-02-0	2	mg/kg	<2	13	<2	<2	<2
Zinc	7440-66-6	5	mg/kg	<5	26	<5	11	30
EG035T: Total Recoverable Mercury by FIMS								
Mercury	7439-97-6	0.1	mg/kg	<0.1	0.1	<0.1	<0.1	<0.1
EP066: Polychlorinated Biphenyls (PCB)								
Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
EP068A: Organochlorine Pesticides (OC)								
alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
delta-BHC	319-86-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
Heptachlor	76-44-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH26@3.00	BH13@1.50	BH14@0.80	BH14@2.00	BH21@1.00
				Client sampling date / time	13-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-012	ES1838118-014	ES1838118-016	ES1838118-018	ES1838118-019
					Result	Result	Result	Result	Result
EP068A: Organochlorine Pesticides (OC) - Continued									
Aldrin	309-00-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Heptachlor epoxide	1024-57-3	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
^ Total Chlordane (sum)	----	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
trans-Chlordane	5103-74-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
alpha-Endosulfan	959-98-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
cis-Chlordane	5103-71-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Dieldrin	60-57-1	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
4.4`-DDE	72-55-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Endrin	72-20-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
beta-Endosulfan	33213-65-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
^ Endosulfan (sum)	115-29-7	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
4.4`-DDD	72-54-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Endrin aldehyde	7421-93-4	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Endosulfan sulfate	1031-07-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
4.4`-DDT	50-29-3	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Endrin ketone	53494-70-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Methoxychlor	72-43-5	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
^ Sum of Aldrin + Dieldrin	309-00-2/60-57-1	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
^ Sum of DDD + DDE + DDT	72-54-8/72-55-9/50-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
EP068B: Organophosphorus Pesticides (OP)									
Dichlorvos	62-73-7	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Demeton-S-methyl	919-86-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Monocrotophos	6923-22-4	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Dimethoate	60-51-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Diazinon	333-41-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Parathion-methyl	298-00-0	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Malathion	121-75-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Fenthion	55-38-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Chlorpyrifos	2921-88-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Parathion	56-38-2	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Pirimphos-ethyl	23505-41-1	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Chlorfenvinphos	470-90-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Bromophos-ethyl	4824-78-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH26@3.00	BH13@1.50	BH14@0.80	BH14@2.00	BH21@1.00
				Client sampling date / time	13-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-012	ES1838118-014	ES1838118-016	ES1838118-018	ES1838118-019
					Result	Result	Result	Result	Result
EP068B: Organophosphorus Pesticides (OP) - Continued									
Fenamiphos	22224-92-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Prothiofos	34643-46-4	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Ethion	563-12-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Carbophenothion	786-19-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Azinphos Methyl	86-50-0	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
EP074A: Monocyclic Aromatic Hydrocarbons									
Styrene	100-42-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Isopropylbenzene	98-82-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
n-Propylbenzene	103-65-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
sec-Butylbenzene	135-98-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
tert-Butylbenzene	98-06-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
p-Isopropyltoluene	99-87-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
n-Butylbenzene	104-51-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074B: Oxygenated Compounds									
Vinyl Acetate	108-05-4	5	mg/kg		<5	<5	<5	<5	<5
2-Butanone (MEK)	78-93-3	5	mg/kg		<5	<5	<5	<5	<5
4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg		<5	<5	<5	<5	<5
2-Hexanone (MBK)	591-78-6	5	mg/kg		<5	<5	<5	<5	<5
EP074C: Sulfonated Compounds									
Carbon disulfide	75-15-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074D: Fumigants									
2.2-Dichloropropane	594-20-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichloropropane	78-87-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074E: Halogenated Aliphatic Compounds									
Dichlorodifluoromethane	75-71-8	5	mg/kg		<5	<5	<5	<5	<5
Chloromethane	74-87-3	5	mg/kg		<5	<5	<5	<5	<5
Vinyl chloride	75-01-4	5	mg/kg		<5	<5	<5	<5	<5
Bromomethane	74-83-9	5	mg/kg		<5	<5	<5	<5	<5
Chloroethane	75-00-3	5	mg/kg		<5	<5	<5	<5	<5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH26@3.00	BH13@1.50	BH14@0.80	BH14@2.00	BH21@1.00
				Client sampling date / time	13-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-012	ES1838118-014	ES1838118-016	ES1838118-018	ES1838118-019
					Result	Result	Result	Result	Result
EP074E: Halogenated Aliphatic Compounds - Continued									
Trichlorofluoromethane	75-69-4	5	mg/kg		<5	<5	<5	<5	<5
1.1-Dichloroethene	75-35-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Iodomethane	74-88-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1-Dichloroethane	75-34-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.1-Trichloroethane	71-55-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1-Dichloropropylene	563-58-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Carbon Tetrachloride	56-23-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichloroethane	107-06-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Trichloroethene	79-01-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dibromomethane	74-95-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.2-Trichloroethane	79-00-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.3-Dichloropropane	142-28-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Tetrachloroethene	127-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.3-Trichloropropane	96-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pentachloroethane	76-01-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074F: Halogenated Aromatic Compounds									
Chlorobenzene	108-90-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bromobenzene	108-86-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Chlorotoluene	95-49-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chlorotoluene	106-43-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074G: Trihalomethanes									
Chloroform	67-66-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bromodichloromethane	75-27-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dibromochloromethane	124-48-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bromoform	75-25-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075A: Phenolic Compounds									

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH26@3.00	BH13@1.50	BH14@0.80	BH14@2.00	BH21@1.00
				Client sampling date / time	13-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-012	ES1838118-014	ES1838118-016	ES1838118-018	ES1838118-019
					Result	Result	Result	Result	Result
EP075A: Phenolic Compounds - Continued									
Phenol	108-95-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Chlorophenol	95-57-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Methylphenol	95-48-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
3- & 4-Methylphenol	1319-77-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Nitrophenol	88-75-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.4-Dimethylphenol	105-67-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.4-Dichlorophenol	120-83-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.6-Dichlorophenol	87-65-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pentachlorophenol	87-86-5	1	mg/kg		<1	<1	<1	<1	<1
EP075B: Polynuclear Aromatic Hydrocarbons									
Naphthalene	91-20-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Methylnaphthalene	91-57-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Chloronaphthalene	91-58-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Acenaphthylene	208-96-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Acenaphthene	83-32-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Fluorene	86-73-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Phenanthrene	85-01-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Anthracene	120-12-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Fluoranthene	206-44-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pyrene	129-00-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Benz(a)anthracene	56-55-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chrysene	218-01-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg		<1	<1	<1	<1	<1
7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Benzo(a)pyrene	50-32-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
3-Methylcholanthrene	56-49-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
^ Sum of PAHs	----	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH26@3.00	BH13@1.50	BH14@0.80	BH14@2.00	BH21@1.00
				Client sampling date / time	13-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-012	ES1838118-014	ES1838118-016	ES1838118-018	ES1838118-019
					Result	Result	Result	Result	Result
EP075B: Polynuclear Aromatic Hydrocarbons - Continued									
^ Benzo(a)pyrene TEQ (zero)	----	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
^ Benzo(a)pyrene TEQ (half LOR)	----	0.5	mg/kg		**0.6**	**0.6**	**0.6**	**0.6**	**0.6**
^ Benzo(a)pyrene TEQ (LOR)	----	0.5	mg/kg		**1.2**	**1.2**	**1.2**	**1.2**	**1.2**
EP075C: Phthalate Esters									
Dimethyl phthalate	131-11-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Diethyl phthalate	84-66-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Di-n-butyl phthalate	84-74-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Butyl benzyl phthalate	85-68-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
bis(2-ethylhexyl) phthalate	117-81-7	5.0	mg/kg		<5.0	<5.0	<5.0	<5.0	<5.0
Di-n-octylphthalate	117-84-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075D: Nitrosamines									
N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodiethylamine	55-18-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosopyrrolidine	930-55-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
N-Nitrosomorpholine	59-89-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosopiperidine	100-75-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodibutylamine	924-16-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
Methapyrilene	91-80-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075E: Nitroaromatics and Ketones									
2-Picoline	109-06-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Acetophenone	98-86-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Nitrobenzene	98-95-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Isophorone	78-59-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.6-Dinitrotoluene	606-20-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
2.4-Dinitrotoluene	121-14-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
1-Naphthylamine	134-32-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
5-Nitro-o-toluidine	99-55-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Azobenzene	103-33-3	1	mg/kg		<1	<1	<1	<1	<1
1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Phenacetin	62-44-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH26@3.00	BH13@1.50	BH14@0.80	BH14@2.00	BH21@1.00
				Client sampling date / time	13-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-012	ES1838118-014	ES1838118-016	ES1838118-018	ES1838118-019
					Result	Result	Result	Result	Result
EP075E: Nitroaromatics and Ketones - Continued									
4-Aminobiphenyl	92-67-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pentachloronitrobenzene	82-68-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pronamide	23950-58-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dimethylaminoazobenzene	60-11-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorobenzilate	510-15-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075F: Haloethers									
Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075G: Chlorinated Hydrocarbons									
1.3-Dichlorobenzene	541-73-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.4-Dichlorobenzene	106-46-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichlorobenzene	95-50-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachloroethane	67-72-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachloropropylene	1888-71-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorobutadiene	87-68-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg		<2.5	<2.5	<2.5	<2.5	<2.5
Pentachlorobenzene	608-93-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorobenzene (HCB)	118-74-1	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
EP075H: Anilines and Benzidines									
Aniline	62-53-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chloroaniline	106-47-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Nitroaniline	88-74-4	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
3-Nitroaniline	99-09-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
Dibenzofuran	132-64-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Nitroaniline	100-01-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Carbazole	86-74-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075I: Organochlorine Pesticides									
alpha-BHC	319-84-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
beta-BHC	319-85-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
gamma-BHC	58-89-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH26@3.00	BH13@1.50	BH14@0.80	BH14@2.00	BH21@1.00
				Client sampling date / time	13-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-012	ES1838118-014	ES1838118-016	ES1838118-018	ES1838118-019
					Result	Result	Result	Result	Result
EP075I: Organochlorine Pesticides - Continued									
delta-BHC	319-86-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Heptachlor	76-44-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Aldrin	309-00-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Heptachlor epoxide	1024-57-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
alpha-Endosulfan	959-98-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4.4`-DDE	72-55-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dieldrin	60-57-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Endrin	72-20-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
beta-Endosulfan	33213-65-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4.4`-DDD	72-54-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Endosulfan sulfate	1031-07-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4.4`-DDT	50-29-3	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
EP075J: Organophosphorus Pesticides									
Dichlorvos	62-73-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dimethoate	60-51-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Diazinon	333-41-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorpyrifos-methyl	5598-13-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Malathion	121-75-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Fenthion	55-38-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorpyrifos	2921-88-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pirimphos-ethyl	23505-41-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorfenvinphos	470-90-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Prothiofos	34643-46-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Ethion	563-12-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP080/071: Total Petroleum Hydrocarbons									
C6 - C9 Fraction	----	10	mg/kg		<10	<10	<10	<10	<10
C10 - C14 Fraction	----	50	mg/kg		<50	<50	<50	<50	<50
C15 - C28 Fraction	----	100	mg/kg		<100	<100	<100	<100	**590**
C29 - C36 Fraction	----	100	mg/kg		<100	<100	<100	<100	**300**
^ C10 - C36 Fraction (sum)	----	50	mg/kg		<50	<50	<50	<50	**890**
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions									
C6 - C10 Fraction	C6_C10	10	mg/kg		<10	<10	<10	<10	<10
^ C6 - C10 Fraction minus BTEX (F1)	C6_C10-BTEX	10	mg/kg		<10	<10	<10	<10	<10

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH26@3.00	BH13@1.50	BH14@0.80	BH14@2.00	BH21@1.00
				Client sampling date / time	13-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-012	ES1838118-014	ES1838118-016	ES1838118-018	ES1838118-019
					Result	Result	Result	Result	Result
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions - Continued									
>C10 - C16 Fraction	----	50	mg/kg		<50	<50	<50	<50	<50
>C16 - C34 Fraction	----	100	mg/kg		<100	<100	<100	<100	**820**
>C34 - C40 Fraction	----	100	mg/kg		<100	<100	<100	<100	**140**
^ **>C10 - C40 Fraction (sum)**	----	50	mg/kg		<50	<50	<50	<50	**960**
^ **>C10 - C16 Fraction minus Naphthalene (F2)**	----	50	mg/kg		<50	<50	<50	<50	<50
EP080: BTEXN									
Benzene	71-43-2	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Toluene	108-88-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Ethylbenzene	100-41-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
ortho-Xylene	95-47-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
^ **Sum of BTEX**	----	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
^ **Total Xylenes**	----	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Naphthalene	91-20-3	1	mg/kg		<1	<1	<1	<1	<1
EP231A: Perfluoroalkyl Sulfonic Acids									
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg		----	----	<0.0002	----	----
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg		----	----	<0.0002	----	----
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg		----	----	<0.0002	----	----
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg		----	----	<0.0002	----	----
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg		----	----	**0.0003**	----	----
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg		----	----	<0.0002	----	----
EP231B: Perfluoroalkyl Carboxylic Acids									
Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg		----	----	<0.001	----	----
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg		----	----	<0.0002	----	----
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg		----	----	<0.0002	----	----
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg		----	----	<0.0002	----	----
Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg		----	----	<0.0002	----	----
Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg		----	----	<0.0002	----	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH26@3.00	BH13@1.50	BH14@0.80	BH14@2.00	BH21@1.00
				Client sampling date / time	13-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-012	ES1838118-014	ES1838118-016	ES1838118-018	ES1838118-019
					Result	Result	Result	Result	Result
EP231B: Perfluoroalkyl Carboxylic Acids - Continued									
Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg		----	----	<0.0002	----	----
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg		----	----	<0.0002	----	----
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg		----	----	<0.0002	----	----
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg		----	----	<0.0002	----	----
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg		----	----	<0.0005	----	----
EP231C: Perfluoroalkyl Sulfonamides									
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg		----	----	<0.0002	----	----
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg		----	----	<0.0005	----	----
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg		----	----	<0.0005	----	----
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg		----	----	<0.0005	----	----
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg		----	----	<0.0005	----	----
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg		----	----	<0.0002	----	----
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg		----	----	<0.0002	----	----
EP231D: (n:2) Fluorotelomer Sulfonic Acids									
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg		----	----	<0.0005	----	----
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg		----	----	<0.0005	----	----
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg		----	----	<0.0005	----	----
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg		----	----	<0.0005	----	----
EP231P: PFAS Sums									

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH26@3.00	BH13@1.50	BH14@0.80	BH14@2.00	BH21@1.00
				Client sampling date / time	13-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00	14-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-012	ES1838118-014	ES1838118-016	ES1838118-018	ES1838118-019
					Result	Result	Result	Result	Result
EP231P: PFAS Sums - Continued									
Sum of PFAS	----	0.0002	mg/kg		----	----	0.0003	----	----
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	mg/kg		----	----	0.0003	----	----
Sum of PFAS (WA DER List)	----	0.0002	mg/kg		----	----	0.0003	----	----
EP066S: PCB Surrogate									
Decachlorobiphenyl	2051-24-3	0.1	%		99.0	111	87.5	81.3	106
EP068S: Organochlorine Pesticide Surrogate									
Dibromo-DDE	21655-73-2	0.05	%		116	120	98.0	95.2	85.0
EP068T: Organophosphorus Pesticide Surrogate									
DEF	78-48-8	0.05	%		66.0	85.6	68.1	63.3	97.8
EP074S: VOC Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.5	%		122	111	124	123	118
Toluene-D8	2037-26-5	0.5	%		106	57.8	108	109	109
4-Bromofluorobenzene	460-00-4	0.5	%		106	41.0	108	108	104
EP075S: Acid Extractable Surrogates									
2-Fluorophenol	367-12-4	0.5	%		84.5	87.0	108	116	101
Phenol-d6	13127-88-3	0.5	%		80.0	80.4	99.8	106	101
2-Chlorophenol-D4	93951-73-6	0.5	%		91.8	86.7	115	118	114
2.4.6-Tribromophenol	118-79-6	0.5	%		45.0	44.1	50.0	52.2	100.0
EP075T: Base/Neutral Extractable Surrogates									
Nitrobenzene-D5	4165-60-0	0.5	%		88.3	83.8	112	116	109
1.2-Dichlorobenzene-D4	2199-69-1	0.5	%		85.6	92.2	106	99.1	107
2-Fluorobiphenyl	321-60-8	0.5	%		112	97.2	119	84.5	71.7
Anthracene-d10	1719-06-8	0.5	%		97.1	40.0	106	105	115
4-Terphenyl-d14	1718-51-0	0.5	%		105	66.7	116	110	119
EP080S: TPH(V)/BTEX Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.2	%		124	112	126	125	120
Toluene-D8	2037-26-5	0.2	%		102	55.6	104	104	105
4-Bromofluorobenzene	460-00-4	0.2	%		103	40.0	105	106	101
EP231S: PFAS Surrogate									
13C4-PFOS	----	0.0002	%		----	----	68.5	----	----
13C8-PFOA	----	0.0002	%		----	----	65.0	----	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH21@3.00	BH07@0.20	BH23@1.00	BH23@2.00	BH23@3.00
			Client sampling date / time	14-Dec-2018 00:00	14-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00
Compound	CAS Number	LOR	Unit	ES1838118-020	ES1838118-021	ES1838118-026	ES1838118-027	ES1838118-028
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	----	0.1	%	----	----	----	1.7	----
Moisture Content	----	1.0	%	20.5	10.4	8.1	----	7.8
EA200: AS 4964 - 2004 Identification of Asbestos in Soils								
Asbestos Detected	1332-21-4	0.1	g/kg	----	No	No	----	----
Asbestos (Trace)	1332-21-4	5	Fibres	----	No	No	----	----
Asbestos Type	1332-21-4	-	--	----	-	-	----	----
Sample weight (dry)	----	0.01	g	----	245	292	----	----
APPROVED IDENTIFIER:	----	-	--	----	A. SMYLIE	A. SMYLIE	----	----
EA200N: Asbestos Quantification (non-NATA)								
ø Asbestos (Fines and Fibrous <7mm)	1332-21-4	0.0004	g	----	<0.0004	<0.0004	----	----
ø Asbestos (Fines and Fibrous FA+AF)	----	0.001	% (w/w)	----	<0.001	<0.001	----	----
ø Asbestos Containing Material	1332-21-4	0.1	g	----	<0.1	<0.1	----	----
ø Asbestos Containing Material (as 15% Asbestos in ACM >7mm)	1332-21-4	0.01	% (w/w)	----	<0.01	<0.01	----	----
ø Weight Used for % Calculation	----	0.0001	kg	----	0.245	0.292	----	----
EG005T: Total Metals by ICP-AES								
Arsenic	7440-38-2	5	mg/kg	<5	13	<5	----	<5
Cadmium	7440-43-9	1	mg/kg	<1	<1	<1	----	<1
Chromium	7440-47-3	2	mg/kg	<2	36	9	----	<2
Copper	7440-50-8	5	mg/kg	<5	110	116	----	<5
Lead	7439-92-1	5	mg/kg	<5	120	145	----	<5
Nickel	7440-02-0	2	mg/kg	<2	33	8	----	<2
Zinc	7440-66-6	5	mg/kg	12	241	164	----	11
EG035T: Total Recoverable Mercury by FIMS								
Mercury	7439-97-6	0.1	mg/kg	<0.1	<0.1	0.2	----	<0.1
EP066: Polychlorinated Biphenyls (PCB)								
Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	<0.1	<0.1	----	<0.1
EP068A: Organochlorine Pesticides (OC)								
alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	<0.05	----	<0.05
Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	<0.05	----	<0.05
beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	<0.05	----	<0.05
gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	<0.05	----	<0.05
delta-BHC	319-86-8	0.05	mg/kg	<0.05	<0.05	<0.05	----	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH21@3.00	BH07@0.20	BH23@1.00	BH23@2.00	BH23@3.00
				Client sampling date / time	14-Dec-2018 00:00	14-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-020	ES1838118-021	ES1838118-026	ES1838118-027	ES1838118-028
					Result	Result	Result	Result	Result
EP068A: Organochlorine Pesticides (OC) - Continued									
Heptachlor	76-44-8	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Aldrin	309-00-2	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Heptachlor epoxide	1024-57-3	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
^ **Total Chlordane (sum)**	----	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
trans-Chlordane	5103-74-2	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
alpha-Endosulfan	959-98-8	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
cis-Chlordane	5103-71-9	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Dieldrin	60-57-1	0.05	mg/kg		<0.05	**0.13**	<0.05	----	<0.05
4.4`-DDE	72-55-9	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Endrin	72-20-8	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
beta-Endosulfan	33213-65-9	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
^ **Endosulfan (sum)**	115-29-7	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
4.4`-DDD	72-54-8	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Endrin aldehyde	7421-93-4	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Endosulfan sulfate	1031-07-8	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
4.4`-DDT	50-29-3	0.2	mg/kg		<0.2	<0.2	<0.2	----	<0.2
Endrin ketone	53494-70-5	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Methoxychlor	72-43-5	0.2	mg/kg		<0.2	<0.2	<0.2	----	<0.2
^ **Sum of Aldrin + Dieldrin**	309-00-2/60-57-1	0.05	mg/kg		<0.05	**0.13**	<0.05	----	<0.05
^ **Sum of DDD + DDE + DDT**	72-54-8/72-55-9/50-2	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
EP068B: Organophosphorus Pesticides (OP)									
Dichlorvos	62-73-7	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Demeton-S-methyl	919-86-8	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Monocrotophos	6923-22-4	0.2	mg/kg		<0.2	<0.2	<0.2	----	<0.2
Dimethoate	60-51-5	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Diazinon	333-41-5	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Parathion-methyl	298-00-0	0.2	mg/kg		<0.2	<0.2	<0.2	----	<0.2
Malathion	121-75-5	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Fenthion	55-38-9	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Chlorpyrifos	2921-88-2	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Parathion	56-38-2	0.2	mg/kg		<0.2	<0.2	<0.2	----	<0.2
Pirimphos-ethyl	23505-41-1	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Chlorfenvinphos	470-90-6	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH21@3.00	BH07@0.20	BH23@1.00	BH23@2.00	BH23@3.00
				Client sampling date / time	14-Dec-2018 00:00	14-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-020	ES1838118-021	ES1838118-026	ES1838118-027	ES1838118-028
					Result	Result	Result	Result	Result
EP068B: Organophosphorus Pesticides (OP) - Continued									
Bromophos-ethyl	4824-78-6	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Fenamiphos	22224-92-6	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Prothiofos	34643-46-4	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Ethion	563-12-2	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Carbophenothion	786-19-6	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Azinphos Methyl	86-50-0	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
EP074A: Monocyclic Aromatic Hydrocarbons									
Styrene	100-42-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Isopropylbenzene	98-82-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
n-Propylbenzene	103-65-1	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
sec-Butylbenzene	135-98-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
tert-Butylbenzene	98-06-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
p-Isopropyltoluene	99-87-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
n-Butylbenzene	104-51-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
EP074B: Oxygenated Compounds									
Vinyl Acetate	108-05-4	5	mg/kg		<5	<5	<5	----	<5
2-Butanone (MEK)	78-93-3	5	mg/kg		<5	<5	<5	----	<5
4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg		<5	<5	<5	----	<5
2-Hexanone (MBK)	591-78-6	5	mg/kg		<5	<5	<5	----	<5
EP074C: Sulfonated Compounds									
Carbon disulfide	75-15-0	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
EP074D: Fumigants									
2.2-Dichloropropane	594-20-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.2-Dichloropropane	78-87-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
EP074E: Halogenated Aliphatic Compounds									
Dichlorodifluoromethane	75-71-8	5	mg/kg		<5	<5	<5	----	<5
Chloromethane	74-87-3	5	mg/kg		<5	<5	<5	----	<5
Vinyl chloride	75-01-4	5	mg/kg		<5	<5	<5	----	<5
Bromomethane	74-83-9	5	mg/kg		<5	<5	<5	----	<5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH21@3.00	BH07@0.20	BH23@1.00	BH23@2.00	BH23@3.00
				Client sampling date / time	14-Dec-2018 00:00	14-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-020	ES1838118-021	ES1838118-026	ES1838118-027	ES1838118-028
					Result	Result	Result	Result	Result
EP074E: Halogenated Aliphatic Compounds - Continued									
Chloroethane	75-00-3	5	mg/kg		<5	<5	<5	----	<5
Trichlorofluoromethane	75-69-4	5	mg/kg		<5	<5	<5	----	<5
1.1-Dichloroethene	75-35-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Iodomethane	74-88-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.1-Dichloroethane	75-34-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.1.1-Trichloroethane	71-55-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.1-Dichloropropylene	563-58-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Carbon Tetrachloride	56-23-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.2-Dichloroethane	107-06-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Trichloroethene	79-01-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Dibromomethane	74-95-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.1.2-Trichloroethane	79-00-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.3-Dichloropropane	142-28-9	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Tetrachloroethene	127-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.2.3-Trichloropropane	96-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Pentachloroethane	76-01-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
EP074F: Halogenated Aromatic Compounds									
Chlorobenzene	108-90-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Bromobenzene	108-86-1	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
2-Chlorotoluene	95-49-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
4-Chlorotoluene	106-43-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
EP074G: Trihalomethanes									
Chloroform	67-66-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Bromodichloromethane	75-27-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Dibromochloromethane	124-48-1	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Bromoform	75-25-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH21@3.00	BH07@0.20	BH23@1.00	BH23@2.00	BH23@3.00
				Client sampling date / time	14-Dec-2018 00:00	14-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-020	ES1838118-021	ES1838118-026	ES1838118-027	ES1838118-028
					Result	Result	Result	Result	Result
EP075A: Phenolic Compounds									
Phenol	108-95-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
2-Chlorophenol	95-57-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
2-Methylphenol	95-48-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
3- & 4-Methylphenol	1319-77-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
2-Nitrophenol	88-75-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
2.4-Dimethylphenol	105-67-9	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
2.4-Dichlorophenol	120-83-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
2.6-Dichlorophenol	87-65-0	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Pentachlorophenol	87-86-5	1	mg/kg		<1	<1	<1	----	<1
EP075B: Polynuclear Aromatic Hydrocarbons									
Naphthalene	91-20-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
2-Methylnaphthalene	91-57-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
2-Chloronaphthalene	91-58-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Acenaphthylene	208-96-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Acenaphthene	83-32-9	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Fluorene	86-73-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Phenanthrene	85-01-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Anthracene	120-12-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Fluoranthene	206-44-0	0.5	mg/kg		<0.5	<0.5	**1.3**	----	<0.5
Pyrene	129-00-0	0.5	mg/kg		<0.5	<0.5	**1.4**	----	<0.5
N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Benz(a)anthracene	56-55-3	0.5	mg/kg		<0.5	<0.5	**0.7**	----	<0.5
Chrysene	218-01-9	0.5	mg/kg		<0.5	<0.5	**0.6**	----	<0.5
Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg		<1	<1	**1**	----	<1
7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Benzo(a)pyrene	50-32-8	0.5	mg/kg		<0.5	<0.5	**0.6**	----	<0.5
3-Methylcholanthrene	56-49-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
^ Sum of PAHs	----	0.5	mg/kg		<0.5	<0.5	**5.6**	----	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH21@3.00	BH07@0.20	BH23@1.00	BH23@2.00	BH23@3.00
				Client sampling date / time	14-Dec-2018 00:00	14-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-020	ES1838118-021	ES1838118-026	ES1838118-027	ES1838118-028
					Result	Result	Result	Result	Result
EP075B: Polynuclear Aromatic Hydrocarbons - Continued									
^ Benzo(a)pyrene TEQ (zero)	----	0.5	mg/kg		<0.5	<0.5	**0.8**	----	<0.5
^ Benzo(a)pyrene TEQ (half LOR)	----	0.5	mg/kg		**0.6**	**0.6**	**1.0**	----	**0.6**
^ Benzo(a)pyrene TEQ (LOR)	----	0.5	mg/kg		**1.2**	**1.2**	**1.3**	----	**1.2**
EP075C: Phthalate Esters									
Dimethyl phthalate	131-11-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Diethyl phthalate	84-66-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Di-n-butyl phthalate	84-74-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Butyl benzyl phthalate	85-68-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
bis(2-ethylhexyl) phthalate	117-81-7	5.0	mg/kg		<5.0	<5.0	<5.0	----	<5.0
Di-n-octylphthalate	117-84-0	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
EP075D: Nitrosamines									
N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
N-Nitrosodiethylamine	55-18-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
N-Nitrosopyrrolidine	930-55-2	1.0	mg/kg		<1.0	<1.0	<1.0	----	<1.0
N-Nitrosomorpholine	59-89-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
N-Nitrosopiperidine	100-75-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
N-Nitrosodibutylamine	924-16-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	1.0	mg/kg		<1.0	<1.0	<1.0	----	<1.0
Methapyrilene	91-80-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
EP075E: Nitroaromatics and Ketones									
2-Picoline	109-06-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Acetophenone	98-86-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Nitrobenzene	98-95-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Isophorone	78-59-1	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
2.6-Dinitrotoluene	606-20-2	1.0	mg/kg		<1.0	<1.0	<1.0	----	<1.0
2.4-Dinitrotoluene	121-14-2	1.0	mg/kg		<1.0	<1.0	<1.0	----	<1.0
1-Naphthylamine	134-32-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
5-Nitro-o-toluidine	99-55-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Azobenzene	103-33-3	1	mg/kg		<1	<1	<1	----	<1
1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Phenacetin	62-44-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH21@3.00	BH07@0.20	BH23@1.00	BH23@2.00	BH23@3.00
				Client sampling date / time	14-Dec-2018 00:00	14-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-020	ES1838118-021	ES1838118-026	ES1838118-027	ES1838118-028
					Result	Result	Result	Result	Result
EP075E: Nitroaromatics and Ketones - Continued									
4-Aminobiphenyl	92-67-1	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Pentachloronitrobenzene	82-68-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Pronamide	23950-58-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Dimethylaminoazobenzene	60-11-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Chlorobenzilate	510-15-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
EP075F: Haloethers									
Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
EP075G: Chlorinated Hydrocarbons									
1.3-Dichlorobenzene	541-73-1	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.4-Dichlorobenzene	106-46-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.2-Dichlorobenzene	95-50-1	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Hexachloroethane	67-72-1	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Hexachloropropylene	1888-71-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Hexachlorobutadiene	87-68-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg		<2.5	<2.5	<2.5	----	<2.5
Pentachlorobenzene	608-93-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Hexachlorobenzene (HCB)	118-74-1	1.0	mg/kg		<1.0	<1.0	<1.0	----	<1.0
EP075H: Anilines and Benzidines									
Aniline	62-53-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
4-Chloroaniline	106-47-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
2-Nitroaniline	88-74-4	1.0	mg/kg		<1.0	<1.0	<1.0	----	<1.0
3-Nitroaniline	99-09-2	1.0	mg/kg		<1.0	<1.0	<1.0	----	<1.0
Dibenzofuran	132-64-9	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
4-Nitroaniline	100-01-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Carbazole	86-74-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
EP075I: Organochlorine Pesticides									
alpha-BHC	319-84-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
beta-BHC	319-85-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
gamma-BHC	58-89-9	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH21@3.00	BH07@0.20	BH23@1.00	BH23@2.00	BH23@3.00
				Client sampling date / time	14-Dec-2018 00:00	14-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-020	ES1838118-021	ES1838118-026	ES1838118-027	ES1838118-028
					Result	Result	Result	Result	Result
EP075I: Organochlorine Pesticides - Continued									
delta-BHC	319-86-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Heptachlor	76-44-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Aldrin	309-00-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Heptachlor epoxide	1024-57-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
alpha-Endosulfan	959-98-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
4.4`-DDE	72-55-9	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Dieldrin	60-57-1	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Endrin	72-20-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
beta-Endosulfan	33213-65-9	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
4.4`-DDD	72-54-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Endosulfan sulfate	1031-07-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
4.4`-DDT	50-29-3	1.0	mg/kg		<1.0	<1.0	<1.0	----	<1.0
EP075J: Organophosphorus Pesticides									
Dichlorvos	62-73-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Dimethoate	60-51-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Diazinon	333-41-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Chlorpyrifos-methyl	5598-13-0	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Malathion	121-75-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Fenthion	55-38-9	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Chlorpyrifos	2921-88-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Pirimphos-ethyl	23505-41-1	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Chlorfenvinphos	470-90-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Prothiofos	34643-46-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Ethion	563-12-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
EP080/071: Total Petroleum Hydrocarbons									
C6 - C9 Fraction	----	10	mg/kg		<10	<10	<10	----	<10
C10 - C14 Fraction	----	50	mg/kg		<50	**70**	<50	----	<50
C15 - C28 Fraction	----	100	mg/kg		**240**	**1730**	<100	----	<100
C29 - C36 Fraction	----	100	mg/kg		**120**	**1580**	<100	----	<100
^ **C10 - C36 Fraction (sum)**	----	50	mg/kg		**360**	**3380**	<50	----	<50
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions									
C6 - C10 Fraction	C6_C10	10	mg/kg		<10	<10	<10	----	<10
^ **C6 - C10 Fraction minus BTEX (F1)**	C6_C10-BTEX	10	mg/kg		<10	<10	<10	----	<10

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH21@3.00	BH07@0.20	BH23@1.00	BH23@2.00	BH23@3.00
				Client sampling date / time	14-Dec-2018 00:00	14-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-020	ES1838118-021	ES1838118-026	ES1838118-027	ES1838118-028
					Result	Result	Result	Result	Result
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions - Continued									
>C10 - C16 Fraction	----	50	mg/kg		<50	**140**	<50	----	<50
>C16 - C34 Fraction	----	100	mg/kg		**350**	**2880**	<100	----	<100
>C34 - C40 Fraction	----	100	mg/kg		<100	**690**	<100	----	<100
^ **>C10 - C40 Fraction (sum)**	----	50	mg/kg		**350**	**3710**	<50	----	<50
^ **>C10 - C16 Fraction minus Naphthalene (F2)**	----	50	mg/kg		<50	**140**	<50	----	<50
EP080: BTEXN									
Benzene	71-43-2	0.2	mg/kg		<0.2	<0.2	<0.2	----	<0.2
Toluene	108-88-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Ethylbenzene	100-41-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
ortho-Xylene	95-47-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
^ **Sum of BTEX**	----	0.2	mg/kg		<0.2	<0.2	<0.2	----	<0.2
^ **Total Xylenes**	----	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Naphthalene	91-20-3	1	mg/kg		<1	<1	<1	----	<1
EP231A: Perfluoroalkyl Sulfonic Acids									
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg		----	----	----	**0.0003**	----
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg		----	----	----	<0.0002	----
EP231B: Perfluoroalkyl Carboxylic Acids									
Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg		----	----	----	<0.001	----
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg		----	----	----	<0.0002	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH21@3.00	BH07@0.20	BH23@1.00	BH23@2.00	BH23@3.00
				Client sampling date / time	14-Dec-2018 00:00	14-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-020	ES1838118-021	ES1838118-026	ES1838118-027	ES1838118-028
					Result	Result	Result	Result	Result
EP231B: Perfluoroalkyl Carboxylic Acids - Continued									
Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg		----	----	----	<0.0005	----
EP231C: Perfluoroalkyl Sulfonamides									
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg		----	----	----	<0.0002	----
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg		----	----	----	<0.0005	----
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg		----	----	----	<0.0005	----
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg		----	----	----	<0.0005	----
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg		----	----	----	<0.0005	----
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg		----	----	----	<0.0002	----
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg		----	----	----	<0.0002	----
EP231D: (n:2) Fluorotelomer Sulfonic Acids									
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg		----	----	----	<0.0005	----
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg		----	----	----	<0.0005	----
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg		----	----	----	<0.0005	----
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg		----	----	----	<0.0005	----
EP231P: PFAS Sums									

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH21@3.00	BH07@0.20	BH23@1.00	BH23@2.00	BH23@3.00
				Client sampling date / time	14-Dec-2018 00:00	14-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00	13-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-020	ES1838118-021	ES1838118-026	ES1838118-027	ES1838118-028
					Result	Result	Result	Result	Result
EP231P: PFAS Sums - Continued									
Sum of PFAS	----	0.0002	mg/kg		----	----	----	0.0003	----
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	mg/kg		----	----	----	0.0003	----
Sum of PFAS (WA DER List)	----	0.0002	mg/kg		----	----	----	0.0003	----
EP066S: PCB Surrogate									
Decachlorobiphenyl	2051-24-3	0.1	%		125	104	93.5	----	103
EP068S: Organochlorine Pesticide Surrogate									
Dibromo-DDE	21655-73-2	0.05	%		112	100	108	----	94.4
EP068T: Organophosphorus Pesticide Surrogate									
DEF	78-48-8	0.05	%		111	101	110	----	66.0
EP074S: VOC Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.5	%		116	114	116	----	119
Toluene-D8	2037-26-5	0.5	%		108	103	102	----	101
4-Bromofluorobenzene	460-00-4	0.5	%		103	98.9	98.6	----	102
EP075S: Acid Extractable Surrogates									
2-Fluorophenol	367-12-4	0.5	%		107	102	99.1	----	83.5
Phenol-d6	13127-88-3	0.5	%		100.0	96.4	92.9	----	80.2
2-Chlorophenol-D4	93951-73-6	0.5	%		115	108	106	----	93.9
2.4.6-Tribromophenol	118-79-6	0.5	%		98.5	85.9	74.2	----	53.3
EP075T: Base/Neutral Extractable Surrogates									
Nitrobenzene-D5	4165-60-0	0.5	%		107	105	109	----	88.5
1.2-Dichlorobenzene-D4	2199-69-1	0.5	%		103	104	108	----	84.0
2-Fluorobiphenyl	321-60-8	0.5	%		121	104	116	----	112
Anthracene-d10	1719-06-8	0.5	%		113	102	112	----	89.8
4-Terphenyl-d14	1718-51-0	0.5	%		125	122	90.0	----	97.3
EP080S: TPH(V)/BTEX Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.2	%		119	116	117	----	121
Toluene-D8	2037-26-5	0.2	%		104	98.5	98.7	----	97.0
4-Bromofluorobenzene	460-00-4	0.2	%		100	96.0	95.2	----	98.8
EP231S: PFAS Surrogate									
13C4-PFOS	----	0.0002	%		----	----	----	67.5	----
13C8-PFOA	----	0.0002	%		----	----	----	68.5	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH25@1.00	BH22@1.00	BH03@1.00	BH05@1.00	BH04@0.20
			Client sampling date / time	12-Dec-2018 00:00	12-Dec-2018 00:00	12-Dec-2018 00:00	12-Dec-2018 00:00	12-Dec-2018 00:00
Compound	CAS Number	LOR	Unit	ES1838118-029	ES1838118-031	ES1838118-035	ES1838118-038	ES1838118-041
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	----	1.0	%	5.0	12.7	25.4	11.3	8.7
EA200: AS 4964 - 2004 Identification of Asbestos in Soils								
Asbestos Detected	1332-21-4	0.1	g/kg	No	No	No	No	No
Asbestos (Trace)	1332-21-4	5	Fibres	No	No	No	No	No
Asbestos Type	1332-21-4	-	--	-	-	-	-	-
Sample weight (dry)	----	0.01	g	27.1	284	149	214	542
APPROVED IDENTIFIER:	----	-	--	A. SMYLIE	A. SMYLIE	A. SMYLIE	A. SMYLIE	A. SMYLIE
EA200N: Asbestos Quantification (non-NATA)								
ø Asbestos (Fines and Fibrous <7mm)	1332-21-4	0.0004	g	----	<0.0004	<0.0004	<0.0004	<0.0004
ø Asbestos (Fines and Fibrous FA+AF)	----	0.001	% (w/w)	----	<0.001	<0.001	<0.001	<0.001
ø Asbestos Containing Material	1332-21-4	0.1	g	----	<0.1	<0.1	<0.1	<0.1
ø Asbestos Containing Material (as 15% Asbestos in ACM >7mm)	1332-21-4	0.01	% (w/w)	----	<0.01	<0.01	<0.01	<0.01
ø Weight Used for % Calculation	----	0.0001	kg	----	0.284	0.149	0.214	0.542
EG005T: Total Metals by ICP-AES								
Arsenic	7440-38-2	5	mg/kg	<5	10	11	<5	<5
Cadmium	7440-43-9	1	mg/kg	<1	<1	<1	<1	<1
Chromium	7440-47-3	2	mg/kg	<2	4	268	2	3
Copper	7440-50-8	5	mg/kg	<5	22	48	12	<5
Lead	7439-92-1	5	mg/kg	<5	273	254	12	<5
Nickel	7440-02-0	2	mg/kg	<2	2	13	<2	3
Zinc	7440-66-6	5	mg/kg	12	81	160	49	11
EG035T: Total Recoverable Mercury by FIMS								
Mercury	7439-97-6	0.1	mg/kg	<0.1	<0.1	2.0	<0.1	<0.1
EP066: Polychlorinated Biphenyls (PCB)								
Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
EP068A: Organochlorine Pesticides (OC)								
alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
delta-BHC	319-86-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
Heptachlor	76-44-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH25@1.00	BH22@1.00	BH03@1.00	BH05@1.00	BH04@0.20
				Client sampling date / time	12-Dec-2018 00:00	12-Dec-2018 00:00	12-Dec-2018 00:00	12-Dec-2018 00:00	12-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-029	ES1838118-031	ES1838118-035	ES1838118-038	ES1838118-041
					Result	Result	Result	Result	Result
EP068A: Organochlorine Pesticides (OC) - Continued									
Aldrin	309-00-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Heptachlor epoxide	1024-57-3	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
^ Total Chlordane (sum)	----	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
trans-Chlordane	5103-74-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
alpha-Endosulfan	959-98-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
cis-Chlordane	5103-71-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Dieldrin	60-57-1	0.05	mg/kg		<0.05	<0.05	**0.24**	<0.05	<0.05
4.4`-DDE	72-55-9	0.05	mg/kg		<0.05	<0.05	**0.11**	<0.05	<0.05
Endrin	72-20-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
beta-Endosulfan	33213-65-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
^ Endosulfan (sum)	115-29-7	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
4.4`-DDD	72-54-8	0.05	mg/kg		<0.05	<0.05	**0.14**	<0.05	<0.05
Endrin aldehyde	7421-93-4	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Endosulfan sulfate	1031-07-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
4.4`-DDT	50-29-3	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Endrin ketone	53494-70-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Methoxychlor	72-43-5	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
^ Sum of Aldrin + Dieldrin	309-00-2/60-57-1	0.05	mg/kg		<0.05	<0.05	**0.24**	<0.05	<0.05
^ Sum of DDD + DDE + DDT	72-54-8/72-55-9/50-2	0.05	mg/kg		<0.05	<0.05	**0.25**	<0.05	<0.05
EP068B: Organophosphorus Pesticides (OP)									
Dichlorvos	62-73-7	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Demeton-S-methyl	919-86-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Monocrotophos	6923-22-4	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Dimethoate	60-51-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Diazinon	333-41-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Parathion-methyl	298-00-0	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Malathion	121-75-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Fenthion	55-38-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Chlorpyrifos	2921-88-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Parathion	56-38-2	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Pirimphos-ethyl	23505-41-1	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Chlorfenvinphos	470-90-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Bromophos-ethyl	4824-78-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH25@1.00	BH22@1.00	BH03@1.00	BH05@1.00	BH04@0.20
				Client sampling date / time	12-Dec-2018 00:00	12-Dec-2018 00:00	12-Dec-2018 00:00	12-Dec-2018 00:00	12-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-029	ES1838118-031	ES1838118-035	ES1838118-038	ES1838118-041
					Result	Result	Result	Result	Result
EP068B: Organophosphorus Pesticides (OP) - Continued									
Fenamiphos	22224-92-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Prothiofos	34643-46-4	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Ethion	563-12-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Carbophenothion	786-19-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Azinphos Methyl	86-50-0	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
EP074A: Monocyclic Aromatic Hydrocarbons									
Styrene	100-42-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Isopropylbenzene	98-82-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
n-Propylbenzene	103-65-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
sec-Butylbenzene	135-98-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
tert-Butylbenzene	98-06-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
p-Isopropyltoluene	99-87-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
n-Butylbenzene	104-51-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074B: Oxygenated Compounds									
Vinyl Acetate	108-05-4	5	mg/kg		<5	<5	<5	<5	<5
2-Butanone (MEK)	78-93-3	5	mg/kg		<5	<5	<5	<5	<5
4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg		<5	<5	<5	<5	<5
2-Hexanone (MBK)	591-78-6	5	mg/kg		<5	<5	<5	<5	<5
EP074C: Sulfonated Compounds									
Carbon disulfide	75-15-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074D: Fumigants									
2.2-Dichloropropane	594-20-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichloropropane	78-87-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074E: Halogenated Aliphatic Compounds									
Dichlorodifluoromethane	75-71-8	5	mg/kg		<5	<5	<5	<5	<5
Chloromethane	74-87-3	5	mg/kg		<5	<5	<5	<5	<5
Vinyl chloride	75-01-4	5	mg/kg		<5	<5	<5	<5	<5
Bromomethane	74-83-9	5	mg/kg		<5	<5	<5	<5	<5
Chloroethane	75-00-3	5	mg/kg		<5	<5	<5	<5	<5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH25@1.00	BH22@1.00	BH03@1.00	BH05@1.00	BH04@0.20
				Client sampling date / time	12-Dec-2018 00:00	12-Dec-2018 00:00	12-Dec-2018 00:00	12-Dec-2018 00:00	12-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-029	ES1838118-031	ES1838118-035	ES1838118-038	ES1838118-041
					Result	Result	Result	Result	Result
EP074E: Halogenated Aliphatic Compounds - Continued									
Trichlorofluoromethane	75-69-4	5	mg/kg		<5	<5	<5	<5	<5
1.1-Dichloroethene	75-35-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Iodomethane	74-88-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1-Dichloroethane	75-34-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.1-Trichloroethane	71-55-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1-Dichloropropylene	563-58-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Carbon Tetrachloride	56-23-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichloroethane	107-06-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Trichloroethene	79-01-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dibromomethane	74-95-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.2-Trichloroethane	79-00-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.3-Dichloropropane	142-28-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Tetrachloroethene	127-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.3-Trichloropropane	96-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pentachloroethane	76-01-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074F: Halogenated Aromatic Compounds									
Chlorobenzene	108-90-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bromobenzene	108-86-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Chlorotoluene	95-49-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chlorotoluene	106-43-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074G: Trihalomethanes									
Chloroform	67-66-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bromodichloromethane	75-27-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dibromochloromethane	124-48-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bromoform	75-25-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075A: Phenolic Compounds									

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH25@1.00	BH22@1.00	BH03@1.00	BH05@1.00	BH04@0.20
				Client sampling date / time	12-Dec-2018 00:00	12-Dec-2018 00:00	12-Dec-2018 00:00	12-Dec-2018 00:00	12-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-029	ES1838118-031	ES1838118-035	ES1838118-038	ES1838118-041
					Result	Result	Result	Result	Result
EP075A: Phenolic Compounds - Continued									
Phenol	108-95-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Chlorophenol	95-57-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Methylphenol	95-48-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
3- & 4-Methylphenol	1319-77-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Nitrophenol	88-75-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.4-Dimethylphenol	105-67-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.4-Dichlorophenol	120-83-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.6-Dichlorophenol	87-65-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pentachlorophenol	87-86-5	1	mg/kg		<1	<1	<1	<1	<1
EP075B: Polynuclear Aromatic Hydrocarbons									
Naphthalene	91-20-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Methylnaphthalene	91-57-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Chloronaphthalene	91-58-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Acenaphthylene	208-96-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Acenaphthene	83-32-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Fluorene	86-73-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Phenanthrene	85-01-8	0.5	mg/kg		<0.5	<0.5	**0.9**	<0.5	<0.5
Anthracene	120-12-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Fluoranthene	206-44-0	0.5	mg/kg		<0.5	**1.1**	**1.7**	<0.5	<0.5
Pyrene	129-00-0	0.5	mg/kg		<0.5	**1.1**	**1.6**	<0.5	<0.5
N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Benz(a)anthracene	56-55-3	0.5	mg/kg		<0.5	**0.5**	**0.9**	<0.5	<0.5
Chrysene	218-01-9	0.5	mg/kg		<0.5	<0.5	**0.7**	<0.5	<0.5
Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg		<1	**1**	**1**	<1	<1
7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Benzo(a)pyrene	50-32-8	0.5	mg/kg		<0.5	<0.5	**0.6**	<0.5	<0.5
3-Methylcholanthrene	56-49-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg		<0.5	**0.5**	**0.5**	<0.5	<0.5
^ Sum of PAHs	----	0.5	mg/kg		<0.5	**4.2**	**7.9**	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH25@1.00	BH22@1.00	BH03@1.00	BH05@1.00	BH04@0.20
				Client sampling date / time	12-Dec-2018 00:00	12-Dec-2018 00:00	12-Dec-2018 00:00	12-Dec-2018 00:00	12-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-029	ES1838118-031	ES1838118-035	ES1838118-038	ES1838118-041
					Result	Result	Result	Result	Result
EP075B: Polynuclear Aromatic Hydrocarbons - Continued									
^ Benzo(a)pyrene TEQ (zero)	----	0.5	mg/kg		<0.5	<0.5	**0.8**	<0.5	<0.5
^ Benzo(a)pyrene TEQ (half LOR)	----	0.5	mg/kg		**0.6**	**0.7**	**1.1**	**0.6**	**0.6**
^ Benzo(a)pyrene TEQ (LOR)	----	0.5	mg/kg		**1.2**	**1.2**	**1.4**	**1.2**	**1.2**
EP075C: Phthalate Esters									
Dimethyl phthalate	131-11-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Diethyl phthalate	84-66-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Di-n-butyl phthalate	84-74-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Butyl benzyl phthalate	85-68-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
bis(2-ethylhexyl) phthalate	117-81-7	5.0	mg/kg		<5.0	<5.0	<5.0	<5.0	<5.0
Di-n-octylphthalate	117-84-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075D: Nitrosamines									
N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodiethylamine	55-18-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosopyrrolidine	930-55-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
N-Nitrosomorpholine	59-89-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosopiperidine	100-75-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodibutylamine	924-16-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
Methapyrilene	91-80-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075E: Nitroaromatics and Ketones									
2-Picoline	109-06-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Acetophenone	98-86-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Nitrobenzene	98-95-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Isophorone	78-59-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.6-Dinitrotoluene	606-20-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
2.4-Dinitrotoluene	121-14-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
1-Naphthylamine	134-32-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
5-Nitro-o-toluidine	99-55-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Azobenzene	103-33-3	1	mg/kg		<1	<1	<1	<1	<1
1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Phenacetin	62-44-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH25@1.00	BH22@1.00	BH03@1.00	BH05@1.00	BH04@0.20
			Client sampling date / time	12-Dec-2018 00:00	12-Dec-2018 00:00	12-Dec-2018 00:00	12-Dec-2018 00:00	12-Dec-2018 00:00
Compound	CAS Number	LOR	Unit	ES1838118-029	ES1838118-031	ES1838118-035	ES1838118-038	ES1838118-041
				Result	Result	Result	Result	Result
EP075E: Nitroaromatics and Ketones - Continued								
4-Aminobiphenyl	92-67-1	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Pentachloronitrobenzene	82-68-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Pronamide	23950-58-5	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Dimethylaminoazobenzene	60-11-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Chlorobenzilate	510-15-6	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
EP075F: Haloethers								
Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
EP075G: Chlorinated Hydrocarbons								
1.3-Dichlorobenzene	541-73-1	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
1.4-Dichlorobenzene	106-46-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichlorobenzene	95-50-1	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Hexachloroethane	67-72-1	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Hexachloropropylene	1888-71-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorobutadiene	87-68-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg	<2.5	<2.5	<2.5	<2.5	<2.5
Pentachlorobenzene	608-93-5	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorobenzene (HCB)	118-74-1	1.0	mg/kg	<1.0	<1.0	<1.0	<1.0	<1.0
EP075H: Anilines and Benzidines								
Aniline	62-53-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
4-Chloroaniline	106-47-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2-Nitroaniline	88-74-4	1.0	mg/kg	<1.0	<1.0	<1.0	<1.0	<1.0
3-Nitroaniline	99-09-2	1.0	mg/kg	<1.0	<1.0	<1.0	<1.0	<1.0
Dibenzofuran	132-64-9	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
4-Nitroaniline	100-01-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Carbazole	86-74-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
EP075I: Organochlorine Pesticides								
alpha-BHC	319-84-6	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
beta-BHC	319-85-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
gamma-BHC	58-89-9	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH25@1.00	BH22@1.00	BH03@1.00	BH05@1.00	BH04@0.20
				Client sampling date / time	12-Dec-2018 00:00	12-Dec-2018 00:00	12-Dec-2018 00:00	12-Dec-2018 00:00	12-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-029	ES1838118-031	ES1838118-035	ES1838118-038	ES1838118-041
					Result	Result	Result	Result	Result
EP075I: Organochlorine Pesticides - Continued									
delta-BHC	319-86-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Heptachlor	76-44-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Aldrin	309-00-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Heptachlor epoxide	1024-57-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
alpha-Endosulfan	959-98-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4.4`-DDE	72-55-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dieldrin	60-57-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Endrin	72-20-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
beta-Endosulfan	33213-65-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4.4`-DDD	72-54-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Endosulfan sulfate	1031-07-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4.4`-DDT	50-29-3	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
EP075J: Organophosphorus Pesticides									
Dichlorvos	62-73-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dimethoate	60-51-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Diazinon	333-41-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorpyrifos-methyl	5598-13-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Malathion	121-75-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Fenthion	55-38-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorpyrifos	2921-88-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pirimphos-ethyl	23505-41-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorfenvinphos	470-90-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Prothiofos	34643-46-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Ethion	563-12-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP080/071: Total Petroleum Hydrocarbons									
C6 - C9 Fraction	----	10	mg/kg		<10	<10	<10	<10	<10
C10 - C14 Fraction	----	50	mg/kg		<50	<50	<50	<50	<50
C15 - C28 Fraction	----	100	mg/kg		<100	<100	**110**	<100	<100
C29 - C36 Fraction	----	100	mg/kg		<100	<100	**110**	<100	<100
^ C10 - C36 Fraction (sum)	----	50	mg/kg		<50	<50	**220**	<50	<50
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions									
C6 - C10 Fraction	C6_C10	10	mg/kg		<10	<10	<10	<10	<10
^ C6 - C10 Fraction minus BTEX (F1)	C6_C10-BTEX	10	mg/kg		<10	<10	<10	<10	<10

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH25@1.00	BH22@1.00	BH03@1.00	BH05@1.00	BH04@0.20
				Client sampling date / time	12-Dec-2018 00:00	12-Dec-2018 00:00	12-Dec-2018 00:00	12-Dec-2018 00:00	12-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-029	ES1838118-031	ES1838118-035	ES1838118-038	ES1838118-041
					Result	Result	Result	Result	Result
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions - Continued									
>C10 - C16 Fraction	----	50	mg/kg		<50	<50	<50	<50	<50
>C16 - C34 Fraction	----	100	mg/kg		<100	<100	**180**	<100	<100
>C34 - C40 Fraction	----	100	mg/kg		<100	<100	<100	<100	<100
^ **>C10 - C40 Fraction (sum)**	----	50	mg/kg		<50	<50	**180**	<50	<50
^ **>C10 - C16 Fraction minus Naphthalene (F2)**	----	50	mg/kg		<50	<50	<50	<50	<50
EP080: BTEXN									
Benzene	71-43-2	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Toluene	108-88-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Ethylbenzene	100-41-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
ortho-Xylene	95-47-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
^ **Sum of BTEX**	----	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
^ **Total Xylenes**	----	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Naphthalene	91-20-3	1	mg/kg		<1	<1	<1	<1	<1
EP066S: PCB Surrogate									
Decachlorobiphenyl	2051-24-3	0.1	%		**120**	**92.8**	**105**	**102**	**115**
EP068S: Organochlorine Pesticide Surrogate									
Dibromo-DDE	21655-73-2	0.05	%		**115**	**92.5**	**89.7**	**106**	**120**
EP068T: Organophosphorus Pesticide Surrogate									
DEF	78-48-8	0.05	%		**73.9**	**66.9**	**76.2**	**70.6**	**85.4**
EP074S: VOC Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.5	%		**119**	**121**	**113**	**122**	**122**
Toluene-D8	2037-26-5	0.5	%		**99.4**	**104**	**93.3**	**104**	**105**
4-Bromofluorobenzene	460-00-4	0.5	%		**101**	**102**	**88.7**	**101**	**101**
EP075S: Acid Extractable Surrogates									
2-Fluorophenol	367-12-4	0.5	%		**100**	**86.2**	**96.3**	**89.9**	**94.4**
Phenol-d6	13127-88-3	0.5	%		**96.5**	**89.7**	**80.9**	**87.8**	**90.5**
2-Chlorophenol-D4	93951-73-6	0.5	%		**109**	**94.2**	**99.0**	**97.0**	**102**
2.4.6-Tribromophenol	118-79-6	0.5	%		**53.8**	**69.1**	**113**	**53.6**	**56.6**
EP075T: Base/Neutral Extractable Surrogates									
Nitrobenzene-D5	4165-60-0	0.5	%		**105**	**90.8**	**95.8**	**100**	**96.4**
1.2-Dichlorobenzene-D4	2199-69-1	0.5	%		**102**	**80.8**	**92.3**	**95.8**	**91.1**
2-Fluorobiphenyl	321-60-8	0.5	%		**115**	**114**	**109**	**120**	**106**

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH25@1.00	BH22@1.00	BH03@1.00	BH05@1.00	BH04@0.20
				Client sampling date / time	12-Dec-2018 00:00	12-Dec-2018 00:00	12-Dec-2018 00:00	12-Dec-2018 00:00	12-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838118-029	ES1838118-031	ES1838118-035	ES1838118-038	ES1838118-041
					Result	Result	Result	Result	Result
EP075T: Base/Neutral Extractable Surrogates - Continued									
Anthracene-d10	1719-06-8	0.5	%		**116**	**110**	**106**	**108**	**109**
4-Terphenyl-d14	1718-51-0	0.5	%		**78.0**	**125**	**124**	**122**	**118**
EP080S: TPH(V)/BTEX Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.2	%		**121**	**123**	**114**	**125**	**124**
Toluene-D8	2037-26-5	0.2	%		**95.2**	**99.8**	**89.7**	**99.8**	**101**
4-Bromofluorobenzene	460-00-4	0.2	%		**97.7**	**98.6**	**86.6**	**98.3**	**98.9**

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	MW01@1.00	MW01@4.00	----	----	----
			Client sampling date / time	12-Dec-2018 00:00	12-Dec-2018 00:00	----	----	----
Compound	CAS Number	LOR	Unit	ES1838118-045	ES1838118-047	--------	--------	--------
				Result	Result	----	----	----
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	----	1.0	%	**10.0**	**21.4**	----	----	----
EA200: AS 4964 - 2004 Identification of Asbestos in Soils								
Asbestos Detected	1332-21-4	0.1	g/kg	**No**	----	----	----	----
Asbestos (Trace)	1332-21-4	5	Fibres	**No**	----	----	----	----
Asbestos Type	1332-21-4	-	--	**-**	----	----	----	----
Sample weight (dry)	----	0.01	g	**182**	----	----	----	----
APPROVED IDENTIFIER:	----	-	--	**A. SMYLIE**	----	----	----	----
EA200N: Asbestos Quantification (non-NATA)								
ø Asbestos (Fines and Fibrous <7mm)	1332-21-4	0.0004	g	<0.0004	----	----	----	----
ø Asbestos (Fines and Fibrous FA+AF)	----	0.001	% (w/w)	<0.001	----	----	----	----
ø Asbestos Containing Material	1332-21-4	0.1	g	<0.1	----	----	----	----
ø Asbestos Containing Material (as 15% Asbestos in ACM >7mm)	1332-21-4	0.01	% (w/w)	<0.01	----	----	----	----
ø Weight Used for % Calculation	----	0.0001	kg	**0.182**	----	----	----	----
EG005T: Total Metals by ICP-AES								
Arsenic	7440-38-2	5	mg/kg	<5	<5	----	----	----
Cadmium	7440-43-9	1	mg/kg	<1	<1	----	----	----
Chromium	7440-47-3	2	mg/kg	<2	<2	----	----	----
Copper	7440-50-8	5	mg/kg	<5	<5	----	----	----
Lead	7439-92-1	5	mg/kg	<5	<5	----	----	----
Nickel	7440-02-0	2	mg/kg	<2	<2	----	----	----
Zinc	7440-66-6	5	mg/kg	**14**	**75**	----	----	----
EG035T: Total Recoverable Mercury by FIMS								
Mercury	7439-97-6	0.1	mg/kg	<0.1	<0.1	----	----	----
EP066: Polychlorinated Biphenyls (PCB)								
Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	<0.1	----	----	----
EP068A: Organochlorine Pesticides (OC)								
alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	----	----	----
Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	----	----	----
beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	----	----	----
gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	----	----	----
delta-BHC	319-86-8	0.05	mg/kg	<0.05	<0.05	----	----	----
Heptachlor	76-44-8	0.05	mg/kg	<0.05	<0.05	----	----	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	MW01@1.00	MW01@4.00	----	----	----
			Client sampling date / time	12-Dec-2018 00:00	12-Dec-2018 00:00	----	----	----
Compound	CAS Number	LOR	Unit	ES1838118-045	ES1838118-047	--------	--------	--------
				Result	Result	----	----	----
EP068A: Organochlorine Pesticides (OC) - Continued								
Aldrin	309-00-2	0.05	mg/kg	<0.05	<0.05	----	----	----
Heptachlor epoxide	1024-57-3	0.05	mg/kg	<0.05	<0.05	----	----	----
^ **Total Chlordane (sum)**	----	0.05	mg/kg	<0.05	<0.05	----	----	----
trans-Chlordane	5103-74-2	0.05	mg/kg	<0.05	<0.05	----	----	----
alpha-Endosulfan	959-98-8	0.05	mg/kg	<0.05	<0.05	----	----	----
cis-Chlordane	5103-71-9	0.05	mg/kg	<0.05	<0.05	----	----	----
Dieldrin	60-57-1	0.05	mg/kg	<0.05	<0.05	----	----	----
4.4`-DDE	72-55-9	0.05	mg/kg	<0.05	<0.05	----	----	----
Endrin	72-20-8	0.05	mg/kg	<0.05	<0.05	----	----	----
beta-Endosulfan	33213-65-9	0.05	mg/kg	<0.05	<0.05	----	----	----
^ **Endosulfan (sum)**	115-29-7	0.05	mg/kg	<0.05	<0.05	----	----	----
4.4`-DDD	72-54-8	0.05	mg/kg	<0.05	<0.05	----	----	----
Endrin aldehyde	7421-93-4	0.05	mg/kg	<0.05	<0.05	----	----	----
Endosulfan sulfate	1031-07-8	0.05	mg/kg	<0.05	<0.05	----	----	----
4.4`-DDT	50-29-3	0.2	mg/kg	<0.2	<0.2	----	----	----
Endrin ketone	53494-70-5	0.05	mg/kg	<0.05	<0.05	----	----	----
Methoxychlor	72-43-5	0.2	mg/kg	<0.2	<0.2	----	----	----
^ **Sum of Aldrin + Dieldrin**	309-00-2/60-57-1	0.05	mg/kg	<0.05	<0.05	----	----	----
^ **Sum of DDD + DDE + DDT**	72-54-8/72-55-9/50-2	0.05	mg/kg	<0.05	<0.05	----	----	----
EP068B: Organophosphorus Pesticides (OP)								
Dichlorvos	62-73-7	0.05	mg/kg	<0.05	<0.05	----	----	----
Demeton-S-methyl	919-86-8	0.05	mg/kg	<0.05	<0.05	----	----	----
Monocrotophos	6923-22-4	0.2	mg/kg	<0.2	<0.2	----	----	----
Dimethoate	60-51-5	0.05	mg/kg	<0.05	<0.05	----	----	----
Diazinon	333-41-5	0.05	mg/kg	<0.05	<0.05	----	----	----
Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg	<0.05	<0.05	----	----	----
Parathion-methyl	298-00-0	0.2	mg/kg	<0.2	<0.2	----	----	----
Malathion	121-75-5	0.05	mg/kg	<0.05	<0.05	----	----	----
Fenthion	55-38-9	0.05	mg/kg	<0.05	<0.05	----	----	----
Chlorpyrifos	2921-88-2	0.05	mg/kg	<0.05	<0.05	----	----	----
Parathion	56-38-2	0.2	mg/kg	<0.2	<0.2	----	----	----
Pirimphos-ethyl	23505-41-1	0.05	mg/kg	<0.05	<0.05	----	----	----
Chlorfenvinphos	470-90-6	0.05	mg/kg	<0.05	<0.05	----	----	----
Bromophos-ethyl	4824-78-6	0.05	mg/kg	<0.05	<0.05	----	----	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	MW01@1.00	MW01@4.00	----	----	----
				Client sampling date / time	12-Dec-2018 00:00	12-Dec-2018 00:00	----	----	----
Compound	CAS Number	LOR	Unit		ES1838118-045	ES1838118-047	--------	--------	--------
					Result	Result	----	----	----
EP068B: Organophosphorus Pesticides (OP) - Continued									
Fenamiphos	22224-92-6	0.05	mg/kg		<0.05	<0.05	----	----	----
Prothiofos	34643-46-4	0.05	mg/kg		<0.05	<0.05	----	----	----
Ethion	563-12-2	0.05	mg/kg		<0.05	<0.05	----	----	----
Carbophenothion	786-19-6	0.05	mg/kg		<0.05	<0.05	----	----	----
Azinphos Methyl	86-50-0	0.05	mg/kg		<0.05	<0.05	----	----	----
EP074A: Monocyclic Aromatic Hydrocarbons									
Styrene	100-42-5	0.5	mg/kg		<0.5	<0.5	----	----	----
Isopropylbenzene	98-82-8	0.5	mg/kg		<0.5	<0.5	----	----	----
n-Propylbenzene	103-65-1	0.5	mg/kg		<0.5	<0.5	----	----	----
1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg		<0.5	<0.5	----	----	----
sec-Butylbenzene	135-98-8	0.5	mg/kg		<0.5	<0.5	----	----	----
1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg		<0.5	<0.5	----	----	----
tert-Butylbenzene	98-06-6	0.5	mg/kg		<0.5	<0.5	----	----	----
p-Isopropyltoluene	99-87-6	0.5	mg/kg		<0.5	<0.5	----	----	----
n-Butylbenzene	104-51-8	0.5	mg/kg		<0.5	<0.5	----	----	----
EP074B: Oxygenated Compounds									
Vinyl Acetate	108-05-4	5	mg/kg		<5	<5	----	----	----
2-Butanone (MEK)	78-93-3	5	mg/kg		<5	<5	----	----	----
4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg		<5	<5	----	----	----
2-Hexanone (MBK)	591-78-6	5	mg/kg		<5	<5	----	----	----
EP074C: Sulfonated Compounds									
Carbon disulfide	75-15-0	0.5	mg/kg		<0.5	<0.5	----	----	----
EP074D: Fumigants									
2.2-Dichloropropane	594-20-7	0.5	mg/kg		<0.5	<0.5	----	----	----
1.2-Dichloropropane	78-87-5	0.5	mg/kg		<0.5	<0.5	----	----	----
cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg		<0.5	<0.5	----	----	----
trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg		<0.5	<0.5	----	----	----
1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg		<0.5	<0.5	----	----	----
EP074E: Halogenated Aliphatic Compounds									
Dichlorodifluoromethane	75-71-8	5	mg/kg		<5	<5	----	----	----
Chloromethane	74-87-3	5	mg/kg		<5	<5	----	----	----
Vinyl chloride	75-01-4	5	mg/kg		<5	<5	----	----	----
Bromomethane	74-83-9	5	mg/kg		<5	<5	----	----	----
Chloroethane	75-00-3	5	mg/kg		<5	<5	----	----	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	MW01@1.00	MW01@4.00	----	----	----
			Client sampling date / time	12-Dec-2018 00:00	12-Dec-2018 00:00	----	----	----
Compound	CAS Number	LOR	Unit	ES1838118-045	ES1838118-047	--------	--------	--------
				Result	Result	----	----	----
EP074E: Halogenated Aliphatic Compounds - Continued								
Trichlorofluoromethane	75-69-4	5	mg/kg	<5	<5	----	----	----
1.1-Dichloroethene	75-35-4	0.5	mg/kg	<0.5	<0.5	----	----	----
Iodomethane	74-88-4	0.5	mg/kg	<0.5	<0.5	----	----	----
trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg	<0.5	<0.5	----	----	----
1.1-Dichloroethane	75-34-3	0.5	mg/kg	<0.5	<0.5	----	----	----
cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg	<0.5	<0.5	----	----	----
1.1.1-Trichloroethane	71-55-6	0.5	mg/kg	<0.5	<0.5	----	----	----
1.1-Dichloropropylene	563-58-6	0.5	mg/kg	<0.5	<0.5	----	----	----
Carbon Tetrachloride	56-23-5	0.5	mg/kg	<0.5	<0.5	----	----	----
1.2-Dichloroethane	107-06-2	0.5	mg/kg	<0.5	<0.5	----	----	----
Trichloroethene	79-01-6	0.5	mg/kg	<0.5	<0.5	----	----	----
Dibromomethane	74-95-3	0.5	mg/kg	<0.5	<0.5	----	----	----
1.1.2-Trichloroethane	79-00-5	0.5	mg/kg	<0.5	<0.5	----	----	----
1.3-Dichloropropane	142-28-9	0.5	mg/kg	<0.5	<0.5	----	----	----
Tetrachloroethene	127-18-4	0.5	mg/kg	<0.5	<0.5	----	----	----
1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg	<0.5	<0.5	----	----	----
trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg	<0.5	<0.5	----	----	----
cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg	<0.5	<0.5	----	----	----
1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg	<0.5	<0.5	----	----	----
1.2.3-Trichloropropane	96-18-4	0.5	mg/kg	<0.5	<0.5	----	----	----
Pentachloroethane	76-01-7	0.5	mg/kg	<0.5	<0.5	----	----	----
1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg	<0.5	<0.5	----	----	----
EP074F: Halogenated Aromatic Compounds								
Chlorobenzene	108-90-7	0.5	mg/kg	<0.5	<0.5	----	----	----
Bromobenzene	108-86-1	0.5	mg/kg	<0.5	<0.5	----	----	----
2-Chlorotoluene	95-49-8	0.5	mg/kg	<0.5	<0.5	----	----	----
4-Chlorotoluene	106-43-4	0.5	mg/kg	<0.5	<0.5	----	----	----
1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg	<0.5	<0.5	----	----	----
EP074G: Trihalomethanes								
Chloroform	67-66-3	0.5	mg/kg	<0.5	<0.5	----	----	----
Bromodichloromethane	75-27-4	0.5	mg/kg	<0.5	<0.5	----	----	----
Dibromochloromethane	124-48-1	0.5	mg/kg	<0.5	<0.5	----	----	----
Bromoform	75-25-2	0.5	mg/kg	<0.5	<0.5	----	----	----
EP075A: Phenolic Compounds								

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	MW01@1.00	MW01@4.00	----	----	----
			Client sampling date / time	12-Dec-2018 00:00	12-Dec-2018 00:00	----	----	----
Compound	CAS Number	LOR	Unit	ES1838118-045	ES1838118-047	--------	--------	--------
				Result	Result	----	----	----
EP075A: Phenolic Compounds - Continued								
Phenol	108-95-2	0.5	mg/kg	<0.5	<0.5	----	----	----
2-Chlorophenol	95-57-8	0.5	mg/kg	<0.5	<0.5	----	----	----
2-Methylphenol	95-48-7	0.5	mg/kg	<0.5	<0.5	----	----	----
3- & 4-Methylphenol	1319-77-3	0.5	mg/kg	<0.5	<0.5	----	----	----
2-Nitrophenol	88-75-5	0.5	mg/kg	<0.5	<0.5	----	----	----
2.4-Dimethylphenol	105-67-9	0.5	mg/kg	<0.5	<0.5	----	----	----
2.4-Dichlorophenol	120-83-2	0.5	mg/kg	<0.5	<0.5	----	----	----
2.6-Dichlorophenol	87-65-0	0.5	mg/kg	<0.5	<0.5	----	----	----
4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg	<0.5	<0.5	----	----	----
2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg	<0.5	<0.5	----	----	----
2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg	<0.5	<0.5	----	----	----
Pentachlorophenol	87-86-5	1	mg/kg	<1	<1	----	----	----
EP075B: Polynuclear Aromatic Hydrocarbons								
Naphthalene	91-20-3	0.5	mg/kg	<0.5	<0.5	----	----	----
2-Methylnaphthalene	91-57-6	0.5	mg/kg	<0.5	<0.5	----	----	----
2-Chloronaphthalene	91-58-7	0.5	mg/kg	<0.5	<0.5	----	----	----
Acenaphthylene	208-96-8	0.5	mg/kg	<0.5	<0.5	----	----	----
Acenaphthene	83-32-9	0.5	mg/kg	<0.5	<0.5	----	----	----
Fluorene	86-73-7	0.5	mg/kg	<0.5	<0.5	----	----	----
Phenanthrene	85-01-8	0.5	mg/kg	<0.5	<0.5	----	----	----
Anthracene	120-12-7	0.5	mg/kg	<0.5	<0.5	----	----	----
Fluoranthene	206-44-0	0.5	mg/kg	<0.5	<0.5	----	----	----
Pyrene	129-00-0	0.5	mg/kg	<0.5	<0.5	----	----	----
N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg	<0.5	<0.5	----	----	----
Benz(a)anthracene	56-55-3	0.5	mg/kg	<0.5	<0.5	----	----	----
Chrysene	218-01-9	0.5	mg/kg	<0.5	<0.5	----	----	----
Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg	<1	<1	----	----	----
7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg	<0.5	<0.5	----	----	----
Benzo(a)pyrene	50-32-8	0.5	mg/kg	<0.5	<0.5	----	----	----
3-Methylcholanthrene	56-49-5	0.5	mg/kg	<0.5	<0.5	----	----	----
Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg	<0.5	<0.5	----	----	----
Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg	<0.5	<0.5	----	----	----
Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg	<0.5	<0.5	----	----	----
^ Sum of PAHs	----	0.5	mg/kg	<0.5	<0.5	----	----	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	MW01@1.00	MW01@4.00	----	----	----
				Client sampling date / time	12-Dec-2018 00:00	12-Dec-2018 00:00	----	----	----
Compound	CAS Number	LOR	Unit		ES1838118-045	ES1838118-047	--------	--------	--------
					Result	Result	----	----	----
EP075B: Polynuclear Aromatic Hydrocarbons - Continued									
^ Benzo(a)pyrene TEQ (zero)	----	0.5	mg/kg		<0.5	<0.5	----	----	----
^ Benzo(a)pyrene TEQ (half LOR)	----	0.5	mg/kg		**0.6**	**0.6**	----	----	----
^ Benzo(a)pyrene TEQ (LOR)	----	0.5	mg/kg		**1.2**	**1.2**	----	----	----
EP075C: Phthalate Esters									
Dimethyl phthalate	131-11-3	0.5	mg/kg		<0.5	<0.5	----	----	----
Diethyl phthalate	84-66-2	0.5	mg/kg		<0.5	<0.5	----	----	----
Di-n-butyl phthalate	84-74-2	0.5	mg/kg		<0.5	<0.5	----	----	----
Butyl benzyl phthalate	85-68-7	0.5	mg/kg		<0.5	<0.5	----	----	----
bis(2-ethylhexyl) phthalate	117-81-7	5.0	mg/kg		<5.0	<5.0	----	----	----
Di-n-octylphthalate	117-84-0	0.5	mg/kg		<0.5	<0.5	----	----	----
EP075D: Nitrosamines									
N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg		<0.5	<0.5	----	----	----
N-Nitrosodiethylamine	55-18-5	0.5	mg/kg		<0.5	<0.5	----	----	----
N-Nitrosopyrrolidine	930-55-2	1.0	mg/kg		<1.0	<1.0	----	----	----
N-Nitrosomorpholine	59-89-2	0.5	mg/kg		<0.5	<0.5	----	----	----
N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg		<0.5	<0.5	----	----	----
N-Nitrosopiperidine	100-75-4	0.5	mg/kg		<0.5	<0.5	----	----	----
N-Nitrosodibutylamine	924-16-3	0.5	mg/kg		<0.5	<0.5	----	----	----
N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	1.0	mg/kg		<1.0	<1.0	----	----	----
Methapyrilene	91-80-5	0.5	mg/kg		<0.5	<0.5	----	----	----
EP075E: Nitroaromatics and Ketones									
2-Picoline	109-06-8	0.5	mg/kg		<0.5	<0.5	----	----	----
Acetophenone	98-86-2	0.5	mg/kg		<0.5	<0.5	----	----	----
Nitrobenzene	98-95-3	0.5	mg/kg		<0.5	<0.5	----	----	----
Isophorone	78-59-1	0.5	mg/kg		<0.5	<0.5	----	----	----
2.6-Dinitrotoluene	606-20-2	1.0	mg/kg		<1.0	<1.0	----	----	----
2.4-Dinitrotoluene	121-14-2	1.0	mg/kg		<1.0	<1.0	----	----	----
1-Naphthylamine	134-32-7	0.5	mg/kg		<0.5	<0.5	----	----	----
4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg		<0.5	<0.5	----	----	----
5-Nitro-o-toluidine	99-55-8	0.5	mg/kg		<0.5	<0.5	----	----	----
Azobenzene	103-33-3	1	mg/kg		<1	<1	----	----	----
1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg		<0.5	<0.5	----	----	----
Phenacetin	62-44-2	0.5	mg/kg		<0.5	<0.5	----	----	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	MW01@1.00	MW01@4.00	----	----	----
			Client sampling date / time	12-Dec-2018 00:00	12-Dec-2018 00:00	----	----	----
Compound	CAS Number	LOR	Unit	ES1838118-045	ES1838118-047	--------	--------	--------
				Result	Result	----	----	----
EP075E: Nitroaromatics and Ketones - Continued								
4-Aminobiphenyl	92-67-1	0.5	mg/kg	<0.5	<0.5	----	----	----
Pentachloronitrobenzene	82-68-8	0.5	mg/kg	<0.5	<0.5	----	----	----
Pronamide	23950-58-5	0.5	mg/kg	<0.5	<0.5	----	----	----
Dimethylaminoazobenzene	60-11-7	0.5	mg/kg	<0.5	<0.5	----	----	----
Chlorobenzilate	510-15-6	0.5	mg/kg	<0.5	<0.5	----	----	----
EP075F: Haloethers								
Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg	<0.5	<0.5	----	----	----
Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg	<0.5	<0.5	----	----	----
4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg	<0.5	<0.5	----	----	----
4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg	<0.5	<0.5	----	----	----
EP075G: Chlorinated Hydrocarbons								
1.3-Dichlorobenzene	541-73-1	0.5	mg/kg	<0.5	<0.5	----	----	----
1.4-Dichlorobenzene	106-46-7	0.5	mg/kg	<0.5	<0.5	----	----	----
1.2-Dichlorobenzene	95-50-1	0.5	mg/kg	<0.5	<0.5	----	----	----
Hexachloroethane	67-72-1	0.5	mg/kg	<0.5	<0.5	----	----	----
1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg	<0.5	<0.5	----	----	----
Hexachloropropylene	1888-71-7	0.5	mg/kg	<0.5	<0.5	----	----	----
Hexachlorobutadiene	87-68-3	0.5	mg/kg	<0.5	<0.5	----	----	----
Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg	<2.5	<2.5	----	----	----
Pentachlorobenzene	608-93-5	0.5	mg/kg	<0.5	<0.5	----	----	----
Hexachlorobenzene (HCB)	118-74-1	1.0	mg/kg	<1.0	<1.0	----	----	----
EP075H: Anilines and Benzidines								
Aniline	62-53-3	0.5	mg/kg	<0.5	<0.5	----	----	----
4-Chloroaniline	106-47-8	0.5	mg/kg	<0.5	<0.5	----	----	----
2-Nitroaniline	88-74-4	1.0	mg/kg	<1.0	<1.0	----	----	----
3-Nitroaniline	99-09-2	1.0	mg/kg	<1.0	<1.0	----	----	----
Dibenzofuran	132-64-9	0.5	mg/kg	<0.5	<0.5	----	----	----
4-Nitroaniline	100-01-8	0.5	mg/kg	<0.5	<0.5	----	----	----
Carbazole	86-74-8	0.5	mg/kg	<0.5	<0.5	----	----	----
3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg	<0.5	<0.5	----	----	----
EP075I: Organochlorine Pesticides								
alpha-BHC	319-84-6	0.5	mg/kg	<0.5	<0.5	----	----	----
beta-BHC	319-85-7	0.5	mg/kg	<0.5	<0.5	----	----	----
gamma-BHC	58-89-9	0.5	mg/kg	<0.5	<0.5	----	----	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	MW01@1.00	MW01@4.00	----	----	----
			Client sampling date / time	12-Dec-2018 00:00	12-Dec-2018 00:00	----	----	----
Compound	CAS Number	LOR	Unit	ES1838118-045	ES1838118-047	--------	--------	--------
				Result	Result	----	----	----
EP075I: Organochlorine Pesticides - Continued								
delta-BHC	319-86-8	0.5	mg/kg	<0.5	<0.5	----	----	----
Heptachlor	76-44-8	0.5	mg/kg	<0.5	<0.5	----	----	----
Aldrin	309-00-2	0.5	mg/kg	<0.5	<0.5	----	----	----
Heptachlor epoxide	1024-57-3	0.5	mg/kg	<0.5	<0.5	----	----	----
alpha-Endosulfan	959-98-8	0.5	mg/kg	<0.5	<0.5	----	----	----
4.4`-DDE	72-55-9	0.5	mg/kg	<0.5	<0.5	----	----	----
Dieldrin	60-57-1	0.5	mg/kg	<0.5	<0.5	----	----	----
Endrin	72-20-8	0.5	mg/kg	<0.5	<0.5	----	----	----
beta-Endosulfan	33213-65-9	0.5	mg/kg	<0.5	<0.5	----	----	----
4.4`-DDD	72-54-8	0.5	mg/kg	<0.5	<0.5	----	----	----
Endosulfan sulfate	1031-07-8	0.5	mg/kg	<0.5	<0.5	----	----	----
4.4`-DDT	50-29-3	1.0	mg/kg	<1.0	<1.0	----	----	----
EP075J: Organophosphorus Pesticides								
Dichlorvos	62-73-7	0.5	mg/kg	<0.5	<0.5	----	----	----
Dimethoate	60-51-5	0.5	mg/kg	<0.5	<0.5	----	----	----
Diazinon	333-41-5	0.5	mg/kg	<0.5	<0.5	----	----	----
Chlorpyrifos-methyl	5598-13-0	0.5	mg/kg	<0.5	<0.5	----	----	----
Malathion	121-75-5	0.5	mg/kg	<0.5	<0.5	----	----	----
Fenthion	55-38-9	0.5	mg/kg	<0.5	<0.5	----	----	----
Chlorpyrifos	2921-88-2	0.5	mg/kg	<0.5	<0.5	----	----	----
Pirimphos-ethyl	23505-41-1	0.5	mg/kg	<0.5	<0.5	----	----	----
Chlorfenvinphos	470-90-6	0.5	mg/kg	<0.5	<0.5	----	----	----
Prothiofos	34643-46-4	0.5	mg/kg	<0.5	<0.5	----	----	----
Ethion	563-12-2	0.5	mg/kg	<0.5	<0.5	----	----	----
EP080/071: Total Petroleum Hydrocarbons								
C6 - C9 Fraction	----	10	mg/kg	<10	<10	----	----	----
C10 - C14 Fraction	----	50	mg/kg	<50	<50	----	----	----
C15 - C28 Fraction	----	100	mg/kg	<100	<100	----	----	----
C29 - C36 Fraction	----	100	mg/kg	<100	<100	----	----	----
^ **C10 - C36 Fraction (sum)**	----	50	mg/kg	<50	<50	----	----	----
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions								
C6 - C10 Fraction	C6_C10	10	mg/kg	<10	<10	----	----	----
^ **C6 - C10 Fraction minus BTEX (F1)**	C6_C10-BTEX	10	mg/kg	<10	<10	----	----	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	MW01@1.00	MW01@4.00	----	----	----
				Client sampling date / time	12-Dec-2018 00:00	12-Dec-2018 00:00	----	----	----
Compound	CAS Number	LOR	Unit		ES1838118-045	ES1838118-047	--------	--------	--------
					Result	Result	----	----	----
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions - Continued									
>C10 - C16 Fraction	----	50	mg/kg		<50	<50	----	----	----
>C16 - C34 Fraction	----	100	mg/kg		<100	<100	----	----	----
>C34 - C40 Fraction	----	100	mg/kg		<100	<100	----	----	----
^ **>C10 - C40 Fraction (sum)**	----	50	mg/kg		<50	<50	----	----	----
^ **>C10 - C16 Fraction minus Naphthalene (F2)**	----	50	mg/kg		<50	<50	----	----	----
EP080: BTEXN									
Benzene	71-43-2	0.2	mg/kg		<0.2	<0.2	----	----	----
Toluene	108-88-3	0.5	mg/kg		<0.5	<0.5	----	----	----
Ethylbenzene	100-41-4	0.5	mg/kg		<0.5	<0.5	----	----	----
meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg		<0.5	<0.5	----	----	----
ortho-Xylene	95-47-6	0.5	mg/kg		<0.5	<0.5	----	----	----
^ **Sum of BTEX**	----	0.2	mg/kg		<0.2	<0.2	----	----	----
^ **Total Xylenes**	----	0.5	mg/kg		<0.5	<0.5	----	----	----
Naphthalene	91-20-3	1	mg/kg		<1	<1	----	----	----
EP231A: Perfluoroalkyl Sulfonic Acids									
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg		<0.0002	----	----	----	----
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg		<0.0002	----	----	----	----
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg		<0.0002	----	----	----	----
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg		<0.0002	----	----	----	----
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg		**0.0004**	----	----	----	----
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg		<0.0002	----	----	----	----
EP231B: Perfluoroalkyl Carboxylic Acids									
Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg		<0.001	----	----	----	----
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg		<0.0002	----	----	----	----
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg		<0.0002	----	----	----	----
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg		<0.0002	----	----	----	----
Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg		<0.0002	----	----	----	----
Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg		<0.0002	----	----	----	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	MW01@1.00	MW01@4.00	----	----	----
				Client sampling date / time	12-Dec-2018 00:00	12-Dec-2018 00:00	----	----	----
Compound	CAS Number	LOR	Unit		ES1838118-045	ES1838118-047	--------	--------	--------
					Result	Result	----	----	----
EP231B: Perfluoroalkyl Carboxylic Acids - Continued									
Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg		<0.0002	----	----	----	----
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg		<0.0002	----	----	----	----
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg		<0.0002	----	----	----	----
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg		<0.0002	----	----	----	----
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg		<0.0005	----	----	----	----
EP231C: Perfluoroalkyl Sulfonamides									
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg		<0.0002	----	----	----	----
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg		<0.0005	----	----	----	----
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg		<0.0005	----	----	----	----
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg		<0.0005	----	----	----	----
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg		<0.0005	----	----	----	----
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg		<0.0002	----	----	----	----
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg		<0.0002	----	----	----	----
EP231D: (n:2) Fluorotelomer Sulfonic Acids									
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg		<0.0005	----	----	----	----
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg		<0.0005	----	----	----	----
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg		<0.0005	----	----	----	----
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg		<0.0005	----	----	----	----
EP231P: PFAS Sums									

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	MW01@1.00	MW01@4.00	----	----	----
				Client sampling date / time	12-Dec-2018 00:00	12-Dec-2018 00:00	----	----	----
Compound	CAS Number	LOR	Unit		ES1838118-045	ES1838118-047	--------	--------	--------
					Result	Result	----	----	----
EP231P: PFAS Sums - Continued									
Sum of PFAS	----	0.0002	mg/kg		0.0004	----	----	----	----
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	mg/kg		0.0004	----	----	----	----
Sum of PFAS (WA DER List)	----	0.0002	mg/kg		0.0004	----	----	----	----
EP066S: PCB Surrogate									
Decachlorobiphenyl	2051-24-3	0.1	%		124	91.9	----	----	----
EP068S: Organochlorine Pesticide Surrogate									
Dibromo-DDE	21655-73-2	0.05	%		61.4	94.3	----	----	----
EP068T: Organophosphorus Pesticide Surrogate									
DEF	78-48-8	0.05	%		69.0	100	----	----	----
EP074S: VOC Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.5	%		126	82.5	----	----	----
Toluene-D8	2037-26-5	0.5	%		108	102	----	----	----
4-Bromofluorobenzene	460-00-4	0.5	%		104	99.4	----	----	----
EP075S: Acid Extractable Surrogates									
2-Fluorophenol	367-12-4	0.5	%		101	97.2	----	----	----
Phenol-d6	13127-88-3	0.5	%		98.3	92.5	----	----	----
2-Chlorophenol-D4	93951-73-6	0.5	%		110	105	----	----	----
2.4.6-Tribromophenol	118-79-6	0.5	%		57.1	57.4	----	----	----
EP075T: Base/Neutral Extractable Surrogates									
Nitrobenzene-D5	4165-60-0	0.5	%		103	99.9	----	----	----
1.2-Dichlorobenzene-D4	2199-69-1	0.5	%		98.3	93.1	----	----	----
2-Fluorobiphenyl	321-60-8	0.5	%		114	114	----	----	----
Anthracene-d10	1719-06-8	0.5	%		116	109	----	----	----
4-Terphenyl-d14	1718-51-0	0.5	%		125	114	----	----	----
EP080S: TPH(V)/BTEX Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.2	%		128	83.8	----	----	----
Toluene-D8	2037-26-5	0.2	%		104	94.2	----	----	----
4-Bromofluorobenzene	460-00-4	0.2	%		102	98.0	----	----	----
EP231S: PFAS Surrogate									
13C4-PFOS	----	0.0002	%		67.5	----	----	----	----
13C8-PFOA	----	0.0002	%		65.0	----	----	----	----

Analytical Results

Descriptive Results

Sub-Matrix: **SOIL**

Method: Compound	Client sample ID - Client sampling date / time	Analytical Results
EA200: AS 4964 - 2004 Identification of Asbestos in Soils		
EA200: Description	BH27@0.50 - 13-Dec-2018 00:00	Mid brown sandy soil.
EA200: Description	BH28@0.50 - 13-Dec-2018 00:00	Mid brown sandy soil.
EA200: Description	BH26@1 .00 - 13-Dec-2018 00:00	Grey sandy soil.
EA200: Description	BH13@1.50 - 14-Dec-2018 00:00	Grey soil.
EA200: Description	BH14@0.80 - 14-Dec-2018 00:00	Pale brown sandy soil.
EA200: Description	BH21@1.00 - 14-Dec-2018 00:00	Dark brown sandy soil.
EA200: Description	BH07@0.20 - 14-Dec-2018 00:00	Dark grey sandy soil.
EA200: Description	BH23@1.00 - 13-Dec-2018 00:00	Grey sandy soil.
EA200: Description	BH25@1.00 - 12-Dec-2018 00:00	Mid brown sandy soil.
EA200: Description	BH22@1.00 - 12-Dec-2018 00:00	Mid brown sandy soil.
EA200: Description	BH03@1.00 - 12-Dec-2018 00:00	Dark brown sandy soil.
EA200: Description	BH05@1.00 - 12-Dec-2018 00:00	Mid brown sandy soil.
EA200: Description	BH04@0.20 - 12-Dec-2018 00:00	Mid brown sandy soil.
EA200: Description	MW01@1.00 - 12-Dec-2018 00:00	Pale brown sandy soil.

Surrogate Control Limits

Sub-Matrix: **SOIL**

Compound	CAS Number	Recovery Limits (%) Low	High
EP066S: PCB Surrogate			
Decachlorobiphenyl	2051-24-3	39	149
EP068S: Organochlorine Pesticide Surrogate			
Dibromo-DDE	21655-73-2	49	147
EP068T: Organophosphorus Pesticide Surrogate			
DEF	78-48-8	35	143
EP074S: VOC Surrogates			
1.2-Dichloroethane-D4	17060-07-0	64	130
Toluene-D8	2037-26-5	66	136
4-Bromofluorobenzene	460-00-4	60	122
EP075S: Acid Extractable Surrogates			
2-Fluorophenol	367-12-4	29	149
Phenol-d6	13127-88-3	32	128
2-Chlorophenol-D4	93951-73-6	32	128
2.4.6-Tribromophenol	118-79-6	13	121
EP075T: Base/Neutral Extractable Surrogates			
Nitrobenzene-D5	4165-60-0	33	125
1.2-Dichlorobenzene-D4	2199-69-1	34	108
2-Fluorobiphenyl	321-60-8	35	121
Anthracene-d10	1719-06-8	35	123
4-Terphenyl-d14	1718-51-0	33	125
EP080S: TPH(V)/BTEX Surrogates			
1.2-Dichloroethane-D4	17060-07-0	73	133
Toluene-D8	2037-26-5	74	132
4-Bromofluorobenzene	460-00-4	72	130
EP231S: PFAS Surrogate			
13C4-PFOS	----	60	120
13C8-PFOA	----	60	120

ALS Environmental

QUALITY CONTROL REPORT

Work Order	: **ES1838118**	Page	: 1 of 49
Client	: **ARCADIS AUSTRALIA PACIFIC PTY LTD**	Laboratory	: Environmental Division Sydney
Contact	: MR DEAN STAFFORD	Contact	: Loren Schiavon
Address	: L16, 480 GEORGE STREET SYDNEY NSW 2000	Address	: 277-289 Woodpark Road Smithfield NSW Australia 2164
Telephone	: 02 9690 2555	Telephone	: +61 2 8784 8555
Project	: King St North ESA	Date Samples Received	: 17-Dec-2018
Order number	: 10026439	Date Analysis Commenced	: 20-Dec-2018
C-O-C number	: ----	Issue Date	: 07-Jan-2019
Sampler	: CAITLAIN REGENA		
Site	: ----		
Quote number	: EN/091/17 (Primary Work only)		
No. of samples received	: 47		
No. of samples analysed	: 22		

Accreditation No. 825
Accredited for compliance with
ISO/IEC 17025 - Testing

This report supersedes any previous report(s) with this reference. Results apply to the sample(s) as submitted. This document shall not be reproduced, except in full.

This Quality Control Report contains the following information:

- Laboratory Duplicate (DUP) Report; Relative Percentage Difference (RPD) and Acceptance Limits
- Method Blank (MB) and Laboratory Control Spike (LCS) Report; Recovery and Acceptance Limits
- Matrix Spike (MS) Report; Recovery and Acceptance Limits

Signatories

This document has been electronically signed by the authorized signatories below. Electronic signing is carried out in compliance with procedures specified in 21 CFR Part 11.

Signatories	*Position*	*Accreditation Category*
Alana Smylie	Asbestos Identifier	Newcastle - Asbestos, Mayfield West, NSW
Alex Rossi	Organic Chemist	Sydney Organics, Smithfield, NSW
Celine Conceicao	Senior Spectroscopist	Sydney Inorganics, Smithfield, NSW
Edwandy Fadjar	Organic Coordinator	Sydney Inorganics, Smithfield, NSW
Edwandy Fadjar	Organic Coordinator	Sydney Organics, Smithfield, NSW
Ivan Taylor	Analyst	Sydney Inorganics, Smithfield, NSW

General Comments

The analytical procedures used by the Environmental Division have been developed from established internationally recognized procedures such as those published by the USEPA, APHA, AS and NEPM. In house developed procedures are employed in the absence of documented standards or by client request.

Where moisture determination has been performed, results are reported on a dry weight basis.

Where a reported less than (<) result is higher than the LOR, this may be due to primary sample extract/digestate dilution and/or insufficient sample for analysis. Where the LOR of a reported result differs from standard LOR, this may be due to high

Key : Anonymous = Refers to samples which are not specifically part of this work order but formed part of the QC process lot
CAS Number = CAS registry number from database maintained by Chemical Abstracts Services. The Chemical Abstracts Service is a division of the American Chemical Society.
LOR = Limit of reporting
RPD = Relative Percentage Difference
# = Indicates failed QC

Laboratory Duplicate (DUP) Report

The quality control term Laboratory Duplicate refers to a randomly selected intralaboratory split. Laboratory duplicates provide information regarding method precision and sample heterogeneity. The permitted ranges for the Relative Percent Deviation (RPD) of Laboratory Duplicates are specified in ALS Method QWI-EN/38 and are dependent on the magnitude of results in comparison to the level of reporting: Result < 10 times LOR: No Limit; Result between 10 and 20 times LOR: 0% - 50%; Result > 20 times LOR: 0% - 20%.

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EA055: Moisture Content (Dried @ 105-110°C) (QC Lot: 2107220)									
ES1838116-035	Anonymous	EA055: Moisture Content	----	0.1	%	1.4	1.7	17.2	No Limit
ES1838116-059	Anonymous	EA055: Moisture Content	----	0.1	%	17.6	16.8	4.61	0% - 50%
EA055: Moisture Content (Dried @ 105-110°C) (QC Lot: 2107221)									
ES1838118-014	BH13@1.50	EA055: Moisture Content	----	0.1	%	41.8	41.2	1.55	0% - 20%
ES1838118-035	BH03@1.00	EA055: Moisture Content	----	0.1	%	25.4	26.9	5.44	0% - 20%
EG005T: Total Metals by ICP-AES (QC Lot: 2111394)									
ES1838116-043	Anonymous	EG005T: Cadmium	7440-43-9	1	mg/kg	<1	<1	0.00	No Limit
		EG005T: Chromium	7440-47-3	2	mg/kg	15	10	38.2	No Limit
		EG005T: Nickel	7440-02-0	2	mg/kg	<2	<2	0.00	No Limit
		EG005T: Arsenic	7440-38-2	5	mg/kg	<5	<5	0.00	No Limit
		EG005T: Copper	7440-50-8	5	mg/kg	6	6	0.00	No Limit
		EG005T: Lead	7439-92-1	5	mg/kg	16	15	0.00	No Limit
		EG005T: Zinc	7440-66-6	5	mg/kg	47	41	15.0	No Limit
ES1838118-003	BH19@4.00	EG005T: Cadmium	7440-43-9	1	mg/kg	<1	<1	0.00	No Limit
		EG005T: Chromium	7440-47-3	2	mg/kg	9	17	59.7	No Limit
		EG005T: Nickel	7440-02-0	2	mg/kg	3	2	0.00	No Limit
		EG005T: Arsenic	7440-38-2	5	mg/kg	<5	<5	0.00	No Limit
		EG005T: Copper	7440-50-8	5	mg/kg	12	8	39.4	No Limit
		EG005T: Lead	7439-92-1	5	mg/kg	30	20	38.7	No Limit
		EG005T: Zinc	7440-66-6	5	mg/kg	28	# 80	95.5	0% - 50%
EG005T: Total Metals by ICP-AES (QC Lot: 2112056)									
ES1837263-001	Anonymous	EG005T: Cadmium	7440-43-9	1	mg/kg	<1	<1	0.00	No Limit
		EG005T: Chromium	7440-47-3	2	mg/kg	8	7	15.8	No Limit
		EG005T: Nickel	7440-02-0	2	mg/kg	9	8	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EG005T: Total Metals by ICP-AES (QC Lot: 2112056) - continued									
ES1837263-001	Anonymous	EG005T: Arsenic	7440-38-2	5	mg/kg	6	6	0.00	No Limit
		EG005T: Copper	7440-50-8	5	mg/kg	14	14	0.00	No Limit
		EG005T: Lead	7439-92-1	5	mg/kg	10	8	18.7	No Limit
		EG005T: Zinc	7440-66-6	5	mg/kg	61	56	7.96	0% - 50%
ES1838118-045	MW01@1.00	EG005T: Cadmium	7440-43-9	1	mg/kg	<1	<1	0.00	No Limit
		EG005T: Chromium	7440-47-3	2	mg/kg	<2	<2	0.00	No Limit
		EG005T: Nickel	7440-02-0	2	mg/kg	<2	<2	0.00	No Limit
		EG005T: Arsenic	7440-38-2	5	mg/kg	<5	<5	0.00	No Limit
		EG005T: Copper	7440-50-8	5	mg/kg	<5	<5	0.00	No Limit
		EG005T: Lead	7439-92-1	5	mg/kg	<5	<5	0.00	No Limit
		EG005T: Zinc	7440-66-6	5	mg/kg	14	15	0.00	No Limit
EG035T: Total Recoverable Mercury by FIMS (QC Lot: 2111393)									
ES1838116-043	Anonymous	EG035T: Mercury	7439-97-6	0.1	mg/kg	0.1	0.1	0.00	No Limit
ES1838118-003	BH19@4.00	EG035T: Mercury	7439-97-6	0.1	mg/kg	0.4	0.3	0.00	No Limit
EG035T: Total Recoverable Mercury by FIMS (QC Lot: 2112057)									
ES1837263-001	Anonymous	EG035T: Mercury	7439-97-6	0.1	mg/kg	<0.1	<0.1	0.00	No Limit
ES1838118-045	MW01@1.00	EG035T: Mercury	7439-97-6	0.1	mg/kg	<0.1	<0.1	0.00	No Limit
EP066: Polychlorinated Biphenyls (PCB) (QC Lot: 2103896)									
ES1838118-004	BH27@0.50	EP066: Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	<0.1	0.00	No Limit
ES1838118-021	BH07@0.20	EP066: Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	<0.1	0.00	No Limit
EP066: Polychlorinated Biphenyls (PCB) (QC Lot: 2103933)									
ES1838116-043	Anonymous	EP066: Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	<0.1	0.00	No Limit
ES1838118-003	BH19@4.00	EP066: Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	<0.1	0.00	No Limit
EP068A: Organochlorine Pesticides (OC) (QC Lot: 2103897)									
ES1838118-004	BH27@0.50	EP068: alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: delta-BHC	319-86-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Heptachlor	76-44-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Aldrin	309-00-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Heptachlor epoxide	1024-57-3	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: trans-Chlordane	5103-74-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: alpha-Endosulfan	959-98-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: cis-Chlordane	5103-71-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Dieldrin	60-57-1	0.05	mg/kg	0.08	0.09	13.6	No Limit
		EP068: 4.4`-DDE	72-55-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin	72-20-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: beta-Endosulfan	33213-65-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP068A: Organochlorine Pesticides (OC) (QC Lot: 2103897) - continued									
ES1838118-004	BH27@0.50	EP068: 4.4`-DDD	72-54-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin aldehyde	7421-93-4	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endosulfan sulfate	1031-07-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin ketone	53494-70-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDT	50-29-3	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Methoxychlor	72-43-5	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
ES1838118-021	BH07@0.20	EP068: alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: delta-BHC	319-86-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Heptachlor	76-44-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Aldrin	309-00-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Heptachlor epoxide	1024-57-3	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: trans-Chlordane	5103-74-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: alpha-Endosulfan	959-98-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: cis-Chlordane	5103-71-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Dieldrin	60-57-1	0.05	mg/kg	0.13	0.10	19.1	No Limit
		EP068: 4.4`-DDE	72-55-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin	72-20-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: beta-Endosulfan	33213-65-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDD	72-54-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin aldehyde	7421-93-4	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endosulfan sulfate	1031-07-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin ketone	53494-70-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDT	50-29-3	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Methoxychlor	72-43-5	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
EP068A: Organochlorine Pesticides (OC) (QC Lot: 2103934)									
ES1838116-043	Anonymous	EP068: alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: delta-BHC	319-86-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Heptachlor	76-44-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Aldrin	309-00-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Heptachlor epoxide	1024-57-3	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: trans-Chlordane	5103-74-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: alpha-Endosulfan	959-98-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: cis-Chlordane	5103-71-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Dieldrin	60-57-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP068A: Organochlorine Pesticides (OC) (QC Lot: 2103934) - continued									
ES1838116-043	Anonymous	EP068: 4.4`-DDE	72-55-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin	72-20-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: beta-Endosulfan	33213-65-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDD	72-54-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin aldehyde	7421-93-4	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endosulfan sulfate	1031-07-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin ketone	53494-70-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDT	50-29-3	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Methoxychlor	72-43-5	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
ES1838118-003	BH19@4.00	EP068: alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: delta-BHC	319-86-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Heptachlor	76-44-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Aldrin	309-00-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Heptachlor epoxide	1024-57-3	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: trans-Chlordane	5103-74-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: alpha-Endosulfan	959-98-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: cis-Chlordane	5103-71-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Dieldrin	60-57-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDE	72-55-9	0.05	mg/kg	0.05	0.06	0.00	No Limit
		EP068: Endrin	72-20-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: beta-Endosulfan	33213-65-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDD	72-54-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin aldehyde	7421-93-4	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endosulfan sulfate	1031-07-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin ketone	53494-70-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDT	50-29-3	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Methoxychlor	72-43-5	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
EP068B: Organophosphorus Pesticides (OP) (QC Lot: 2103897)									
ES1838118-004	BH27@0.50	EP068: Dichlorvos	62-73-7	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Demeton-S-methyl	919-86-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Dimethoate	60-51-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Diazinon	333-41-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Malathion	121-75-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Fenthion	55-38-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorpyrifos	2921-88-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Pirimphos-ethyl	23505-41-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP068B: Organophosphorus Pesticides (OP) (QC Lot: 2103897) - continued									
ES1838118-004	BH27@0.50	EP068: Chlorfenvinphos	470-90-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Bromophos-ethyl	4824-78-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Fenamiphos	22224-92-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Prothiofos	34643-46-4	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Ethion	563-12-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Carbophenothion	786-19-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Azinphos Methyl	86-50-0	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Monocrotophos	6923-22-4	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Parathion-methyl	298-00-0	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Parathion	56-38-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
ES1838118-021	BH07@0.20	EP068: Dichlorvos	62-73-7	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Demeton-S-methyl	919-86-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Dimethoate	60-51-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Diazinon	333-41-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Malathion	121-75-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Fenthion	55-38-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorpyrifos	2921-88-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Pirimphos-ethyl	23505-41-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorfenvinphos	470-90-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Bromophos-ethyl	4824-78-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Fenamiphos	22224-92-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Prothiofos	34643-46-4	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Ethion	563-12-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Carbophenothion	786-19-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Azinphos Methyl	86-50-0	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Monocrotophos	6923-22-4	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Parathion-methyl	298-00-0	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Parathion	56-38-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
EP068B: Organophosphorus Pesticides (OP) (QC Lot: 2103934)									
ES1838116-043	Anonymous	EP068: Dichlorvos	62-73-7	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Demeton-S-methyl	919-86-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Dimethoate	60-51-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Diazinon	333-41-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Malathion	121-75-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Fenthion	55-38-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorpyrifos	2921-88-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Pirimphos-ethyl	23505-41-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorfenvinphos	470-90-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP068B: Organophosphorus Pesticides (OP) (QC Lot: 2103934) - continued									
ES1838116-043	Anonymous	EP068: Bromophos-ethyl	4824-78-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Fenamiphos	22224-92-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Prothiofos	34643-46-4	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Ethion	563-12-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Carbophenothion	786-19-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Azinphos Methyl	86-50-0	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Monocrotophos	6923-22-4	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Parathion-methyl	298-00-0	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Parathion	56-38-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
ES1838118-003	BH19@4.00	EP068: Dichlorvos	62-73-7	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Demeton-S-methyl	919-86-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Dimethoate	60-51-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Diazinon	333-41-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Malathion	121-75-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Fenthion	55-38-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorpyrifos	2921-88-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Pirimphos-ethyl	23505-41-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorfenvinphos	470-90-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Bromophos-ethyl	4824-78-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Fenamiphos	22224-92-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Prothiofos	34643-46-4	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Ethion	563-12-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Carbophenothion	786-19-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Azinphos Methyl	86-50-0	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Monocrotophos	6923-22-4	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Parathion-methyl	298-00-0	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Parathion	56-38-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
EP074A: Monocyclic Aromatic Hydrocarbons (QC Lot: 2108013)									
ES1838118-003	BH19@4.00	EP074: Styrene	100-42-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Isopropylbenzene	98-82-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: n-Propylbenzene	103-65-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: sec-Butylbenzene	135-98-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: tert-Butylbenzene	98-06-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: p-Isopropyltoluene	99-87-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: n-Butylbenzene	104-51-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838118-020	BH21@3.00	EP074: Styrene	100-42-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Isopropylbenzene	98-82-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP074A: Monocyclic Aromatic Hydrocarbons (QC Lot: 2108013) - continued									
ES1838118-020	BH21@3.00	EP074: n-Propylbenzene	103-65-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: sec-Butylbenzene	135-98-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: tert-Butylbenzene	98-06-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: p-Isopropyltoluene	99-87-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: n-Butylbenzene	104-51-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074A: Monocyclic Aromatic Hydrocarbons (QC Lot: 2109182)									
ES1838118-047	MW01@4.00	EP074: Styrene	100-42-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Isopropylbenzene	98-82-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: n-Propylbenzene	103-65-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: sec-Butylbenzene	135-98-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: tert-Butylbenzene	98-06-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: p-Isopropyltoluene	99-87-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: n-Butylbenzene	104-51-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838480-039	Anonymous	EP074: Styrene	100-42-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Isopropylbenzene	98-82-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: n-Propylbenzene	103-65-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: sec-Butylbenzene	135-98-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: tert-Butylbenzene	98-06-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: p-Isopropyltoluene	99-87-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: n-Butylbenzene	104-51-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074B: Oxygenated Compounds (QC Lot: 2108013)									
ES1838118-003	BH19@4.00	EP074: Vinyl Acetate	108-05-4	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 2-Butanone (MEK)	78-93-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 2-Hexanone (MBK)	591-78-6	5	mg/kg	<5	<5	0.00	No Limit
ES1838118-020	BH21@3.00	EP074: Vinyl Acetate	108-05-4	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 2-Butanone (MEK)	78-93-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 2-Hexanone (MBK)	591-78-6	5	mg/kg	<5	<5	0.00	No Limit
EP074B: Oxygenated Compounds (QC Lot: 2109182)									
ES1838118-047	MW01@4.00	EP074: Vinyl Acetate	108-05-4	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 2-Butanone (MEK)	78-93-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 2-Hexanone (MBK)	591-78-6	5	mg/kg	<5	<5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP074B: Oxygenated Compounds (QC Lot: 2109182) - continued									
ES1838480-039	Anonymous	EP074: Vinyl Acetate	108-05-4	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 2-Butanone (MEK)	78-93-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 2-Hexanone (MBK)	591-78-6	5	mg/kg	<5	<5	0.00	No Limit
EP074C: Sulfonated Compounds (QC Lot: 2108013)									
ES1838118-003	BH19@4.00	EP074: Carbon disulfide	75-15-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838118-020	BH21@3.00	EP074: Carbon disulfide	75-15-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074C: Sulfonated Compounds (QC Lot: 2109182)									
ES1838118-047	MW01@4.00	EP074: Carbon disulfide	75-15-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838480-039	Anonymous	EP074: Carbon disulfide	75-15-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074D: Fumigants (QC Lot: 2108013)									
ES1838118-003	BH19@4.00	EP074: 2.2-Dichloropropane	594-20-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dichloropropane	78-87-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838118-020	BH21@3.00	EP074: 2.2-Dichloropropane	594-20-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dichloropropane	78-87-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074D: Fumigants (QC Lot: 2109182)									
ES1838118-047	MW01@4.00	EP074: 2.2-Dichloropropane	594-20-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dichloropropane	78-87-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838480-039	Anonymous	EP074: 2.2-Dichloropropane	594-20-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dichloropropane	78-87-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074E: Halogenated Aliphatic Compounds (QC Lot: 2108013)									
ES1838118-003	BH19@4.00	EP074: 1.1-Dichloroethene	75-35-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Iodomethane	74-88-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1-Dichloroethane	75-34-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.1-Trichloroethane	71-55-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP074E: Halogenated Aliphatic Compounds (QC Lot: 2108013) - continued									
ES1838118-003	BH19@4.00	EP074: 1.1-Dichloropropylene	563-58-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Carbon Tetrachloride	56-23-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dichloroethane	107-06-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Trichloroethene	79-01-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dibromomethane	74-95-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.2-Trichloroethane	79-00-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.3-Dichloropropane	142-28-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Tetrachloroethene	127-18-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.3-Trichloropropane	96-18-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Pentachloroethane	76-01-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dichlorodifluoromethane	75-71-8	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Chloromethane	74-87-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Vinyl chloride	75-01-4	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Bromomethane	74-83-9	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Chloroethane	75-00-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Trichlorofluoromethane	75-69-4	5	mg/kg	<5	<5	0.00	No Limit
ES1838118-020	BH21@3.00	EP074: 1.1-Dichloroethene	75-35-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Iodomethane	74-88-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1-Dichloroethane	75-34-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.1-Trichloroethane	71-55-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1-Dichloropropylene	563-58-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Carbon Tetrachloride	56-23-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dichloroethane	107-06-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Trichloroethene	79-01-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dibromomethane	74-95-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.2-Trichloroethane	79-00-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.3-Dichloropropane	142-28-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Tetrachloroethene	127-18-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.3-Trichloropropane	96-18-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP074E: Halogenated Aliphatic Compounds (QC Lot: 2108013) - continued									
ES1838118-020	BH21@3.00	EP074: Pentachloroethane	76-01-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dichlorodifluoromethane	75-71-8	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Chloromethane	74-87-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Vinyl chloride	75-01-4	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Bromomethane	74-83-9	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Chloroethane	75-00-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Trichlorofluoromethane	75-69-4	5	mg/kg	<5	<5	0.00	No Limit
EP074E: Halogenated Aliphatic Compounds (QC Lot: 2109182)									
ES1838118-047	MW01@4.00	EP074: 1.1-Dichloroethene	75-35-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Iodomethane	74-88-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1-Dichloroethane	75-34-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.1-Trichloroethane	71-55-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1-Dichloropropylene	563-58-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Carbon Tetrachloride	56-23-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dichloroethane	107-06-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Trichloroethene	79-01-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dibromomethane	74-95-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.2-Trichloroethane	79-00-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.3-Dichloropropane	142-28-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Tetrachloroethene	127-18-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.3-Trichloropropane	96-18-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Pentachloroethane	76-01-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dichlorodifluoromethane	75-71-8	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Chloromethane	74-87-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Vinyl chloride	75-01-4	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Bromomethane	74-83-9	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Chloroethane	75-00-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Trichlorofluoromethane	75-69-4	5	mg/kg	<5	<5	0.00	No Limit
ES1838480-039	Anonymous	EP074: 1.1-Dichloroethene	75-35-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Iodomethane	74-88-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1-Dichloroethane	75-34-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP074E: Halogenated Aliphatic Compounds (QC Lot: 2109182) - continued									
ES1838480-039	Anonymous	EP074: cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.1-Trichloroethane	71-55-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1-Dichloropropylene	563-58-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Carbon Tetrachloride	56-23-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dichloroethane	107-06-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Trichloroethene	79-01-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dibromomethane	74-95-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.2-Trichloroethane	79-00-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.3-Dichloropropane	142-28-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Tetrachloroethene	127-18-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.3-Trichloropropane	96-18-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Pentachloroethane	76-01-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dichlorodifluoromethane	75-71-8	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Chloromethane	74-87-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Vinyl chloride	75-01-4	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Bromomethane	74-83-9	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Chloroethane	75-00-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Trichlorofluoromethane	75-69-4	5	mg/kg	<5	<5	0.00	No Limit
EP074F: Halogenated Aromatic Compounds (QC Lot: 2108013)									
ES1838118-003	BH19@4.00	EP074: Chlorobenzene	108-90-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromobenzene	108-86-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 2-Chlorotoluene	95-49-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 4-Chlorotoluene	106-43-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838118-020	BH21@3.00	EP074: Chlorobenzene	108-90-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromobenzene	108-86-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 2-Chlorotoluene	95-49-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 4-Chlorotoluene	106-43-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074F: Halogenated Aromatic Compounds (QC Lot: 2109182)									
ES1838118-047	MW01@4.00	EP074: Chlorobenzene	108-90-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromobenzene	108-86-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 2-Chlorotoluene	95-49-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 4-Chlorotoluene	106-43-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP074F: Halogenated Aromatic Compounds (QC Lot: 2109182) - continued									
ES1838480-039	Anonymous	EP074: Chlorobenzene	108-90-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromobenzene	108-86-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 2-Chlorotoluene	95-49-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 4-Chlorotoluene	106-43-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074G: Trihalomethanes (QC Lot: 2108013)									
ES1838118-003	BH19@4.00	EP074: Chloroform	67-66-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromodichloromethane	75-27-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dibromochloromethane	124-48-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromoform	75-25-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838118-020	BH21@3.00	EP074: Chloroform	67-66-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromodichloromethane	75-27-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dibromochloromethane	124-48-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromoform	75-25-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074G: Trihalomethanes (QC Lot: 2109182)									
ES1838118-047	MW01@4.00	EP074: Chloroform	67-66-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromodichloromethane	75-27-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dibromochloromethane	124-48-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromoform	75-25-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838480-039	Anonymous	EP074: Chloroform	67-66-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromodichloromethane	75-27-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dibromochloromethane	124-48-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromoform	75-25-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075A: Phenolic Compounds (QC Lot: 2103895)									
ES1838118-004	BH27@0.50	EP075: Phenol	108-95-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Chlorophenol	95-57-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Methylphenol	95-48-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3- & 4-Methylphenol	1319-77-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Nitrophenol	88-75-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4-Dimethylphenol	105-67-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4-Dichlorophenol	120-83-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.6-Dichlorophenol	87-65-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachlorophenol	87-86-5	1	mg/kg	<1	<1	0.00	No Limit
ES1838118-021	BH07@0.20	EP075: Phenol	108-95-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Chlorophenol	95-57-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Methylphenol	95-48-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3- & 4-Methylphenol	1319-77-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075A: Phenolic Compounds (QC Lot: 2103895) - continued									
ES1838118-021	BH07@0.20	EP075: 2-Nitrophenol	88-75-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4-Dimethylphenol	105-67-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4-Dichlorophenol	120-83-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.6-Dichlorophenol	87-65-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachlorophenol	87-86-5	1	mg/kg	<1	<1	0.00	No Limit
EP075A: Phenolic Compounds (QC Lot: 2103932)									
ES1838116-043	Anonymous	EP075: Phenol	108-95-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Chlorophenol	95-57-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Methylphenol	95-48-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3- & 4-Methylphenol	1319-77-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Nitrophenol	88-75-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4-Dimethylphenol	105-67-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4-Dichlorophenol	120-83-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.6-Dichlorophenol	87-65-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachlorophenol	87-86-5	1	mg/kg	<1	<1	0.00	No Limit
ES1838118-003	BH19@4.00	EP075: Phenol	108-95-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Chlorophenol	95-57-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Methylphenol	95-48-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3- & 4-Methylphenol	1319-77-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Nitrophenol	88-75-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4-Dimethylphenol	105-67-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4-Dichlorophenol	120-83-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.6-Dichlorophenol	87-65-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachlorophenol	87-86-5	1	mg/kg	<1	<1	0.00	No Limit
EP075B: Polynuclear Aromatic Hydrocarbons (QC Lot: 2103895)									
ES1838118-004	BH27@0.50	EP075: Naphthalene	91-20-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Methylnaphthalene	91-57-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Chloronaphthalene	91-58-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acenaphthylene	208-96-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acenaphthene	83-32-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fluorene	86-73-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075B: Polynuclear Aromatic Hydrocarbons (QC Lot: 2103895) - continued									
ES1838118-004	BH27@0.50	EP075: Phenanthrene	85-01-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Anthracene	120-12-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fluoranthene	206-44-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pyrene	129-00-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benz(a)anthracene	56-55-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chrysene	218-01-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(a)pyrene	50-32-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3-Methylcholanthrene	56-49-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg	<1	<1	0.00	No Limit
ES1838118-021	BH07@0.20	EP075: Naphthalene	91-20-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Methylnaphthalene	91-57-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Chloronaphthalene	91-58-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acenaphthylene	208-96-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acenaphthene	83-32-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fluorene	86-73-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Phenanthrene	85-01-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Anthracene	120-12-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fluoranthene	206-44-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pyrene	129-00-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benz(a)anthracene	56-55-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chrysene	218-01-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(a)pyrene	50-32-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3-Methylcholanthrene	56-49-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg	<1	<1	0.00	No Limit
EP075B: Polynuclear Aromatic Hydrocarbons (QC Lot: 2103932)									
ES1838116-043	Anonymous	EP075: Naphthalene	91-20-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Methylnaphthalene	91-57-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Chloronaphthalene	91-58-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075B: Polynuclear Aromatic Hydrocarbons (QC Lot: 2103932) - continued									
ES1838116-043	Anonymous	EP075: Acenaphthylene	208-96-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acenaphthene	83-32-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fluorene	86-73-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Phenanthrene	85-01-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Anthracene	120-12-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fluoranthene	206-44-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pyrene	129-00-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benz(a)anthracene	56-55-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chrysene	218-01-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(a)pyrene	50-32-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3-Methylcholanthrene	56-49-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg	<1	<1	0.00	No Limit
ES1838118-003	BH19@4.00	EP075: Naphthalene	91-20-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Methylnaphthalene	91-57-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Chloronaphthalene	91-58-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acenaphthylene	208-96-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acenaphthene	83-32-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fluorene	86-73-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Phenanthrene	85-01-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Anthracene	120-12-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fluoranthene	206-44-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pyrene	129-00-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benz(a)anthracene	56-55-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chrysene	218-01-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(a)pyrene	50-32-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3-Methylcholanthrene	56-49-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg	<1	<1	0.00	No Limit
EP075C: Phthalate Esters (QC Lot: 2103895)									

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075C: Phthalate Esters (QC Lot: 2103895) - continued									
ES1838118-004	BH27@0.50	EP075: Dimethyl phthalate	131-11-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Diethyl phthalate	84-66-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Di-n-butyl phthalate	84-74-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Butyl benzyl phthalate	85-68-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Di-n-octylphthalate	117-84-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838118-021	BH07@0.20	EP075: Dimethyl phthalate	131-11-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Diethyl phthalate	84-66-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Di-n-butyl phthalate	84-74-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Butyl benzyl phthalate	85-68-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Di-n-octylphthalate	117-84-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075C: Phthalate Esters (QC Lot: 2103932)									
ES1838116-043	Anonymous	EP075: Dimethyl phthalate	131-11-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Diethyl phthalate	84-66-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Di-n-butyl phthalate	84-74-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Butyl benzyl phthalate	85-68-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Di-n-octylphthalate	117-84-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838118-003	BH19@4.00	EP075: Dimethyl phthalate	131-11-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Diethyl phthalate	84-66-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Di-n-butyl phthalate	84-74-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Butyl benzyl phthalate	85-68-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Di-n-octylphthalate	117-84-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075D: Nitrosamines (QC Lot: 2103895)									
ES1838118-004	BH27@0.50	EP075: N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodiethylamine	55-18-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosopyrrolidine	930-55-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: N-Nitrosomorpholine	59-89-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosopiperidine	100-75-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodibutylamine	924-16-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Methapyrilene	91-80-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838118-021	BH07@0.20	EP075: N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodiethylamine	55-18-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosopyrrolidine	930-55-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: N-Nitrosomorpholine	59-89-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosopiperidine	100-75-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodibutylamine	924-16-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075D: Nitrosamines (QC Lot: 2103895) - continued									
ES1838118-021	BH07@0.20	EP075: N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Methapyrilene	91-80-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075D: Nitrosamines (QC Lot: 2103932)									
ES1838116-043	Anonymous	EP075: N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodiethylamine	55-18-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosopyrrolidine	930-55-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: N-Nitrosomorpholine	59-89-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosopiperidine	100-75-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodibutylamine	924-16-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Methapyrilene	91-80-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838118-003	BH19@4.00	EP075: N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodiethylamine	55-18-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosopyrrolidine	930-55-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: N-Nitrosomorpholine	59-89-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosopiperidine	100-75-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodibutylamine	924-16-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Methapyrilene	91-80-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075E: Nitroaromatics and Ketones (QC Lot: 2103895)									
ES1838118-004	BH27@0.50	EP075: 2-Picoline	109-06-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acetophenone	98-86-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Nitrobenzene	98-95-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Isophorone	78-59-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.6-Dinitrotoluene	606-20-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 2.4-Dinitrotoluene	121-14-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 1-Naphthylamine	134-32-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 5-Nitro-o-toluidine	99-55-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Phenacetin	62-44-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Aminobiphenyl	92-67-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachloronitrobenzene	82-68-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pronamide	23950-58-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dimethylaminoazobenzene	60-11-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075E: Nitroaromatics and Ketones (QC Lot: 2103895) - continued									
ES1838118-004	BH27@0.50	EP075: Chlorobenzilate	510-15-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Azobenzene	103-33-3	1	mg/kg	<1	<1	0.00	No Limit
ES1838118-021	BH07@0.20	EP075: 2-Picoline	109-06-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acetophenone	98-86-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Nitrobenzene	98-95-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Isophorone	78-59-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.6-Dinitrotoluene	606-20-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 2.4-Dinitrotoluene	121-14-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 1-Naphthylamine	134-32-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 5-Nitro-o-toluidine	99-55-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Phenacetin	62-44-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Aminobiphenyl	92-67-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachloronitrobenzene	82-68-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pronamide	23950-58-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dimethylaminoazobenzene	60-11-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorobenzilate	510-15-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Azobenzene	103-33-3	1	mg/kg	<1	<1	0.00	No Limit
EP075E: Nitroaromatics and Ketones (QC Lot: 2103932)									
ES1838116-043	Anonymous	EP075: 2-Picoline	109-06-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acetophenone	98-86-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Nitrobenzene	98-95-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Isophorone	78-59-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.6-Dinitrotoluene	606-20-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 2.4-Dinitrotoluene	121-14-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 1-Naphthylamine	134-32-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 5-Nitro-o-toluidine	99-55-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Phenacetin	62-44-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Aminobiphenyl	92-67-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachloronitrobenzene	82-68-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pronamide	23950-58-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dimethylaminoazobenzene	60-11-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorobenzilate	510-15-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Azobenzene	103-33-3	1	mg/kg	<1	<1	0.00	No Limit
ES1838118-003	BH19@4.00	EP075: 2-Picoline	109-06-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acetophenone	98-86-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Nitrobenzene	98-95-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075E: Nitroaromatics and Ketones (QC Lot: 2103932) - continued									
ES1838118-003	BH19@4.00	EP075: Isophorone	78-59-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.6-Dinitrotoluene	606-20-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 2.4-Dinitrotoluene	121-14-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 1-Naphthylamine	134-32-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 5-Nitro-o-toluidine	99-55-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Phenacetin	62-44-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Aminobiphenyl	92-67-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachloronitrobenzene	82-68-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pronamide	23950-58-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dimethylaminoazobenzene	60-11-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorobenzilate	510-15-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Azobenzene	103-33-3	1	mg/kg	<1	<1	0.00	No Limit
EP075F: Haloethers (QC Lot: 2103895)									
ES1838118-004	BH27@0.50	EP075: Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838118-021	BH07@0.20	EP075: Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075F: Haloethers (QC Lot: 2103932)									
ES1838116-043	Anonymous	EP075: Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838118-003	BH19@4.00	EP075: Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075G: Chlorinated Hydrocarbons (QC Lot: 2103895)									
ES1838118-004	BH27@0.50	EP075: 1.3-Dichlorobenzene	541-73-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.4-Dichlorobenzene	106-46-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.2-Dichlorobenzene	95-50-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachloroethane	67-72-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachloropropylene	1888-71-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachlorobutadiene	87-68-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075G: Chlorinated Hydrocarbons (QC Lot: 2103895) - continued									
ES1838118-004	BH27@0.50	EP075: Pentachlorobenzene	608-93-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachlorobenzene (HCB)	118-74-1	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg	<2.5	<2.5	0.00	No Limit
ES1838118-021	BH07@0.20	EP075: 1.3-Dichlorobenzene	541-73-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.4-Dichlorobenzene	106-46-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.2-Dichlorobenzene	95-50-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachloroethane	67-72-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachloropropylene	1888-71-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachlorobutadiene	87-68-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachlorobenzene	608-93-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachlorobenzene (HCB)	118-74-1	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg	<2.5	<2.5	0.00	No Limit
EP075G: Chlorinated Hydrocarbons (QC Lot: 2103932)									
ES1838116-043	Anonymous	EP075: 1.3-Dichlorobenzene	541-73-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.4-Dichlorobenzene	106-46-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.2-Dichlorobenzene	95-50-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachloroethane	67-72-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachloropropylene	1888-71-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachlorobutadiene	87-68-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachlorobenzene	608-93-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachlorobenzene (HCB)	118-74-1	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg	<2.5	<2.5	0.00	No Limit
ES1838118-003	BH19@4.00	EP075: 1.3-Dichlorobenzene	541-73-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.4-Dichlorobenzene	106-46-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.2-Dichlorobenzene	95-50-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachloroethane	67-72-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachloropropylene	1888-71-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachlorobutadiene	87-68-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachlorobenzene	608-93-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachlorobenzene (HCB)	118-74-1	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg	<2.5	<2.5	0.00	No Limit
EP075H: Anilines and Benzidines (QC Lot: 2103895)									
ES1838118-004	BH27@0.50	EP075: Aniline	62-53-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chloroaniline	106-47-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Nitroaniline	88-74-4	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 3-Nitroaniline	99-09-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Dibenzofuran	132-64-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075H: Anilines and Benzidines (QC Lot: 2103895) - continued									
ES1838118-004	BH27@0.50	EP075: 4-Nitroaniline	100-01-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Carbazole	86-74-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838118-021	BH07@0.20	EP075: Aniline	62-53-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chloroaniline	106-47-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Nitroaniline	88-74-4	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 3-Nitroaniline	99-09-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Dibenzofuran	132-64-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Nitroaniline	100-01-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Carbazole	86-74-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075H: Anilines and Benzidines (QC Lot: 2103932)									
ES1838116-043	Anonymous	EP075: Aniline	62-53-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chloroaniline	106-47-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Nitroaniline	88-74-4	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 3-Nitroaniline	99-09-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Dibenzofuran	132-64-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Nitroaniline	100-01-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Carbazole	86-74-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838118-003	BH19@4.00	EP075: Aniline	62-53-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chloroaniline	106-47-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Nitroaniline	88-74-4	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 3-Nitroaniline	99-09-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Dibenzofuran	132-64-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Nitroaniline	100-01-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Carbazole	86-74-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075I: Organochlorine Pesticides (QC Lot: 2103895)									
ES1838118-004	BH27@0.50	EP075: alpha-BHC	319-84-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: beta-BHC	319-85-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: gamma-BHC	58-89-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: delta-BHC	319-86-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Heptachlor	76-44-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Aldrin	309-00-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Heptachlor epoxide	1024-57-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: alpha-Endosulfan	959-98-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4.4`-DDE	72-55-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dieldrin	60-57-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Endrin	72-20-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075I: Organochlorine Pesticides (QC Lot: 2103895) - continued									
ES1838118-004	BH27@0.50	EP075: beta-Endosulfan	33213-65-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4.4`-DDD	72-54-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Endosulfan sulfate	1031-07-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4.4`-DDT	50-29-3	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
ES1838118-021	BH07@0.20	EP075: alpha-BHC	319-84-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: beta-BHC	319-85-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: gamma-BHC	58-89-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: delta-BHC	319-86-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Heptachlor	76-44-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Aldrin	309-00-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Heptachlor epoxide	1024-57-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: alpha-Endosulfan	959-98-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4.4`-DDE	72-55-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dieldrin	60-57-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Endrin	72-20-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: beta-Endosulfan	33213-65-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4.4`-DDD	72-54-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Endosulfan sulfate	1031-07-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4.4`-DDT	50-29-3	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
EP075I: Organochlorine Pesticides (QC Lot: 2103932)									
ES1838116-043	Anonymous	EP075: alpha-BHC	319-84-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: beta-BHC	319-85-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: gamma-BHC	58-89-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: delta-BHC	319-86-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Heptachlor	76-44-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Aldrin	309-00-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Heptachlor epoxide	1024-57-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: alpha-Endosulfan	959-98-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4.4`-DDE	72-55-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dieldrin	60-57-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Endrin	72-20-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: beta-Endosulfan	33213-65-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4.4`-DDD	72-54-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Endosulfan sulfate	1031-07-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4.4`-DDT	50-29-3	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
ES1838118-003	BH19@4.00	EP075: alpha-BHC	319-84-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: beta-BHC	319-85-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: gamma-BHC	58-89-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: delta-BHC	319-86-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Heptachlor	76-44-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075I: Organochlorine Pesticides (QC Lot: 2103932) - continued									
ES1838118-003	BH19@4.00	EP075: Aldrin	309-00-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Heptachlor epoxide	1024-57-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: alpha-Endosulfan	959-98-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4.4`-DDE	72-55-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dieldrin	60-57-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Endrin	72-20-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: beta-Endosulfan	33213-65-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4.4`-DDD	72-54-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Endosulfan sulfate	1031-07-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4.4`-DDT	50-29-3	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
EP075J: Organophosphorus Pesticides (QC Lot: 2103895)									
ES1838118-004	BH27@0.50	EP075: Dichlorvos	62-73-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dimethoate	60-51-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Diazinon	333-41-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorpyrifos-methyl	5598-13-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Malathion	121-75-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fenthion	55-38-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorpyrifos	2921-88-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pirimphos-ethyl	23505-41-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorfenvinphos	470-90-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Prothiofos	34643-46-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Ethion	563-12-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838118-021	BH07@0.20	EP075: Dichlorvos	62-73-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dimethoate	60-51-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Diazinon	333-41-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorpyrifos-methyl	5598-13-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Malathion	121-75-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fenthion	55-38-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorpyrifos	2921-88-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pirimphos-ethyl	23505-41-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorfenvinphos	470-90-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Prothiofos	34643-46-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Ethion	563-12-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075J: Organophosphorus Pesticides (QC Lot: 2103932)									
ES1838116-043	Anonymous	EP075: Dichlorvos	62-73-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dimethoate	60-51-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Diazinon	333-41-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorpyrifos-methyl	5598-13-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Malathion	121-75-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fenthion	55-38-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075J: Organophosphorus Pesticides (QC Lot: 2103932) - continued									
ES1838116-043	Anonymous	EP075: Chlorpyrifos	2921-88-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pirimphos-ethyl	23505-41-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorfenvinphos	470-90-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Prothiofos	34643-46-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Ethion	563-12-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838118-003	BH19@4.00	EP075: Dichlorvos	62-73-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dimethoate	60-51-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Diazinon	333-41-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorpyrifos-methyl	5598-13-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Malathion	121-75-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fenthion	55-38-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorpyrifos	2921-88-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pirimphos-ethyl	23505-41-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorfenvinphos	470-90-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Prothiofos	34643-46-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Ethion	563-12-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP080/071: Total Petroleum Hydrocarbons (QC Lot: 2103898)									
ES1838118-004	BH27@0.50	EP071: C15 - C28 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: C29 - C36 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: C10 - C14 Fraction	----	50	mg/kg	<50	<50	0.00	No Limit
ES1838118-021	BH07@0.20	EP071: C15 - C28 Fraction	----	100	mg/kg	1730	1770	2.43	0% - 50%
		EP071: C29 - C36 Fraction	----	100	mg/kg	1580	1660	4.89	0% - 50%
		EP071: C10 - C14 Fraction	----	50	mg/kg	70	70	0.00	No Limit
EP080/071: Total Petroleum Hydrocarbons (QC Lot: 2103935)									
ES1838116-043	Anonymous	EP071: C15 - C28 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: C29 - C36 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: C10 - C14 Fraction	----	50	mg/kg	<50	<50	0.00	No Limit
ES1838118-003	BH19@4.00	EP071: C15 - C28 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: C29 - C36 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: C10 - C14 Fraction	----	50	mg/kg	<50	<50	0.00	No Limit
EP080/071: Total Petroleum Hydrocarbons (QC Lot: 2108018)									
ES1838118-003	BH19@4.00	EP080: C6 - C9 Fraction	----	10	mg/kg	<10	<10	0.00	No Limit
ES1838118-020	BH21@3.00	EP080: C6 - C9 Fraction	----	10	mg/kg	<10	<10	0.00	No Limit
EP080/071: Total Petroleum Hydrocarbons (QC Lot: 2109183)									
ES1838118-047	MW01@4.00	EP080: C6 - C9 Fraction	----	10	mg/kg	<10	<10	0.00	No Limit
ES1838480-039	Anonymous	EP080: C6 - C9 Fraction	----	10	mg/kg	<10	<10	0.00	No Limit
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QC Lot: 2103898)									
ES1838118-004	BH27@0.50	EP071: >C16 - C34 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: >C34 - C40 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QC Lot: 2103898) - continued									
ES1838118-004	BH27@0.50	EP071: >C10 - C16 Fraction	----	50	mg/kg	<50	<50	0.00	No Limit
ES1838118-021	BH07@0.20	EP071: >C16 - C34 Fraction	----	100	mg/kg	2880	2960	2.80	0% - 20%
		EP071: >C34 - C40 Fraction	----	100	mg/kg	690	740	6.72	No Limit
		EP071: >C10 - C16 Fraction	----	50	mg/kg	140	200	31.6	No Limit
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QC Lot: 2103935)									
ES1838116-043	Anonymous	EP071: >C16 - C34 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: >C34 - C40 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: >C10 - C16 Fraction	----	50	mg/kg	<50	<50	0.00	No Limit
ES1838118-003	BH19@4.00	EP071: >C16 - C34 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: >C34 - C40 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: >C10 - C16 Fraction	----	50	mg/kg	<50	<50	0.00	No Limit
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QC Lot: 2108018)									
ES1838118-003	BH19@4.00	EP080: C6 - C10 Fraction	C6_C10	10	mg/kg	<10	<10	0.00	No Limit
ES1838118-020	BH21@3.00	EP080: C6 - C10 Fraction	C6_C10	10	mg/kg	<10	<10	0.00	No Limit
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QC Lot: 2109183)									
ES1838118-047	MW01@4.00	EP080: C6 - C10 Fraction	C6_C10	10	mg/kg	<10	<10	0.00	No Limit
ES1838480-039	Anonymous	EP080: C6 - C10 Fraction	C6_C10	10	mg/kg	<10	<10	0.00	No Limit
EP080: BTEXN (QC Lot: 2108018)									
ES1838118-003	BH19@4.00	EP080: Benzene	71-43-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP080: Toluene	108-88-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Naphthalene	91-20-3	1	mg/kg	<1	<1	0.00	No Limit
ES1838118-020	BH21@3.00	EP080: Benzene	71-43-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP080: Toluene	108-88-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Naphthalene	91-20-3	1	mg/kg	<1	<1	0.00	No Limit
EP080: BTEXN (QC Lot: 2109183)									
ES1838118-047	MW01@4.00	EP080: Benzene	71-43-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP080: Toluene	108-88-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP080: BTEXN (QC Lot: 2109183) - continued									
ES1838118-047	MW01@4.00	EP080: Naphthalene	91-20-3	1	mg/kg	<1	<1	0.00	No Limit
ES1838480-039	Anonymous	EP080: Benzene	71-43-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP080: Toluene	108-88-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Naphthalene	91-20-3	1	mg/kg	<1	<1	0.00	No Limit
EP231A: Perfluoroalkyl Sulfonic Acids (QC Lot: 2107101)									
EP1814768-001	Anonymous	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
ES1838118-016	BH14@0.80	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	0.0003	0.0004	31.6	No Limit
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 2107101)									
EP1814768-001	Anonymous	EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	<0.001	0.00	No Limit
ES1838118-016	BH14@0.80	EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 2107101) - continued									
ES1838118-016	BH14@0.80	EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	<0.001	0.00	No Limit
EP231C: Perfluoroalkyl Sulfonamides (QC Lot: 2107101)									
EP1814768-001	Anonymous	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
ES1838118-016	BH14@0.80	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QC Lot: 2107101)									
EP1814768-001	Anonymous	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QC Lot: 2107101) - continued									
ES1838118-016	BH14@0.80	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit

Method Blank (MB) and Laboratory Control Spike (LCS) Report

The quality control term Method / Laboratory Blank refers to an analyte free matrix to which all reagents are added in the same volumes or proportions as used in standard sample preparation. The purpose of this QC parameter is to monitor potential laboratory contamination. The quality control term Laboratory Control Spike (LCS) refers to a certified reference material, or a known interference free matrix spiked with target analytes. The purpose of this QC parameter is to monitor method precision and accuracy independent of sample matrix. Dynamic Recovery Limits are based on statistical evaluation of processed LCS.

Sub-Matrix: **SOIL**

				Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
Method: Compound	CAS Number	LOR	Unit	Result	Concentration	LCS	Low	High
EG005T: Total Metals by ICP-AES (QCLot: 2111394)								
EG005T: Arsenic	7440-38-2	5	mg/kg	<5	21.7 mg/kg	95.8	86	126
EG005T: Cadmium	7440-43-9	1	mg/kg	<1	4.64 mg/kg	91.0	83	113
EG005T: Chromium	7440-47-3	2	mg/kg	<2	43.9 mg/kg	77.7	76	128
EG005T: Copper	7440-50-8	5	mg/kg	<5	32 mg/kg	89.6	86	120
EG005T: Lead	7439-92-1	5	mg/kg	<5	40 mg/kg	89.9	80	114
EG005T: Nickel	7440-02-0	2	mg/kg	<2	55 mg/kg	90.0	87	123
EG005T: Zinc	7440-66-6	5	mg/kg	<5	60.8 mg/kg	105	80	122
EG005T: Total Metals by ICP-AES (QCLot: 2112056)								
EG005T: Arsenic	7440-38-2	5	mg/kg	<5	21.7 mg/kg	97.1	86	126
EG005T: Cadmium	7440-43-9	1	mg/kg	<1	4.64 mg/kg	94.9	83	113
EG005T: Chromium	7440-47-3	2	mg/kg	<2	43.9 mg/kg	85.8	76	128
EG005T: Copper	7440-50-8	5	mg/kg	<5	32 mg/kg	95.1	86	120
EG005T: Lead	7439-92-1	5	mg/kg	<5	40 mg/kg	92.5	80	114
EG005T: Nickel	7440-02-0	2	mg/kg	<2	55 mg/kg	96.5	87	123
EG005T: Zinc	7440-66-6	5	mg/kg	<5	60.8 mg/kg	109	80	122
EG035T: Total Recoverable Mercury by FIMS (QCLot: 2111393)								
EG035T: Mercury	7439-97-6	0.1	mg/kg	<0.1	2.57 mg/kg	72.4	70	105
EG035T: Total Recoverable Mercury by FIMS (QCLot: 2112057)								
EG035T: Mercury	7439-97-6	0.1	mg/kg	<0.1	2.57 mg/kg	76.8	70	105
EP066: Polychlorinated Biphenyls (PCB) (QCLot: 2103896)								
EP066: Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	1 mg/kg	108	62	126
EP066: Polychlorinated Biphenyls (PCB) (QCLot: 2103933)								
EP066: Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	1 mg/kg	104	62	126
EP068A: Organochlorine Pesticides (OC) (QCLot: 2103897)								
EP068: alpha-BHC	319-84-6	0.05	mg/kg	<0.05	0.5 mg/kg	78.8	69	113
EP068: Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	0.5 mg/kg	79.0	65	117
EP068: beta-BHC	319-85-7	0.05	mg/kg	<0.05	0.5 mg/kg	99.9	67	119
EP068: gamma-BHC	58-89-9	0.05	mg/kg	<0.05	0.5 mg/kg	99.0	68	116
EP068: delta-BHC	319-86-8	0.05	mg/kg	<0.05	0.5 mg/kg	80.4	65	117
EP068: Heptachlor	76-44-8	0.05	mg/kg	<0.05	0.5 mg/kg	73.3	67	115
EP068: Aldrin	309-00-2	0.05	mg/kg	<0.05	0.5 mg/kg	87.8	69	115
EP068: Heptachlor epoxide	1024-57-3	0.05	mg/kg	<0.05	0.5 mg/kg	77.8	62	118
EP068: trans-Chlordane	5103-74-2	0.05	mg/kg	<0.05	0.5 mg/kg	73.6	63	117

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP068A: Organochlorine Pesticides (OC) (QCLot: 2103897) - continued								
EP068: alpha-Endosulfan	959-98-8	0.05	mg/kg	<0.05	0.5 mg/kg	96.4	66	116
EP068: cis-Chlordane	5103-71-9	0.05	mg/kg	<0.05	0.5 mg/kg	73.3	64	116
EP068: Dieldrin	60-57-1	0.05	mg/kg	<0.05	0.5 mg/kg	96.3	66	116
EP068: 4.4`-DDE	72-55-9	0.05	mg/kg	<0.05	0.5 mg/kg	90.2	67	115
EP068: Endrin	72-20-8	0.05	mg/kg	<0.05	0.5 mg/kg	88.5	67	123
EP068: beta-Endosulfan	33213-65-9	0.05	mg/kg	<0.05	0.5 mg/kg	104	69	115
EP068: 4.4`-DDD	72-54-8	0.05	mg/kg	<0.05	0.5 mg/kg	94.9	69	121
EP068: Endrin aldehyde	7421-93-4	0.05	mg/kg	<0.05	0.5 mg/kg	80.0	56	120
EP068: Endosulfan sulfate	1031-07-8	0.05	mg/kg	<0.05	0.5 mg/kg	88.9	62	124
EP068: 4.4`-DDT	50-29-3	0.2	mg/kg	<0.2	0.5 mg/kg	87.9	66	120
EP068: Endrin ketone	53494-70-5	0.05	mg/kg	<0.05	0.5 mg/kg	86.2	64	122
EP068: Methoxychlor	72-43-5	0.2	mg/kg	<0.2	0.5 mg/kg	97.1	54	130
EP068A: Organochlorine Pesticides (OC) (QCLot: 2103934)								
EP068: alpha-BHC	319-84-6	0.05	mg/kg	<0.05	0.5 mg/kg	100	69	113
EP068: Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	0.5 mg/kg	102	65	117
EP068: beta-BHC	319-85-7	0.05	mg/kg	<0.05	0.5 mg/kg	111	67	119
EP068: gamma-BHC	58-89-9	0.05	mg/kg	<0.05	0.5 mg/kg	104	68	116
EP068: delta-BHC	319-86-8	0.05	mg/kg	<0.05	0.5 mg/kg	99.9	65	117
EP068: Heptachlor	76-44-8	0.05	mg/kg	<0.05	0.5 mg/kg	88.2	67	115
EP068: Aldrin	309-00-2	0.05	mg/kg	<0.05	0.5 mg/kg	93.3	69	115
EP068: Heptachlor epoxide	1024-57-3	0.05	mg/kg	<0.05	0.5 mg/kg	103	62	118
EP068: trans-Chlordane	5103-74-2	0.05	mg/kg	<0.05	0.5 mg/kg	97.4	63	117
EP068: alpha-Endosulfan	959-98-8	0.05	mg/kg	<0.05	0.5 mg/kg	96.3	66	116
EP068: cis-Chlordane	5103-71-9	0.05	mg/kg	<0.05	0.5 mg/kg	99.3	64	116
EP068: Dieldrin	60-57-1	0.05	mg/kg	<0.05	0.5 mg/kg	91.8	66	116
EP068: 4.4`-DDE	72-55-9	0.05	mg/kg	<0.05	0.5 mg/kg	92.9	67	115
EP068: Endrin	72-20-8	0.05	mg/kg	<0.05	0.5 mg/kg	88.0	67	123
EP068: beta-Endosulfan	33213-65-9	0.05	mg/kg	<0.05	0.5 mg/kg	103	69	115
EP068: 4.4`-DDD	72-54-8	0.05	mg/kg	<0.05	0.5 mg/kg	101	69	121
EP068: Endrin aldehyde	7421-93-4	0.05	mg/kg	<0.05	0.5 mg/kg	81.6	56	120
EP068: Endosulfan sulfate	1031-07-8	0.05	mg/kg	<0.05	0.5 mg/kg	88.7	62	124
EP068: 4.4`-DDT	50-29-3	0.2	mg/kg	<0.2	0.5 mg/kg	90.6	66	120
EP068: Endrin ketone	53494-70-5	0.05	mg/kg	<0.05	0.5 mg/kg	102	64	122
EP068: Methoxychlor	72-43-5	0.2	mg/kg	<0.2	0.5 mg/kg	87.2	54	130
EP068B: Organophosphorus Pesticides (OP) (QCLot: 2103897)								
EP068: Dichlorvos	62-73-7	0.05	mg/kg	<0.05	0.5 mg/kg	80.9	59	119
EP068: Demeton-S-methyl	919-86-8	0.05	mg/kg	<0.05	0.5 mg/kg	92.4	62	128
EP068: Monocrotophos	6923-22-4	0.2	mg/kg	<0.2	0.5 mg/kg	60.6	54	126
EP068: Dimethoate	60-51-5	0.05	mg/kg	<0.05	0.5 mg/kg	80.8	67	119

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP068B: Organophosphorus Pesticides (OP) (QCLot: 2103897) - continued								
EP068: Diazinon	333-41-5	0.05	mg/kg	<0.05	0.5 mg/kg	81.6	70	120
EP068: Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg	<0.05	0.5 mg/kg	77.3	72	120
EP068: Parathion-methyl	298-00-0	0.2	mg/kg	<0.2	0.5 mg/kg	84.6	68	120
EP068: Malathion	121-75-5	0.05	mg/kg	<0.05	0.5 mg/kg	87.4	68	122
EP068: Fenthion	55-38-9	0.05	mg/kg	<0.05	0.5 mg/kg	85.2	69	117
EP068: Chlorpyrifos	2921-88-2	0.05	mg/kg	<0.05	0.5 mg/kg	84.3	76	118
EP068: Parathion	56-38-2	0.2	mg/kg	<0.2	0.5 mg/kg	89.4	64	122
EP068: Pirimphos-ethyl	23505-41-1	0.05	mg/kg	<0.05	0.5 mg/kg	91.0	70	116
EP068: Chlorfenvinphos	470-90-6	0.05	mg/kg	<0.05	0.5 mg/kg	88.0	69	121
EP068: Bromophos-ethyl	4824-78-6	0.05	mg/kg	<0.05	0.5 mg/kg	82.5	66	118
EP068: Fenamiphos	22224-92-6	0.05	mg/kg	<0.05	0.5 mg/kg	90.1	68	124
EP068: Prothiofos	34643-46-4	0.05	mg/kg	<0.05	0.5 mg/kg	91.4	62	112
EP068: Ethion	563-12-2	0.05	mg/kg	<0.05	0.5 mg/kg	91.8	68	120
EP068: Carbophenothion	786-19-6	0.05	mg/kg	<0.05	0.5 mg/kg	91.4	65	127
EP068: Azinphos Methyl	86-50-0	0.05	mg/kg	<0.05	0.5 mg/kg	70.0	41	123
EP068B: Organophosphorus Pesticides (OP) (QCLot: 2103934)								
EP068: Dichlorvos	62-73-7	0.05	mg/kg	<0.05	0.5 mg/kg	79.8	59	119
EP068: Demeton-S-methyl	919-86-8	0.05	mg/kg	<0.05	0.5 mg/kg	85.0	62	128
EP068: Monocrotophos	6923-22-4	0.2	mg/kg	<0.2	0.5 mg/kg	77.2	54	126
EP068: Dimethoate	60-51-5	0.05	mg/kg	<0.05	0.5 mg/kg	86.0	67	119
EP068: Diazinon	333-41-5	0.05	mg/kg	<0.05	0.5 mg/kg	91.6	70	120
EP068: Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg	<0.05	0.5 mg/kg	87.6	72	120
EP068: Parathion-methyl	298-00-0	0.2	mg/kg	<0.2	0.5 mg/kg	86.0	68	120
EP068: Malathion	121-75-5	0.05	mg/kg	<0.05	0.5 mg/kg	83.8	68	122
EP068: Fenthion	55-38-9	0.05	mg/kg	<0.05	0.5 mg/kg	102	69	117
EP068: Chlorpyrifos	2921-88-2	0.05	mg/kg	<0.05	0.5 mg/kg	94.2	76	118
EP068: Parathion	56-38-2	0.2	mg/kg	<0.2	0.5 mg/kg	99.2	64	122
EP068: Pirimphos-ethyl	23505-41-1	0.05	mg/kg	<0.05	0.5 mg/kg	92.5	70	116
EP068: Chlorfenvinphos	470-90-6	0.05	mg/kg	<0.05	0.5 mg/kg	84.0	69	121
EP068: Bromophos-ethyl	4824-78-6	0.05	mg/kg	<0.05	0.5 mg/kg	92.5	66	118
EP068: Fenamiphos	22224-92-6	0.05	mg/kg	<0.05	0.5 mg/kg	92.4	68	124
EP068: Prothiofos	34643-46-4	0.05	mg/kg	<0.05	0.5 mg/kg	92.0	62	112
EP068: Ethion	563-12-2	0.05	mg/kg	<0.05	0.5 mg/kg	88.5	68	120
EP068: Carbophenothion	786-19-6	0.05	mg/kg	<0.05	0.5 mg/kg	77.2	65	127
EP068: Azinphos Methyl	86-50-0	0.05	mg/kg	<0.05	0.5 mg/kg	57.0	41	123
EP074A: Monocyclic Aromatic Hydrocarbons (QCLot: 2108013)								
EP074: Styrene	100-42-5	0.5	mg/kg	<0.5	1 mg/kg	94.2	67	113
EP074: Isopropylbenzene	98-82-8	0.5	mg/kg	<0.5	1 mg/kg	102	65	117
EP074: n-Propylbenzene	103-65-1	0.5	mg/kg	<0.5	1 mg/kg	94.2	66	122

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP074A: Monocyclic Aromatic Hydrocarbons (QCLot: 2108013) - continued								
EP074: 1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg	<0.5	1 mg/kg	94.6	68	118
EP074: sec-Butylbenzene	135-98-8	0.5	mg/kg	<0.5	1 mg/kg	97.4	69	119
EP074: 1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg	<0.5	1 mg/kg	88.9	69	117
EP074: tert-Butylbenzene	98-06-6	0.5	mg/kg	<0.5	1 mg/kg	93.5	69	115
EP074: p-Isopropyltoluene	99-87-6	0.5	mg/kg	<0.5	1 mg/kg	97.4	66	118
EP074: n-Butylbenzene	104-51-8	0.5	mg/kg	<0.5	1 mg/kg	91.0	59	125
EP074A: Monocyclic Aromatic Hydrocarbons (QCLot: 2109182)								
EP074: Styrene	100-42-5	0.5	mg/kg	<0.5	1 mg/kg	99.5	67	113
EP074: Isopropylbenzene	98-82-8	0.5	mg/kg	<0.5	1 mg/kg	105	65	117
EP074: n-Propylbenzene	103-65-1	0.5	mg/kg	<0.5	1 mg/kg	101	66	122
EP074: 1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg	<0.5	1 mg/kg	102	68	118
EP074: sec-Butylbenzene	135-98-8	0.5	mg/kg	<0.5	1 mg/kg	102	69	119
EP074: 1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg	<0.5	1 mg/kg	102	69	117
EP074: tert-Butylbenzene	98-06-6	0.5	mg/kg	<0.5	1 mg/kg	101	69	115
EP074: p-Isopropyltoluene	99-87-6	0.5	mg/kg	<0.5	1 mg/kg	103	66	118
EP074: n-Butylbenzene	104-51-8	0.5	mg/kg	<0.5	1 mg/kg	103	59	125
EP074B: Oxygenated Compounds (QCLot: 2108013)								
EP074: Vinyl Acetate	108-05-4	5	mg/kg	<5	10 mg/kg	64.6	30	156
EP074: 2-Butanone (MEK)	78-93-3	5	mg/kg	<5	10 mg/kg	82.6	58	136
EP074: 4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg	<5	10 mg/kg	78.2	62	132
EP074: 2-Hexanone (MBK)	591-78-6	5	mg/kg	<5	10 mg/kg	97.6	54	136
EP074B: Oxygenated Compounds (QCLot: 2109182)								
EP074: Vinyl Acetate	108-05-4	5	mg/kg	<5	10 mg/kg	90.6	30	156
EP074: 2-Butanone (MEK)	78-93-3	5	mg/kg	<5	10 mg/kg	102	58	136
EP074: 4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg	<5	10 mg/kg	86.9	62	132
EP074: 2-Hexanone (MBK)	591-78-6	5	mg/kg	<5	10 mg/kg	88.8	54	136
EP074C: Sulfonated Compounds (QCLot: 2108013)								
EP074: Carbon disulfide	75-15-0	0.5	mg/kg	<0.5	1 mg/kg	89.3	54	126
EP074C: Sulfonated Compounds (QCLot: 2109182)								
EP074: Carbon disulfide	75-15-0	0.5	mg/kg	<0.5	1 mg/kg	95.3	54	126
EP074D: Fumigants (QCLot: 2108013)								
EP074: 2.2-Dichloropropane	594-20-7	0.5	mg/kg	<0.5	1 mg/kg	96.8	60	126
EP074: 1.2-Dichloropropane	78-87-5	0.5	mg/kg	<0.5	1 mg/kg	111	68	124
EP074: cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg	<0.5	1 mg/kg	78.6	51	119
EP074: trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg	<0.5	1 mg/kg	74.1	52	114
EP074: 1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg	<0.5	1 mg/kg	106	63	115
EP074D: Fumigants (QCLot: 2109182)								
EP074: 2.2-Dichloropropane	594-20-7	0.5	mg/kg	<0.5	1 mg/kg	103	60	126

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP074D: Fumigants (QCLot: 2109182) - continued								
EP074: 1.2-Dichloropropane	78-87-5	0.5	mg/kg	<0.5	1 mg/kg	93.4	68	124
EP074: cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg	<0.5	1 mg/kg	94.9	51	119
EP074: trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg	<0.5	1 mg/kg	94.0	52	114
EP074: 1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg	<0.5	1 mg/kg	98.6	63	115
EP074E: Halogenated Aliphatic Compounds (QCLot: 2108013)								
EP074: Dichlorodifluoromethane	75-71-8	5	mg/kg	<5	10 mg/kg	103	30	148
EP074: Chloromethane	74-87-3	5	mg/kg	<5	10 mg/kg	111	41	141
EP074: Vinyl chloride	75-01-4	5	mg/kg	<5	10 mg/kg	97.9	43	147
EP074: Bromomethane	74-83-9	5	mg/kg	<5	10 mg/kg	97.1	47	141
EP074: Chloroethane	75-00-3	5	mg/kg	<5	10 mg/kg	106	49	143
EP074: Trichlorofluoromethane	75-69-4	5	mg/kg	<5	10 mg/kg	96.5	49	135
EP074: 1.1-Dichloroethene	75-35-4	0.5	mg/kg	<0.5	1 mg/kg	96.2	54	126
EP074: Iodomethane	74-88-4	0.5	mg/kg	<0.5	1 mg/kg	56.9	43	129
EP074: trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg	<0.5	1 mg/kg	99.9	64	120
EP074: 1.1-Dichloroethane	75-34-3	0.5	mg/kg	<0.5	1 mg/kg	92.9	67	125
EP074: cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg	<0.5	1 mg/kg	100	69	121
EP074: 1.1.1-Trichloroethane	71-55-6	0.5	mg/kg	<0.5	1 mg/kg	106	65	117
EP074: 1.1-Dichloropropylene	563-58-6	0.5	mg/kg	<0.5	1 mg/kg	102	65	123
EP074: Carbon Tetrachloride	56-23-5	0.5	mg/kg	<0.5	1 mg/kg	89.1	59	125
EP074: 1.2-Dichloroethane	107-06-2	0.5	mg/kg	<0.5	1 mg/kg	99.6	65	125
EP074: Trichloroethene	79-01-6	0.5	mg/kg	<0.5	1 mg/kg	110	70	118
EP074: Dibromomethane	74-95-3	0.5	mg/kg	<0.5	1 mg/kg	99.3	68	118
EP074: 1.1.2-Trichloroethane	79-00-5	0.5	mg/kg	<0.5	1 mg/kg	104	64	126
EP074: 1.3-Dichloropropane	142-28-9	0.5	mg/kg	<0.5	1 mg/kg	97.7	68	122
EP074: Tetrachloroethene	127-18-4	0.5	mg/kg	<0.5	1 mg/kg	110	67	143
EP074: 1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg	<0.5	1 mg/kg	97.8	62	122
EP074: trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg	<0.5	1 mg/kg	79.8	54	128
EP074: cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg	<0.5	1 mg/kg	84.1	55	129
EP074: 1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg	<0.5	1 mg/kg	92.9	65	121
EP074: 1.2.3-Trichloropropane	96-18-4	0.5	mg/kg	<0.5	1 mg/kg	97.6	61	125
EP074: Pentachloroethane	76-01-7	0.5	mg/kg	<0.5	1 mg/kg	87.3	20	134
EP074: 1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg	<0.5	1 mg/kg	87.7	53	129
EP074E: Halogenated Aliphatic Compounds (QCLot: 2109182)								
EP074: Dichlorodifluoromethane	75-71-8	5	mg/kg	<5	10 mg/kg	62.1	30	148
EP074: Chloromethane	74-87-3	5	mg/kg	<5	10 mg/kg	78.3	41	141
EP074: Vinyl chloride	75-01-4	5	mg/kg	<5	10 mg/kg	97.0	43	147
EP074: Bromomethane	74-83-9	5	mg/kg	<5	10 mg/kg	88.8	47	141
EP074: Chloroethane	75-00-3	5	mg/kg	<5	10 mg/kg	91.7	49	143
EP074: Trichlorofluoromethane	75-69-4	5	mg/kg	<5	10 mg/kg	95.8	49	135

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP074E: Halogenated Aliphatic Compounds (QCLot: 2109182) - continued								
EP074: 1.1-Dichloroethene	75-35-4	0.5	mg/kg	<0.5	1 mg/kg	98.8	54	126
EP074: Iodomethane	74-88-4	0.5	mg/kg	<0.5	1 mg/kg	81.7	43	129
EP074: trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg	<0.5	1 mg/kg	104	64	120
EP074: 1.1-Dichloroethane	75-34-3	0.5	mg/kg	<0.5	1 mg/kg	96.2	67	125
EP074: cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg	<0.5	1 mg/kg	97.5	69	121
EP074: 1.1.1-Trichloroethane	71-55-6	0.5	mg/kg	<0.5	1 mg/kg	99.4	65	117
EP074: 1.1-Dichloropropylene	563-58-6	0.5	mg/kg	<0.5	1 mg/kg	99.2	65	123
EP074: Carbon Tetrachloride	56-23-5	0.5	mg/kg	<0.5	1 mg/kg	99.1	59	125
EP074: 1.2-Dichloroethane	107-06-2	0.5	mg/kg	<0.5	1 mg/kg	86.9	65	125
EP074: Trichloroethene	79-01-6	0.5	mg/kg	<0.5	1 mg/kg	97.6	70	118
EP074: Dibromomethane	74-95-3	0.5	mg/kg	<0.5	1 mg/kg	92.0	68	118
EP074: 1.1.2-Trichloroethane	79-00-5	0.5	mg/kg	<0.5	1 mg/kg	98.5	64	126
EP074: 1.3-Dichloropropane	142-28-9	0.5	mg/kg	<0.5	1 mg/kg	98.3	68	122
EP074: Tetrachloroethene	127-18-4	0.5	mg/kg	<0.5	1 mg/kg	114	67	143
EP074: 1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg	<0.5	1 mg/kg	101	62	122
EP074: trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg	<0.5	1 mg/kg	98.1	54	128
EP074: cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg	<0.5	1 mg/kg	104	55	129
EP074: 1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg	<0.5	1 mg/kg	95.5	65	121
EP074: 1.2.3-Trichloropropane	96-18-4	0.5	mg/kg	<0.5	1 mg/kg	93.8	61	125
EP074: Pentachloroethane	76-01-7	0.5	mg/kg	<0.5	1 mg/kg	99.8	20	134
EP074: 1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg	<0.5	1 mg/kg	83.3	53	129
EP074F: Halogenated Aromatic Compounds (QCLot: 2108013)								
EP074: Chlorobenzene	108-90-7	0.5	mg/kg	<0.5	1 mg/kg	106	68	116
EP074: Bromobenzene	108-86-1	0.5	mg/kg	<0.5	1 mg/kg	93.2	70	114
EP074: 2-Chlorotoluene	95-49-8	0.5	mg/kg	<0.5	1 mg/kg	89.4	68	122
EP074: 4-Chlorotoluene	106-43-4	0.5	mg/kg	<0.5	1 mg/kg	92.2	67	123
EP074: 1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg	<0.5	1 mg/kg	95.0	52	122
EP074F: Halogenated Aromatic Compounds (QCLot: 2109182)								
EP074: Chlorobenzene	108-90-7	0.5	mg/kg	<0.5	1 mg/kg	105	68	116
EP074: Bromobenzene	108-86-1	0.5	mg/kg	<0.5	1 mg/kg	97.7	70	114
EP074: 2-Chlorotoluene	95-49-8	0.5	mg/kg	<0.5	1 mg/kg	97.1	68	122
EP074: 4-Chlorotoluene	106-43-4	0.5	mg/kg	<0.5	1 mg/kg	96.5	67	123
EP074: 1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg	<0.5	1 mg/kg	104	52	122
EP074G: Trihalomethanes (QCLot: 2108013)								
EP074: Chloroform	67-66-3	0.5	mg/kg	<0.5	1 mg/kg	93.9	66	124
EP074: Bromodichloromethane	75-27-4	0.5	mg/kg	<0.5	1 mg/kg	95.2	61	121
EP074: Dibromochloromethane	124-48-1	0.5	mg/kg	<0.5	1 mg/kg	87.7	63	121
EP074: Bromoform	75-25-2	0.5	mg/kg	<0.5	1 mg/kg	82.3	60	126

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP074G: Trihalomethanes (QCLot: 2109182)								
EP074: Chloroform	67-66-3	0.5	mg/kg	<0.5	1 mg/kg	94.8	66	124
EP074: Bromodichloromethane	75-27-4	0.5	mg/kg	<0.5	1 mg/kg	94.0	61	121
EP074: Dibromochloromethane	124-48-1	0.5	mg/kg	<0.5	1 mg/kg	102	63	121
EP074: Bromoform	75-25-2	0.5	mg/kg	<0.5	1 mg/kg	96.5	60	126
EP075A: Phenolic Compounds (QCLot: 2103895)								
EP075: Phenol	108-95-2	0.5	mg/kg	<0.5	1.5 mg/kg	99.6	64	114
EP075: 2-Chlorophenol	95-57-8	0.5	mg/kg	<0.5	1.5 mg/kg	96.8	57	115
EP075: 2-Methylphenol	95-48-7	0.5	mg/kg	<0.5	1.5 mg/kg	100	55	117
EP075: 3- & 4-Methylphenol	1319-77-3	0.5	mg/kg	<0.5	1.5 mg/kg	99.0	46	122
EP075: 2-Nitrophenol	88-75-5	0.5	mg/kg	<0.5	1.5 mg/kg	98.6	47	117
EP075: 2.4-Dimethylphenol	105-67-9	0.5	mg/kg	<0.5	1.5 mg/kg	97.9	14	108
EP075: 2.4-Dichlorophenol	120-83-2	0.5	mg/kg	<0.5	1.5 mg/kg	101	47	105
EP075: 2.6-Dichlorophenol	87-65-0	0.5	mg/kg	<0.5	1.5 mg/kg	100	48	110
EP075: 4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg	<0.5	1.5 mg/kg	99.8	57	113
EP075: 2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg	<0.5	1.5 mg/kg	96.5	49	109
EP075: 2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg	<0.5	1.5 mg/kg	93.0	49	107
EP075: Pentachlorophenol	87-86-5	1	mg/kg	<1	3 mg/kg	50.4	12	76
EP075A: Phenolic Compounds (QCLot: 2103932)								
EP075: Phenol	108-95-2	0.5	mg/kg	<0.5	1.5 mg/kg	96.9	64	114
EP075: 2-Chlorophenol	95-57-8	0.5	mg/kg	<0.5	1.5 mg/kg	95.6	57	115
EP075: 2-Methylphenol	95-48-7	0.5	mg/kg	<0.5	1.5 mg/kg	93.2	55	117
EP075: 3- & 4-Methylphenol	1319-77-3	0.5	mg/kg	<0.5	1.5 mg/kg	99.8	46	122
EP075: 2-Nitrophenol	88-75-5	0.5	mg/kg	<0.5	1.5 mg/kg	92.5	47	117
EP075: 2.4-Dimethylphenol	105-67-9	0.5	mg/kg	<0.5	1.5 mg/kg	99.4	14	108
EP075: 2.4-Dichlorophenol	120-83-2	0.5	mg/kg	<0.5	1.5 mg/kg	94.8	47	105
EP075: 2.6-Dichlorophenol	87-65-0	0.5	mg/kg	<0.5	1.5 mg/kg	100	48	110
EP075: 4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg	<0.5	1.5 mg/kg	101	57	113
EP075: 2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg	<0.5	1.5 mg/kg	97.1	49	109
EP075: 2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg	<0.5	1.5 mg/kg	99.9	49	107
EP075: Pentachlorophenol	87-86-5	1	mg/kg	<1	3 mg/kg	35.1	12	76
EP075B: Polynuclear Aromatic Hydrocarbons (QCLot: 2103895)								
EP075: Naphthalene	91-20-3	0.5	mg/kg	<0.5	1.5 mg/kg	100	62	118
EP075: 2-Methylnaphthalene	91-57-6	0.5	mg/kg	<0.5	1.5 mg/kg	102	58	116
EP075: 2-Chloronaphthalene	91-58-7	0.5	mg/kg	<0.5	1.5 mg/kg	102	54	112
EP075: Acenaphthylene	208-96-8	0.5	mg/kg	<0.5	1.5 mg/kg	102	56	114
EP075: Acenaphthene	83-32-9	0.5	mg/kg	<0.5	1.5 mg/kg	100.0	62	112
EP075: Fluorene	86-73-7	0.5	mg/kg	<0.5	1.5 mg/kg	95.0	59	115
EP075: Phenanthrene	85-01-8	0.5	mg/kg	<0.5	1.5 mg/kg	101	63	113

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP075B: Polynuclear Aromatic Hydrocarbons (QCLot: 2103895) - continued								
EP075: Anthracene	120-12-7	0.5	mg/kg	<0.5	1.5 mg/kg	96.5	57	111
EP075: Fluoranthene	206-44-0	0.5	mg/kg	<0.5	1.5 mg/kg	93.1	58	114
EP075: Pyrene	129-00-0	0.5	mg/kg	<0.5	1.5 mg/kg	96.4	57	117
EP075: N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg	<0.5	1.5 mg/kg	89.7	58	114
EP075: Benz(a)anthracene	56-55-3	0.5	mg/kg	<0.5	1.5 mg/kg	102	59	115
EP075: Chrysene	218-01-9	0.5	mg/kg	<0.5	1.5 mg/kg	102	61	117
EP075: Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg	<1	3 mg/kg	108	57	119
EP075: 7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg	<0.5	1.5 mg/kg	94.4	48	106
EP075: Benzo(a)pyrene	50-32-8	0.5	mg/kg	<0.5	1.5 mg/kg	91.6	56	116
EP075: 3-Methylcholanthrene	56-49-5	0.5	mg/kg	<0.5	1.5 mg/kg	101	50	116
EP075: Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg	<0.5	1.5 mg/kg	99.6	55	117
EP075: Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg	<0.5	1.5 mg/kg	100	53	119
EP075: Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg	<0.5	1.5 mg/kg	101	56	120
EP075B: Polynuclear Aromatic Hydrocarbons (QCLot: 2103932)								
EP075: Naphthalene	91-20-3	0.5	mg/kg	<0.5	1.5 mg/kg	96.3	62	118
EP075: 2-Methylnaphthalene	91-57-6	0.5	mg/kg	<0.5	1.5 mg/kg	98.8	58	116
EP075: 2-Chloronaphthalene	91-58-7	0.5	mg/kg	<0.5	1.5 mg/kg	100	54	112
EP075: Acenaphthylene	208-96-8	0.5	mg/kg	<0.5	1.5 mg/kg	99.9	56	114
EP075: Acenaphthene	83-32-9	0.5	mg/kg	<0.5	1.5 mg/kg	94.7	62	112
EP075: Fluorene	86-73-7	0.5	mg/kg	<0.5	1.5 mg/kg	102	59	115
EP075: Phenanthrene	85-01-8	0.5	mg/kg	<0.5	1.5 mg/kg	96.1	63	113
EP075: Anthracene	120-12-7	0.5	mg/kg	<0.5	1.5 mg/kg	95.6	57	111
EP075: Fluoranthene	206-44-0	0.5	mg/kg	<0.5	1.5 mg/kg	91.1	58	114
EP075: Pyrene	129-00-0	0.5	mg/kg	<0.5	1.5 mg/kg	102	57	117
EP075: N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg	<0.5	1.5 mg/kg	85.2	58	114
EP075: Benz(a)anthracene	56-55-3	0.5	mg/kg	<0.5	1.5 mg/kg	98.5	59	115
EP075: Chrysene	218-01-9	0.5	mg/kg	<0.5	1.5 mg/kg	89.3	61	117
EP075: Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg	<1	3 mg/kg	102	57	119
EP075: 7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg	<0.5	1.5 mg/kg	102	48	106
EP075: Benzo(a)pyrene	50-32-8	0.5	mg/kg	<0.5	1.5 mg/kg	106	56	116
EP075: 3-Methylcholanthrene	56-49-5	0.5	mg/kg	<0.5	1.5 mg/kg	93.7	50	116
EP075: Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg	<0.5	1.5 mg/kg	93.9	55	117
EP075: Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg	<0.5	1.5 mg/kg	95.5	53	119
EP075: Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg	<0.5	1.5 mg/kg	97.0	56	120
EP075C: Phthalate Esters (QCLot: 2103895)								
EP075: Dimethyl phthalate	131-11-3	0.5	mg/kg	<0.5	1.5 mg/kg	108	60	118
EP075: Diethyl phthalate	84-66-2	0.5	mg/kg	<0.5	1.5 mg/kg	105	65	115

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP075C: Phthalate Esters (QCLot: 2103895) - continued								
EP075: Di-n-butyl phthalate	84-74-2	0.5	mg/kg	<0.5	1.5 mg/kg	94.3	65	121
EP075: Butyl benzyl phthalate	85-68-7	0.5	mg/kg	<0.5	1.5 mg/kg	90.3	62	116
EP075: bis(2-ethylhexyl) phthalate	117-81-7	----	mg/kg	----	1.5 mg/kg	92.7	69	133
EP075: Di-n-octylphthalate	117-84-0	0.5	mg/kg	<0.5	1.5 mg/kg	94.2	62	124
EP075C: Phthalate Esters (QCLot: 2103932)								
EP075: Dimethyl phthalate	131-11-3	0.5	mg/kg	<0.5	1.5 mg/kg	99.1	60	118
EP075: Diethyl phthalate	84-66-2	0.5	mg/kg	<0.5	1.5 mg/kg	102	65	115
EP075: Di-n-butyl phthalate	84-74-2	0.5	mg/kg	<0.5	1.5 mg/kg	94.3	65	121
EP075: Butyl benzyl phthalate	85-68-7	0.5	mg/kg	<0.5	1.5 mg/kg	101	62	116
EP075: bis(2-ethylhexyl) phthalate	117-81-7	----	mg/kg	----	1.5 mg/kg	86.9	69	133
EP075: Di-n-octylphthalate	117-84-0	0.5	mg/kg	<0.5	1.5 mg/kg	87.6	62	124
EP075D: Nitrosamines (QCLot: 2103895)								
EP075: N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg	<0.5	1.5 mg/kg	89.4	39	124
EP075: N-Nitrosodiethylamine	55-18-5	0.5	mg/kg	<0.5	1.5 mg/kg	95.5	59	117
EP075: N-Nitrosopyrrolidine	930-55-2	0.5	mg/kg	<0.5	1.5 mg/kg	111	53	125
EP075: N-Nitrosomorpholine	59-89-2	0.5	mg/kg	<0.5	1.5 mg/kg	102	65	121
EP075: N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg	<0.5	1.5 mg/kg	98.1	59	123
EP075: N-Nitrosopiperidine	100-75-4	0.5	mg/kg	<0.5	1.5 mg/kg	100	57	115
EP075: N-Nitrosodibutylamine	924-16-3	0.5	mg/kg	<0.5	1.5 mg/kg	99.4	57	119
EP075: N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	0.5	mg/kg	<0.6	3 mg/kg	103	42	112
EP075: Methapyrilene	91-80-5	0.5	mg/kg	<0.5	1.5 mg/kg	98.5	16	123
EP075D: Nitrosamines (QCLot: 2103932)								
EP075: N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg	<0.5	1.5 mg/kg	79.9	39	124
EP075: N-Nitrosodiethylamine	55-18-5	0.5	mg/kg	<0.5	1.5 mg/kg	90.2	59	117
EP075: N-Nitrosopyrrolidine	930-55-2	0.5	mg/kg	<0.5	1.5 mg/kg	105	53	125
EP075: N-Nitrosomorpholine	59-89-2	0.5	mg/kg	<0.5	1.5 mg/kg	92.2	65	121
EP075: N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg	<0.5	1.5 mg/kg	94.7	59	123
EP075: N-Nitrosopiperidine	100-75-4	0.5	mg/kg	<0.5	1.5 mg/kg	98.0	57	115
EP075: N-Nitrosodibutylamine	924-16-3	0.5	mg/kg	<0.5	1.5 mg/kg	95.4	57	119
EP075: N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	0.5	mg/kg	<0.6	3 mg/kg	98.9	42	112
EP075: Methapyrilene	91-80-5	0.5	mg/kg	<0.5	1.5 mg/kg	92.4	16	123
EP075E: Nitroaromatics and Ketones (QCLot: 2103895)								
EP075: 2-Picoline	109-06-8	0.5	mg/kg	<0.5	1.5 mg/kg	85.3	27	129
EP075: Acetophenone	98-86-2	0.5	mg/kg	<0.5	1.5 mg/kg	101	60	116
EP075: Nitrobenzene	98-95-3	0.5	mg/kg	<0.5	1.5 mg/kg	96.3	65	119
EP075: Isophorone	78-59-1	0.5	mg/kg	<0.5	1.5 mg/kg	96.8	62	116

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP075E: Nitroaromatics and Ketones (QCLot: 2103895) - continued								
EP075: 2.6-Dinitrotoluene	606-20-2	0.5	mg/kg	<0.5	1.5 mg/kg	96.9	58	118
EP075: 2.4-Dinitrotoluene	121-14-2	0.5	mg/kg	<0.5	1.5 mg/kg	98.1	59	115
EP075: 1-Naphthylamine	134-32-7	0.5	mg/kg	<0.5	1.5 mg/kg	98.5	18	112
EP075: 4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg	<0.5	1.5 mg/kg	80.6	10	87
EP075: 5-Nitro-o-toluidine	99-55-8	0.5	mg/kg	<0.5	1.5 mg/kg	98.2	48	99
EP075: Azobenzene	103-33-3	1	mg/kg	<1	1.5 mg/kg	94.0	62	118
EP075: 1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg	<0.5	1.5 mg/kg	89.4	36	114
EP075: Phenacetin	62-44-2	0.5	mg/kg	<0.5	1.5 mg/kg	101	62	114
EP075: 4-Aminobiphenyl	92-67-1	0.5	mg/kg	<0.5	1.5 mg/kg	86.0	36	102
EP075: Pentachloronitrobenzene	82-68-8	0.5	mg/kg	<0.5	1.5 mg/kg	96.9	56	110
EP075: Pronamide	23950-58-5	0.5	mg/kg	<0.5	1.5 mg/kg	102	54	110
EP075: Dimethylaminoazobenzene	60-11-7	0.5	mg/kg	<0.5	1.5 mg/kg	100	48	108
EP075: Chlorobenzilate	510-15-6	0.5	mg/kg	<0.5	1.5 mg/kg	92.6	57	112
EP075E: Nitroaromatics and Ketones (QCLot: 2103932)								
EP075: 2-Picoline	109-06-8	0.5	mg/kg	<0.5	1.5 mg/kg	95.1	27	129
EP075: Acetophenone	98-86-2	0.5	mg/kg	<0.5	1.5 mg/kg	93.2	60	116
EP075: Nitrobenzene	98-95-3	0.5	mg/kg	<0.5	1.5 mg/kg	79.2	65	119
EP075: Isophorone	78-59-1	0.5	mg/kg	<0.5	1.5 mg/kg	93.3	62	116
EP075: 2.6-Dinitrotoluene	606-20-2	0.5	mg/kg	<0.5	1.5 mg/kg	98.5	58	118
EP075: 2.4-Dinitrotoluene	121-14-2	0.5	mg/kg	<0.5	1.5 mg/kg	95.4	59	115
EP075: 1-Naphthylamine	134-32-7	0.5	mg/kg	<0.5	1.5 mg/kg	74.9	18	112
EP075: 4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg	<0.5	1.5 mg/kg	82.8	10	87
EP075: 5-Nitro-o-toluidine	99-55-8	0.5	mg/kg	<0.5	1.5 mg/kg	92.2	48	99
EP075: Azobenzene	103-33-3	1	mg/kg	<1	1.5 mg/kg	86.7	62	118
EP075: 1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg	<0.5	1.5 mg/kg	97.6	36	114
EP075: Phenacetin	62-44-2	0.5	mg/kg	<0.5	1.5 mg/kg	102	62	114
EP075: 4-Aminobiphenyl	92-67-1	0.5	mg/kg	<0.5	1.5 mg/kg	89.7	36	102
EP075: Pentachloronitrobenzene	82-68-8	0.5	mg/kg	<0.5	1.5 mg/kg	97.5	56	110
EP075: Pronamide	23950-58-5	0.5	mg/kg	<0.5	1.5 mg/kg	93.3	54	110
EP075: Dimethylaminoazobenzene	60-11-7	0.5	mg/kg	<0.5	1.5 mg/kg	94.7	48	108
EP075: Chlorobenzilate	510-15-6	0.5	mg/kg	<0.5	1.5 mg/kg	108	57	112
EP075F: Haloethers (QCLot: 2103895)								
EP075: Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg	<0.5	1.5 mg/kg	81.2	63	121
EP075: Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg	<0.5	1.5 mg/kg	93.1	59	115
EP075: 4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg	<0.5	1.5 mg/kg	107	58	112
EP075: 4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg	<0.5	1.5 mg/kg	97.5	58	110
EP075F: Haloethers (QCLot: 2103932)								
EP075: Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg	<0.5	1.5 mg/kg	95.4	63	121

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP075F: Haloethers (QCLot: 2103932) - continued								
EP075: Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg	<0.5	1.5 mg/kg	90.0	59	115
EP075: 4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg	<0.5	1.5 mg/kg	103	58	112
EP075: 4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg	<0.5	1.5 mg/kg	101	58	110
EP075G: Chlorinated Hydrocarbons (QCLot: 2103895)								
EP075: 1.3-Dichlorobenzene	541-73-1	0.5	mg/kg	<0.5	1.5 mg/kg	98.4	58	112
EP075: 1.4-Dichlorobenzene	106-46-7	0.5	mg/kg	<0.5	1.5 mg/kg	98.9	58	116
EP075: 1.2-Dichlorobenzene	95-50-1	0.5	mg/kg	<0.5	1.5 mg/kg	105	57	115
EP075: Hexachloroethane	67-72-1	0.5	mg/kg	<0.5	1.5 mg/kg	104	54	116
EP075: 1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg	<0.5	1.5 mg/kg	105	63	108
EP075: Hexachloropropylene	1888-71-7	0.5	mg/kg	<0.5	1.5 mg/kg	105	39	110
EP075: Hexachlorobutadiene	87-68-3	0.5	mg/kg	<0.5	1.5 mg/kg	108	59	117
EP075: Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg	<2.5	1.5 mg/kg	63.6	24	108
EP075: Pentachlorobenzene	608-93-5	0.5	mg/kg	<0.5	1.5 mg/kg	101	57	109
EP075: Hexachlorobenzene (HCB)	118-74-1	0.5	mg/kg	<0.5	1.5 mg/kg	105	59	111
EP075G: Chlorinated Hydrocarbons (QCLot: 2103932)								
EP075: 1.3-Dichlorobenzene	541-73-1	0.5	mg/kg	<0.5	1.5 mg/kg	96.0	58	112
EP075: 1.4-Dichlorobenzene	106-46-7	0.5	mg/kg	<0.5	1.5 mg/kg	94.5	58	116
EP075: 1.2-Dichlorobenzene	95-50-1	0.5	mg/kg	<0.5	1.5 mg/kg	98.2	57	115
EP075: Hexachloroethane	67-72-1	0.5	mg/kg	<0.5	1.5 mg/kg	105	54	116
EP075: 1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg	<0.5	1.5 mg/kg	102	63	108
EP075: Hexachloropropylene	1888-71-7	0.5	mg/kg	<0.5	1.5 mg/kg	109	39	110
EP075: Hexachlorobutadiene	87-68-3	0.5	mg/kg	<0.5	1.5 mg/kg	105	59	117
EP075: Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg	<2.5	1.5 mg/kg	79.7	24	108
EP075: Pentachlorobenzene	608-93-5	0.5	mg/kg	<0.5	1.5 mg/kg	104	57	109
EP075: Hexachlorobenzene (HCB)	118-74-1	0.5	mg/kg	<0.5	1.5 mg/kg	102	59	111
EP075H: Anilines and Benzidines (QCLot: 2103895)								
EP075: Aniline	62-53-3	0.5	mg/kg	<0.5	1.5 mg/kg	73.3	13	108
EP075: 4-Chloroaniline	106-47-8	0.5	mg/kg	<0.5	1.5 mg/kg	74.3	21	99
EP075: 2-Nitroaniline	88-74-4	0.5	mg/kg	<0.5	1.5 mg/kg	95.0	52	112
EP075: 3-Nitroaniline	99-09-2	0.5	mg/kg	<0.5	1.5 mg/kg	88.8	32	94
EP075: Dibenzofuran	132-64-9	0.5	mg/kg	<0.5	1.5 mg/kg	103	60	110
EP075: 4-Nitroaniline	100-01-8	0.5	mg/kg	<0.5	1.5 mg/kg	67.0	42	112
EP075: Carbazole	86-74-8	0.5	mg/kg	<0.5	1.5 mg/kg	89.1	59	111
EP075: 3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg	<0.5	1.5 mg/kg	101	23	113
EP075H: Anilines and Benzidines (QCLot: 2103932)								
EP075: Aniline	62-53-3	0.5	mg/kg	<0.5	1.5 mg/kg	91.0	13	108
EP075: 4-Chloroaniline	106-47-8	0.5	mg/kg	<0.5	1.5 mg/kg	75.5	21	99
EP075: 2-Nitroaniline	88-74-4	0.5	mg/kg	<0.5	1.5 mg/kg	91.8	52	112

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP075H: Anilines and Benzidines (QCLot: 2103932) - continued								
EP075: 3-Nitroaniline	99-09-2	0.5	mg/kg	<0.5	1.5 mg/kg	89.1	32	94
EP075: Dibenzofuran	132-64-9	0.5	mg/kg	<0.5	1.5 mg/kg	97.3	60	110
EP075: 4-Nitroaniline	100-01-8	0.5	mg/kg	<0.5	1.5 mg/kg	92.6	42	112
EP075: Carbazole	86-74-8	0.5	mg/kg	<0.5	1.5 mg/kg	93.8	59	111
EP075: 3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg	<0.5	1.5 mg/kg	101	23	113
EP075I: Organochlorine Pesticides (QCLot: 2103895)								
EP075: alpha-BHC	319-84-6	0.5	mg/kg	<0.5	1.5 mg/kg	96.3	63	113
EP075: beta-BHC	319-85-7	0.5	mg/kg	<0.5	1.5 mg/kg	97.0	57	113
EP075: gamma-BHC	58-89-9	0.5	mg/kg	<0.5	1.5 mg/kg	94.8	61	117
EP075: delta-BHC	319-86-8	0.5	mg/kg	<0.5	1.5 mg/kg	102	64	118
EP075: Heptachlor	76-44-8	0.5	mg/kg	<0.5	1.5 mg/kg	93.4	55	115
EP075: Aldrin	309-00-2	0.5	mg/kg	<0.5	1.5 mg/kg	95.3	61	115
EP075: Heptachlor epoxide	1024-57-3	0.5	mg/kg	<0.5	1.5 mg/kg	96.8	56	118
EP075: alpha-Endosulfan	959-98-8	0.5	mg/kg	<0.5	1.5 mg/kg	86.6	65	125
EP075: 4.4`-DDE	72-55-9	0.5	mg/kg	<0.5	1.5 mg/kg	101	60	116
EP075: Dieldrin	60-57-1	0.5	mg/kg	<0.5	1.5 mg/kg	96.5	64	118
EP075: Endrin	72-20-8	0.5	mg/kg	<0.5	1.5 mg/kg	92.0	53	117
EP075: beta-Endosulfan	33213-65-9	0.5	mg/kg	<0.5	1.5 mg/kg	89.9	65	115
EP075: 4.4`-DDD	72-54-8	0.5	mg/kg	<0.5	1.5 mg/kg	95.8	62	118
EP075: Endosulfan sulfate	1031-07-8	0.5	mg/kg	<0.5	1.5 mg/kg	93.2	63	129
EP075: 4.4`-DDT	50-29-3	0.5	mg/kg	<0.5	1.5 mg/kg	97.6	46	122
EP075I: Organochlorine Pesticides (QCLot: 2103932)								
EP075: alpha-BHC	319-84-6	0.5	mg/kg	<0.5	1.5 mg/kg	103	63	113
EP075: beta-BHC	319-85-7	0.5	mg/kg	<0.5	1.5 mg/kg	93.1	57	113
EP075: gamma-BHC	58-89-9	0.5	mg/kg	<0.5	1.5 mg/kg	94.7	61	117
EP075: delta-BHC	319-86-8	0.5	mg/kg	<0.5	1.5 mg/kg	96.4	64	118
EP075: Heptachlor	76-44-8	0.5	mg/kg	<0.5	1.5 mg/kg	104	55	115
EP075: Aldrin	309-00-2	0.5	mg/kg	<0.5	1.5 mg/kg	102	61	115
EP075: Heptachlor epoxide	1024-57-3	0.5	mg/kg	<0.5	1.5 mg/kg	103	56	118
EP075: alpha-Endosulfan	959-98-8	0.5	mg/kg	<0.5	1.5 mg/kg	99.9	65	125
EP075: 4.4`-DDE	72-55-9	0.5	mg/kg	<0.5	1.5 mg/kg	96.4	60	116
EP075: Dieldrin	60-57-1	0.5	mg/kg	<0.5	1.5 mg/kg	93.8	64	118
EP075: Endrin	72-20-8	0.5	mg/kg	<0.5	1.5 mg/kg	99.9	53	117
EP075: beta-Endosulfan	33213-65-9	0.5	mg/kg	<0.5	1.5 mg/kg	99.8	65	115
EP075: 4.4`-DDD	72-54-8	0.5	mg/kg	<0.5	1.5 mg/kg	92.8	62	118
EP075: Endosulfan sulfate	1031-07-8	0.5	mg/kg	<0.5	1.5 mg/kg	97.6	63	129
EP075: 4.4`-DDT	50-29-3	0.5	mg/kg	<0.5	1.5 mg/kg	93.9	46	122
EP075J: Organophosphorus Pesticides (QCLot: 2103895)								

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP075J: Organophosphorus Pesticides (QCLot: 2103895) - continued								
EP075: Dichlorvos	62-73-7	0.5	mg/kg	<0.5	1.5 mg/kg	63.0	46	112
EP075: Dimethoate	60-51-5	0.5	mg/kg	<0.5	1.5 mg/kg	78.6	63	119
EP075: Diazinon	333-41-5	0.5	mg/kg	<0.5	1.5 mg/kg	97.8	68	134
EP075: Chlorpyrifos-methyl	5598-13-0	0.5	mg/kg	<0.5	1.5 mg/kg	92.9	60	130
EP075: Malathion	121-75-5	0.5	mg/kg	<0.5	1.5 mg/kg	97.7	65	127
EP075: Fenthion	55-38-9	0.5	mg/kg	<0.5	1.5 mg/kg	104	60	116
EP075: Chlorpyrifos	2921-88-2	0.5	mg/kg	<0.5	1.5 mg/kg	103	63	113
EP075: Pirimphos-ethyl	23505-41-1	0.5	mg/kg	<0.5	1.5 mg/kg	93.3	65	115
EP075: Chlorfenvinphos	470-90-6	0.5	mg/kg	<0.5	1.5 mg/kg	93.6	59	103
EP075: Prothiofos	34643-46-4	0.5	mg/kg	<0.5	1.5 mg/kg	105	59	119
EP075: Ethion	563-12-2	0.5	mg/kg	<0.5	1.5 mg/kg	102	62	118
EP075J: Organophosphorus Pesticides (QCLot: 2103932)								
EP075: Dichlorvos	62-73-7	0.5	mg/kg	<0.5	1.5 mg/kg	61.5	46	112
EP075: Dimethoate	60-51-5	0.5	mg/kg	<0.5	1.5 mg/kg	86.3	63	119
EP075: Diazinon	333-41-5	0.5	mg/kg	<0.5	1.5 mg/kg	90.7	68	134
EP075: Chlorpyrifos-methyl	5598-13-0	0.5	mg/kg	<0.5	1.5 mg/kg	107	60	130
EP075: Malathion	121-75-5	0.5	mg/kg	<0.5	1.5 mg/kg	104	65	127
EP075: Fenthion	55-38-9	0.5	mg/kg	<0.5	1.5 mg/kg	108	60	116
EP075: Chlorpyrifos	2921-88-2	0.5	mg/kg	<0.5	1.5 mg/kg	97.3	63	113
EP075: Pirimphos-ethyl	23505-41-1	0.5	mg/kg	<0.5	1.5 mg/kg	97.4	65	115
EP075: Chlorfenvinphos	470-90-6	0.5	mg/kg	<0.5	1.5 mg/kg	92.8	59	103
EP075: Prothiofos	34643-46-4	0.5	mg/kg	<0.5	1.5 mg/kg	99.0	59	119
EP075: Ethion	563-12-2	0.5	mg/kg	<0.5	1.5 mg/kg	99.3	62	118
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2103898)								
EP071: C10 - C14 Fraction	----	50	mg/kg	<50	300 mg/kg	106	75	129
EP071: C15 - C28 Fraction	----	100	mg/kg	<100	450 mg/kg	103	77	131
EP071: C29 - C36 Fraction	----	100	mg/kg	<100	300 mg/kg	106	71	129
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2103935)								
EP071: C10 - C14 Fraction	----	50	mg/kg	<50	300 mg/kg	103	75	129
EP071: C15 - C28 Fraction	----	100	mg/kg	<100	450 mg/kg	102	77	131
EP071: C29 - C36 Fraction	----	100	mg/kg	<100	300 mg/kg	101	71	129
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2108018)								
EP080: C6 - C9 Fraction	----	10	mg/kg	<10	26 mg/kg	102	68	128
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2109183)								
EP080: C6 - C9 Fraction	----	10	mg/kg	<10	26 mg/kg	91.4	68	128
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2103898)								
EP071: >C10 - C16 Fraction	----	50	mg/kg	<50	375 mg/kg	104	77	125
EP071: >C16 - C34 Fraction	----	100	mg/kg	<100	525 mg/kg	109	74	138

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2103898) - continued								
EP071: >C34 - C40 Fraction	----	100	mg/kg	<100	225 mg/kg	97.8	63	131
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2103935)								
EP071: >C10 - C16 Fraction	----	50	mg/kg	<50	375 mg/kg	102	77	125
EP071: >C16 - C34 Fraction	----	100	mg/kg	<100	525 mg/kg	106	74	138
EP071: >C34 - C40 Fraction	----	100	mg/kg	<100	225 mg/kg	86.6	63	131
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2108018)								
EP080: C6 - C10 Fraction	C6_C10	10	mg/kg	<10	31 mg/kg	100	68	128
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2109183)								
EP080: C6 - C10 Fraction	C6_C10	10	mg/kg	<10	31 mg/kg	96.6	68	128
EP080: BTEXN (QCLot: 2108018)								
EP080: Benzene	71-43-2	0.2	mg/kg	<0.2	1 mg/kg	104	62	116
EP080: Toluene	108-88-3	0.5	mg/kg	<0.5	1 mg/kg	88.6	67	121
EP080: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	1 mg/kg	88.0	65	117
EP080: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	2 mg/kg	86.6	66	118
EP080: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	1 mg/kg	89.1	68	120
EP080: Naphthalene	91-20-3	1	mg/kg	<1	1 mg/kg	80.6	63	119
EP080: BTEXN (QCLot: 2109183)								
EP080: Benzene	71-43-2	0.2	mg/kg	<0.2	1 mg/kg	95.0	62	116
EP080: Toluene	108-88-3	0.5	mg/kg	<0.5	1 mg/kg	93.5	67	121
EP080: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	1 mg/kg	93.0	65	117
EP080: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	2 mg/kg	91.6	66	118
EP080: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	1 mg/kg	93.8	68	120
EP080: Naphthalene	91-20-3	1	mg/kg	<1	1 mg/kg	86.7	63	119
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 2107101)								
EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	0.00125 mg/kg	118	57	121
EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	0.00125 mg/kg	104	55	125
EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	<0.0002	0.00125 mg/kg	123	52	126
EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	<0.0002	0.00125 mg/kg	68.8	54	123
EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	73.6	55	127
EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	<0.0002	0.00125 mg/kg	65.2	54	125
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 2107101)								
EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	0.00625 mg/kg	102	52	128
EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	0.00125 mg/kg	120	54	129
EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	0.00125 mg/kg	118	58	127
EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	0.00125 mg/kg	120	57	128
EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	89.2	60	134

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 2107101) - continued								
EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	97.2	63	130
EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	0.00125 mg/kg	91.6	55	130
EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	0.00125 mg/kg	106	62	130
EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	109	53	134
EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg	<0.0002	0.00125 mg/kg	74.4	49	129
EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	0.00312 mg/kg	82.8	59	129
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 2107101)								
EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	0.00125 mg/kg	86.4	52	132
EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	0.00312 mg/kg	84.4	65	126
EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	0.00312 mg/kg	80.9	64	126
EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	0.00312 mg/kg	72.6	63	124
EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	0.00312 mg/kg	78.4	58	125
EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	0.00125 mg/kg	90.4	61	130
EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	0.00125 mg/kg	72.4	55	130
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 2107101)								
EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	0.00125 mg/kg	102	54	130
EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	0.00125 mg/kg	85.2	61	130
EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	0.00125 mg/kg	90.8	62	130
EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	0.00125 mg/kg	88.8	60	130

Matrix Spike (MS) Report

The quality control term Matrix Spike (MS) refers to an intralaboratory split sample spiked with a representative set of target analytes. The purpose of this QC parameter is to monitor potential matrix effects on analyte recoveries. Static Recovery Limits as per laboratory Data Quality Objectives (DQOs). Ideal recovery ranges stated may be waived in the event of sample matrix interference.

Sub-Matrix: **SOIL**

Laboratory sample ID	Client sample ID	Method: Compound	CAS Number	Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Recovery Limits (%)	
				Concentration	MS	Low	High
EG005T: Total Metals by ICP-AES (QCLot: 2111394)							
ES1838116-043	Anonymous	EG005T: Arsenic	7440-38-2	50 mg/kg	91.3	70	130
		EG005T: Cadmium	7440-43-9	50 mg/kg	93.0	70	130
		EG005T: Chromium	7440-47-3	50 mg/kg	83.0	70	130
		EG005T: Copper	7440-50-8	250 mg/kg	90.7	70	130
		EG005T: Lead	7439-92-1	250 mg/kg	93.4	70	130
		EG005T: Nickel	7440-02-0	50 mg/kg	92.2	70	130
		EG005T: Zinc	7440-66-6	250 mg/kg	101	70	130

Sub-Matrix: **SOIL**

				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Recovery Limits (%)	
Laboratory sample ID	Client sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EG005T: Total Metals by ICP-AES (QCLot: 2112056)							
ES1837263-001	Anonymous	EG005T: Arsenic	7440-38-2	50 mg/kg	86.7	70	130
		EG005T: Cadmium	7440-43-9	50 mg/kg	88.3	70	130
		EG005T: Chromium	7440-47-3	50 mg/kg	85.3	70	130
		EG005T: Copper	7440-50-8	250 mg/kg	87.4	70	130
		EG005T: Lead	7439-92-1	250 mg/kg	85.4	70	130
		EG005T: Nickel	7440-02-0	50 mg/kg	86.0	70	130
		EG005T: Zinc	7440-66-6	250 mg/kg	90.9	70	130
EG035T: Total Recoverable Mercury by FIMS (QCLot: 2111393)							
ES1838116-043	Anonymous	EG035T: Mercury	7439-97-6	5 mg/kg	90.3	70	130
EG035T: Total Recoverable Mercury by FIMS (QCLot: 2112057)							
ES1837263-001	Anonymous	EG035T: Mercury	7439-97-6	5 mg/kg	81.3	70	130
EP066: Polychlorinated Biphenyls (PCB) (QCLot: 2103896)							
ES1838118-004	BH27@0.50	EP066: Total Polychlorinated biphenyls	----	1 mg/kg	108	70	130
EP066: Polychlorinated Biphenyls (PCB) (QCLot: 2103933)							
ES1838116-043	Anonymous	EP066: Total Polychlorinated biphenyls	----	1 mg/kg	116	70	130
EP068A: Organochlorine Pesticides (OC) (QCLot: 2103897)							
ES1838118-004	BH27@0.50	EP068: gamma-BHC	58-89-9	0.5 mg/kg	89.1	70	130
		EP068: Heptachlor	76-44-8	0.5 mg/kg	101	70	130
		EP068: Aldrin	309-00-2	0.5 mg/kg	116	70	130
		EP068: Dieldrin	60-57-1	0.5 mg/kg	93.9	70	130
		EP068: Endrin	72-20-8	2 mg/kg	124	70	130
		EP068: 4.4`-DDT	50-29-3	2 mg/kg	104	70	130
EP068A: Organochlorine Pesticides (OC) (QCLot: 2103934)							
ES1838116-043	Anonymous	EP068: gamma-BHC	58-89-9	0.5 mg/kg	80.5	70	130
		EP068: Heptachlor	76-44-8	0.5 mg/kg	78.2	70	130
		EP068: Aldrin	309-00-2	0.5 mg/kg	98.5	70	130
		EP068: Dieldrin	60-57-1	0.5 mg/kg	90.8	70	130
		EP068: Endrin	72-20-8	2 mg/kg	125	70	130
		EP068: 4.4`-DDT	50-29-3	2 mg/kg	122	70	130
EP068B: Organophosphorus Pesticides (OP) (QCLot: 2103897)							
ES1838118-004	BH27@0.50	EP068: Diazinon	333-41-5	0.5 mg/kg	81.4	70	130
		EP068: Chlorpyrifos-methyl	5598-13-0	0.5 mg/kg	75.0	70	130
		EP068: Pirimphos-ethyl	23505-41-1	0.5 mg/kg	76.6	70	130
		EP068: Bromophos-ethyl	4824-78-6	0.5 mg/kg	81.2	70	130
		EP068: Prothiofos	34643-46-4	0.5 mg/kg	87.5	70	130
EP068B: Organophosphorus Pesticides (OP) (QCLot: 2103934)							

Sub-Matrix: **SOIL**

				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Recovery Limits (%)	
Laboratory sample ID	Client sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP068B: Organophosphorus Pesticides (OP) (QCLot: 2103934) - continued							
ES1838116-043	Anonymous	EP068: Diazinon	333-41-5	0.5 mg/kg	74.8	70	130
		EP068: Chlorpyrifos-methyl	5598-13-0	0.5 mg/kg	97.8	70	130
		EP068: Pirimphos-ethyl	23505-41-1	0.5 mg/kg	94.3	70	130
		EP068: Bromophos-ethyl	4824-78-6	0.5 mg/kg	87.8	70	130
		EP068: Prothiofos	34643-46-4	0.5 mg/kg	105	70	130
EP074E: Halogenated Aliphatic Compounds (QCLot: 2108013)							
ES1838118-003	BH19@4.00	EP074: 1.1-Dichloroethene	75-35-4	2.5 mg/kg	125	70	130
		EP074: Trichloroethene	79-01-6	2.5 mg/kg	103	70	130
EP074E: Halogenated Aliphatic Compounds (QCLot: 2109182)							
ES1838118-047	MW01@4.00	EP074: 1.1-Dichloroethene	75-35-4	2.5 mg/kg	98.4	70	130
		EP074: Trichloroethene	79-01-6	2.5 mg/kg	91.3	70	130
EP074F: Halogenated Aromatic Compounds (QCLot: 2108013)							
ES1838118-003	BH19@4.00	EP074: Chlorobenzene	108-90-7	2.5 mg/kg	104	70	130
EP074F: Halogenated Aromatic Compounds (QCLot: 2109182)							
ES1838118-047	MW01@4.00	EP074: Chlorobenzene	108-90-7	2.5 mg/kg	100	70	130
EP075A: Phenolic Compounds (QCLot: 2103895)							
ES1838118-004	BH27@0.50	EP075: Phenol	108-95-2	10 mg/kg	76.3	60	130
		EP075: 2-Chlorophenol	95-57-8	10 mg/kg	60.0	60	130
		EP075: 2-Nitrophenol	88-75-5	10 mg/kg	53.3	50	130
		EP075: 4-Chloro-3-methylphenol	59-50-7	10 mg/kg	67.2	50	130
		EP075: Pentachlorophenol	87-86-5	10 mg/kg	19.0	10	130
EP075A: Phenolic Compounds (QCLot: 2103932)							
ES1838116-043	Anonymous	EP075: Phenol	108-95-2	10 mg/kg	89.8	60	130
		EP075: 2-Chlorophenol	95-57-8	10 mg/kg	89.4	60	130
		EP075: 2-Nitrophenol	88-75-5	10 mg/kg	83.8	50	130
		EP075: 4-Chloro-3-methylphenol	59-50-7	10 mg/kg	83.5	50	130
		EP075: Pentachlorophenol	87-86-5	10 mg/kg	79.3	10	130
EP075B: Polynuclear Aromatic Hydrocarbons (QCLot: 2103895)							
ES1838118-004	BH27@0.50	EP075: Acenaphthene	83-32-9	10 mg/kg	82.8	50	130
		EP075: Pyrene	129-00-0	10 mg/kg	85.2	50	130
EP075B: Polynuclear Aromatic Hydrocarbons (QCLot: 2103932)							
ES1838116-043	Anonymous	EP075: Acenaphthene	83-32-9	10 mg/kg	91.7	50	130
		EP075: Pyrene	129-00-0	10 mg/kg	86.9	50	130
EP075D: Nitrosamines (QCLot: 2103895)							
ES1838118-004	BH27@0.50	EP075: N-Nitrosodi-n-propylamine	621-64-7	10 mg/kg	84.2	50	130
EP075D: Nitrosamines (QCLot: 2103932)							

Sub-Matrix: **SOIL**

				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Recovery Limits (%)	
Laboratory sample ID	Client sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP075D: Nitrosamines (QCLot: 2103932) - continued							
ES1838116-043	Anonymous	EP075: N-Nitrosodi-n-propylamine	621-64-7	10 mg/kg	85.4	50	130
EP075E: Nitroaromatics and Ketones (QCLot: 2103895)							
ES1838118-004	BH27@0.50	EP075: 2.4-Dinitrotoluene	121-14-2	10 mg/kg	76.1	40	130
EP075E: Nitroaromatics and Ketones (QCLot: 2103932)							
ES1838116-043	Anonymous	EP075: 2.4-Dinitrotoluene	121-14-2	10 mg/kg	82.4	40	130
EP075G: Chlorinated Hydrocarbons (QCLot: 2103895)							
ES1838118-004	BH27@0.50	EP075: 1.4-Dichlorobenzene	106-46-7	10 mg/kg	78.1	60	130
		EP075: 1.2.4-Trichlorobenzene	120-82-1	10 mg/kg	82.3	50	130
EP075G: Chlorinated Hydrocarbons (QCLot: 2103932)							
ES1838116-043	Anonymous	EP075: 1.4-Dichlorobenzene	106-46-7	10 mg/kg	93.1	60	130
		EP075: 1.2.4-Trichlorobenzene	120-82-1	10 mg/kg	99.0	50	130
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2103898)							
ES1838118-004	BH27@0.50	EP071: C10 - C14 Fraction	----	523 mg/kg	105	73	137
		EP071: C15 - C28 Fraction	----	2319 mg/kg	113	53	131
		EP071: C29 - C36 Fraction	----	1714 mg/kg	114	52	132
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2103935)							
ES1838116-043	Anonymous	EP071: C10 - C14 Fraction	----	523 mg/kg	106	73	137
		EP071: C15 - C28 Fraction	----	2319 mg/kg	115	53	131
		EP071: C29 - C36 Fraction	----	1714 mg/kg	116	52	132
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2108018)							
ES1838118-003	BH19@4.00	EP080: C6 - C9 Fraction	----	32.5 mg/kg	101	70	130
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2109183)							
ES1838118-047	MW01@4.00	EP080: C6 - C9 Fraction	----	32.5 mg/kg	92.8	70	130
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2103898)							
ES1838118-004	BH27@0.50	EP071: >C10 - C16 Fraction	----	860 mg/kg	99.1	73	137
		EP071: >C16 - C34 Fraction	----	3223 mg/kg	117	53	131
		EP071: >C34 - C40 Fraction	----	1058 mg/kg	115	52	132
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2103935)							
ES1838116-043	Anonymous	EP071: >C10 - C16 Fraction	----	860 mg/kg	99.9	73	137
		EP071: >C16 - C34 Fraction	----	3223 mg/kg	119	53	131
		EP071: >C34 - C40 Fraction	----	1058 mg/kg	117	52	132
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2108018)							
ES1838118-003	BH19@4.00	EP080: C6 - C10 Fraction	C6_C10	37.5 mg/kg	107	70	130
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2109183)							
ES1838118-047	MW01@4.00	EP080: C6 - C10 Fraction	C6_C10	37.5 mg/kg	98.0	70	130

Sub-Matrix: **SOIL**

				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Recovery Limits (%)	
Laboratory sample ID	Client sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP080: BTEXN (QCLot: 2108018)							
ES1838118-003	BH19@4.00	EP080: Benzene	71-43-2	2.5 mg/kg	108	70	130
		EP080: Toluene	108-88-3	2.5 mg/kg	93.2	70	130
		EP080: Ethylbenzene	100-41-4	2.5 mg/kg	95.4	70	130
		EP080: meta- & para-Xylene	108-38-3 106-42-3	2.5 mg/kg	93.0	70	130
		EP080: ortho-Xylene	95-47-6	2.5 mg/kg	94.8	70	130
		EP080: Naphthalene	91-20-3	2.5 mg/kg	85.7	70	130
EP080: BTEXN (QCLot: 2109183)							
ES1838118-047	MW01@4.00	EP080: Benzene	71-43-2	2.5 mg/kg	95.3	70	130
		EP080: Toluene	108-88-3	2.5 mg/kg	98.9	70	130
		EP080: Ethylbenzene	100-41-4	2.5 mg/kg	102	70	130
		EP080: meta- & para-Xylene	108-38-3 106-42-3	2.5 mg/kg	100.0	70	130
		EP080: ortho-Xylene	95-47-6	2.5 mg/kg	105	70	130
		EP080: Naphthalene	91-20-3	2.5 mg/kg	99.0	70	130
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 2107101)							
EP1814768-001	Anonymous	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.00125 mg/kg	109	50	130
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.00125 mg/kg	107	50	130
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.00125 mg/kg	116	50	130
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.00125 mg/kg	68.8	50	130
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.00125 mg/kg	75.6	50	130
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.00125 mg/kg	66.4	50	130
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 2107101)							
EP1814768-001	Anonymous	EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.00625 mg/kg	105	30	130
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.00125 mg/kg	116	50	130
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.00125 mg/kg	120	50	130
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.00125 mg/kg	121	50	130
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.00125 mg/kg	89.6	50	130
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.00125 mg/kg	90.8	50	130
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.00125 mg/kg	89.6	50	130
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.00125 mg/kg	101	50	130
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.00125 mg/kg	103	50	130
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.00125 mg/kg	77.6	30	130
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.00312 mg/kg	84.6	30	130
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 2107101)							
EP1814768-001	Anonymous	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.00125 mg/kg	83.6	50	130
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.00312 mg/kg	89.9	30	130

Sub-Matrix: **SOIL**

				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Recovery Limits (%)	
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*Concentration*	*MS*	*Low*	*High*
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 2107101) - continued							
EP1814768-001	Anonymous	EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.00312 mg/kg	85.1	30	130
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.00312 mg/kg	52.4	30	130
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.00312 mg/kg	55.4	30	130
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.00125 mg/kg	84.0	30	130
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.00125 mg/kg	72.4	30	130
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 2107101)							
EP1814768-001	Anonymous	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.00125 mg/kg	84.8	50	130
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.00125 mg/kg	82.4	50	130
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.00125 mg/kg	88.0	50	130
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.00125 mg/kg	89.2	50	130

ALS Environmental

QA/QC Compliance Assessment to assist with Quality Review

Work Order	: **ES1838118**	Page	: 1 of 23
Client	: **ARCADIS AUSTRALIA PACIFIC PTY LTD**	Laboratory	: Environmental Division Sydney
Contact	: MR DEAN STAFFORD	Telephone	: +61 2 8784 8555
Project	: King St North ESA	Date Samples Received	: 17-Dec-2018
Site	: ----	Issue Date	: 07-Jan-2019
Sampler	: CAITLAIN REGENA	No. of samples received	: 47
Order number	: 10026439	No. of samples analysed	: 22

This report is automatically generated by the ALS LIMS through interpretation of the ALS Quality Control Report and several Quality Assurance parameters measured by ALS. This automated reporting highlights any non-conformances, facilitates faster and more accurate data validation and is designed to assist internal expert and external Auditor review. Many components of this report contribute to the overall DQO assessment and reporting for guideline compliance.

Brief method summaries and references are also provided to assist in traceability.

Summary of Outliers

Outliers : Quality Control Samples

This report highlights outliers flagged in the Quality Control (QC) Report.

- **NO Method Blank value outliers occur.**
- **NO Laboratory Control outliers occur.**
- **NO Matrix Spike outliers occur.**
- **Duplicate outliers exist - please see following pages for full details.**
- **Surrogate recovery outliers exist for all regular sample matrices - please see following pages for full details.**

Outliers : Analysis Holding Time Compliance

- **Analysis Holding Time Outliers exist - please see following pages for full details.**

Outliers : Frequency of Quality Control Samples

- **NO Quality Control Sample Frequency Outliers exist.**

Outliers : Quality Control Samples

Duplicates, Method Blanks, Laboratory Control Samples and Matrix Spikes

Matrix: **SOIL**

Compound Group Name	Laboratory Sample ID	Client Sample ID	Analyte	CAS Number	Data	Limits	Comment
Duplicate (DUP) RPDs							
EG005T: Total Metals by ICP-AES	ES1838118--003	BH19@4.00	**Zinc**	7440-66-6	95.5 %	0% - 50%	**RPD exceeds LOR based limits**

Regular Sample Surrogates

Sub-Matrix: **SOIL**

Compound Group Name	Laboratory Sample ID	Client Sample ID	Analyte	CAS Number	Data	Limits	Comment
Samples Submitted							
EP074S: VOC Surrogates	ES1838118-014	BH13@1.50	**Toluene-D8**	2037-26-5	57.8 %	66-136 %	**Recovery less than lower data quality objective**
EP074S: VOC Surrogates	ES1838118-014	BH13@1.50	**4-Bromofluorobenzene**	460-00-4	41.0 %	60-122 %	**Recovery less than lower data quality objective**
EP080S: TPH(V)/BTEX Surrogates	ES1838118-014	BH13@1.50	**Toluene-D8**	2037-26-5	55.6 %	74-132 %	**Recovery less than lower data quality objective**
EP080S: TPH(V)/BTEX Surrogates	ES1838118-014	BH13@1.50	**4-Bromofluorobenzene**	460-00-4	40.0 %	72-130 %	**Recovery less than lower data quality objective**

Outliers : Analysis Holding Time Compliance

Matrix: **SOIL**

Method / Container / Client Sample ID(s)		Extraction / Preparation: Date extracted	Due for extraction	Days overdue	Analysis: Date analysed	Due for analysis	Days overdue
EP074A: Monocyclic Aromatic Hydrocarbons							
Soil Glass Jar - Unpreserved							
BH25@1.00,	BH22@1.00,	21-Dec-2018	19-Dec-2018	**2**	22-Dec-2018	19-Dec-2018	**3**
BH03@1.00,	BH05@1.00,						
BH04@0.20,	MW01@1.00,						
MW01@4.00							
Soil Glass Jar - Unpreserved							
BH19@4.00,	BH27@0.50,	21-Dec-2018	20-Dec-2018	**1**	22-Dec-2018	20-Dec-2018	**2**
BH28@0.50,	BH28@3.00,						
BH26@1 .00,	BH26@3.00,						
BH23@1.00,	BH23@3.00						
Soil Glass Jar - Unpreserved							
BH13@1.50,	BH14@0.80,	----	----	----	22-Dec-2018	21-Dec-2018	**1**
BH14@2.00,	BH21@1.00,						
BH21@3.00,	BH07@0.20						
EP074B: Oxygenated Compounds							

Matrix: **SOIL**

Method / Container / Client Sample ID(s)	Extraction / Preparation			Analysis		
	Date extracted	Due for extraction	Days overdue	Date analysed	Due for analysis	Days overdue
EP074B: Oxygenated Compounds - Analysis Holding Time Compliance						
Soil Glass Jar - Unpreserved						
BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	21-Dec-2018	19-Dec-2018	**2**	22-Dec-2018	19-Dec-2018	**3**
Soil Glass Jar - Unpreserved						
BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00, BH23@1.00, BH23@3.00	21-Dec-2018	20-Dec-2018	**1**	22-Dec-2018	20-Dec-2018	**2**
Soil Glass Jar - Unpreserved						
BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00, BH21@3.00, BH07@0.20	----	----	----	22-Dec-2018	21-Dec-2018	**1**
EP074C: Sulfonated Compounds						
Soil Glass Jar - Unpreserved						
BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	21-Dec-2018	19-Dec-2018	**2**	22-Dec-2018	19-Dec-2018	**3**
Soil Glass Jar - Unpreserved						
BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00, BH23@1.00, BH23@3.00	21-Dec-2018	20-Dec-2018	**1**	22-Dec-2018	20-Dec-2018	**2**
Soil Glass Jar - Unpreserved						
BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00, BH21@3.00, BH07@0.20	----	----	----	22-Dec-2018	21-Dec-2018	**1**
EP074D: Fumigants						
Soil Glass Jar - Unpreserved						
BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	21-Dec-2018	19-Dec-2018	**2**	22-Dec-2018	19-Dec-2018	**3**
Soil Glass Jar - Unpreserved						
BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00, BH23@1.00, BH23@3.00	21-Dec-2018	20-Dec-2018	**1**	22-Dec-2018	20-Dec-2018	**2**

Matrix: **SOIL**

Method / Container / Client Sample ID(s)	Extraction / Preparation: Date extracted	Extraction / Preparation: Due for extraction	Extraction / Preparation: Days overdue	Analysis: Date analysed	Analysis: Due for analysis	Analysis: Days overdue
EP074D: Fumigants - Analysis Holding Time Compliance						
Soil Glass Jar - Unpreserved						
BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00, BH21@3.00, BH07@0.20	----	----	----	22-Dec-2018	21-Dec-2018	**1**
EP074E: Halogenated Aliphatic Compounds						
Soil Glass Jar - Unpreserved						
BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	21-Dec-2018	19-Dec-2018	**2**	22-Dec-2018	19-Dec-2018	**3**
Soil Glass Jar - Unpreserved						
BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00, BH23@1.00, BH23@3.00	21-Dec-2018	20-Dec-2018	**1**	22-Dec-2018	20-Dec-2018	**2**
Soil Glass Jar - Unpreserved						
BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00, BH21@3.00, BH07@0.20	----	----	----	22-Dec-2018	21-Dec-2018	**1**
EP074F: Halogenated Aromatic Compounds						
Soil Glass Jar - Unpreserved						
BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	21-Dec-2018	19-Dec-2018	**2**	22-Dec-2018	19-Dec-2018	**3**
Soil Glass Jar - Unpreserved						
BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00, BH23@1.00, BH23@3.00	21-Dec-2018	20-Dec-2018	**1**	22-Dec-2018	20-Dec-2018	**2**
Soil Glass Jar - Unpreserved						
BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00, BH21@3.00, BH07@0.20	----	----	----	22-Dec-2018	21-Dec-2018	**1**
EP074G: Trihalomethanes						
Soil Glass Jar - Unpreserved						
BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	21-Dec-2018	19-Dec-2018	**2**	22-Dec-2018	19-Dec-2018	**3**

Matrix: **SOIL**

Method / Container / Client Sample ID(s)	Extraction / Preparation: Date extracted	Extraction / Preparation: Due for extraction	Extraction / Preparation: Days overdue	Analysis: Date analysed	Analysis: Due for analysis	Analysis: Days overdue
EP074G: Trihalomethanes - Analysis Holding Time Compliance						
Soil Glass Jar - Unpreserved						
BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00, BH23@1.00, BH23@3.00	21-Dec-2018	20-Dec-2018	**1**	22-Dec-2018	20-Dec-2018	**2**
Soil Glass Jar - Unpreserved						
BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00, BH21@3.00, BH07@0.20	----	----	----	22-Dec-2018	21-Dec-2018	**1**

Analysis Holding Time Compliance

If samples are identified below as having been analysed or extracted outside of recommended holding times, this should be taken into consideration when interpreting results.

This report summarizes extraction / preparation and analysis times and compares each with ALS recommended holding times (referencing USEPA SW 846, APHA, AS and NEPM) based on the sample container provided. Dates reported represent first date of extraction or analysis and preclude subsequent dilutions and reruns. A listing of breaches (if any) is provided herein.

Holding time for leachate methods (e.g. TCLP) vary according to the analytes reported. Assessment compares the leach date with the shortest analyte holding time for the equivalent soil method. These are: organics 14 days, mercury 28 days & other metals 180 days. A recorded breach does not guarantee a breach for all non-volatile parameters.

Holding times for ***VOC in soils*** vary according to analytes of interest. Vinyl Chloride and Styrene holding time is 7 days; others 14 days. A recorded breach does not guarantee a breach for all VOC analytes and should be verified in case the reported breach is a false positive or Vinyl Chloride and Styrene are not key analytes of interest/concern.

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation: Date extracted	Extraction / Preparation: Due for extraction	Extraction / Preparation: Evaluation	Analysis: Date analysed	Analysis: Due for analysis	Analysis: Evaluation
EA055: Moisture Content (Dried @ 105-110°C)							
Soil Glass Jar - Unpreserved (EA055)							
BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	**12-Dec-2018**	**----**	----	----	**20-Dec-2018**	26-Dec-2018	✓
Soil Glass Jar - Unpreserved (EA055)							
BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00, BH23@1.00, BH23@2.00, BH23@3.00	**13-Dec-2018**	**----**	----	----	**20-Dec-2018**	27-Dec-2018	✓
Soil Glass Jar - Unpreserved (EA055)							
BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00, BH21@3.00, BH07@0.20	**14-Dec-2018**	**----**	----	----	**20-Dec-2018**	28-Dec-2018	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EA200: AS 4964 - 2004 Identification of Asbestos in Soils							
Snap Lock Bag - Subsampled by ALS (EA200)							
BH25@1.00	**12-Dec-2018**	**----**	----	----	**24-Dec-2018**	10-Jun-2019	✓
Snap Lock Bag - Subsampled by ALS (EA200)							
BH13@1.50	**14-Dec-2018**	**----**	----	----	**24-Dec-2018**	12-Jun-2019	✓
Snap Lock Bag: Separate bag received (EA200)							
BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00	**12-Dec-2018**	**----**	----	----	**20-Dec-2018**	10-Jun-2019	✓
Snap Lock Bag: Separate bag received (EA200)							
BH27@0.50, BH28@0.50, BH26@1 .00, BH23@1.00	**13-Dec-2018**	**----**	----	----	**20-Dec-2018**	11-Jun-2019	✓
Snap Lock Bag: Separate bag received (EA200)							
BH14@0.80, BH21@1.00, BH07@0.20	**14-Dec-2018**	**----**	----	----	**20-Dec-2018**	12-Jun-2019	✓
EA200N: Asbestos Quantification (non-NATA)							
Snap Lock Bag: Separate bag received (EA200N)							
BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00	**12-Dec-2018**	**----**	----	----	**20-Dec-2018**	10-Jun-2019	✓
Snap Lock Bag: Separate bag received (EA200N)							
BH27@0.50, BH28@0.50, BH26@1 .00, BH23@1.00	**13-Dec-2018**	**----**	----	----	**20-Dec-2018**	11-Jun-2019	✓
Snap Lock Bag: Separate bag received (EA200N)							
BH14@0.80, BH21@1.00, BH07@0.20	**14-Dec-2018**	**----**	----	----	**20-Dec-2018**	12-Jun-2019	✓
EG005T: Total Metals by ICP-AES							
Soil Glass Jar - Unpreserved (EG005T)							
BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	**12-Dec-2018**	**24-Dec-2018**	10-Jun-2019	✓	**24-Dec-2018**	10-Jun-2019	✓
Soil Glass Jar - Unpreserved (EG005T)							
BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00	**13-Dec-2018**	**22-Dec-2018**	11-Jun-2019	✓	**24-Dec-2018**	11-Jun-2019	✓
Soil Glass Jar - Unpreserved (EG005T)							
BH23@1.00, BH23@3.00	**13-Dec-2018**	**24-Dec-2018**	11-Jun-2019	✓	**24-Dec-2018**	11-Jun-2019	✓
Soil Glass Jar - Unpreserved (EG005T)							
BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00	**14-Dec-2018**	**22-Dec-2018**	12-Jun-2019	✓	**24-Dec-2018**	12-Jun-2019	✓
Soil Glass Jar - Unpreserved (EG005T)							
BH21@3.00, BH07@0.20	**14-Dec-2018**	**24-Dec-2018**	12-Jun-2019	✓	**24-Dec-2018**	12-Jun-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EG035T: Total Recoverable Mercury by FIMS							
Soil Glass Jar - Unpreserved (EG035T)							
BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	**12-Dec-2018**	**24-Dec-2018**	09-Jan-2019	✓	**24-Dec-2018**	09-Jan-2019	✓
Soil Glass Jar - Unpreserved (EG035T)							
BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00	**13-Dec-2018**	**22-Dec-2018**	10-Jan-2019	✓	**22-Dec-2018**	10-Jan-2019	✓
Soil Glass Jar - Unpreserved (EG035T)							
BH23@1.00, BH23@3.00	**13-Dec-2018**	**24-Dec-2018**	10-Jan-2019	✓	**24-Dec-2018**	10-Jan-2019	✓
Soil Glass Jar - Unpreserved (EG035T)							
BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00	**14-Dec-2018**	**22-Dec-2018**	11-Jan-2019	✓	**22-Dec-2018**	11-Jan-2019	✓
Soil Glass Jar - Unpreserved (EG035T)							
BH21@3.00, BH07@0.20	**14-Dec-2018**	**24-Dec-2018**	11-Jan-2019	✓	**24-Dec-2018**	11-Jan-2019	✓
EP066: Polychlorinated Biphenyls (PCB)							
Soil Glass Jar - Unpreserved (EP066)							
BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	**12-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**23-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP066)							
BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00, BH23@1.00, BH23@3.00	**13-Dec-2018**	**21-Dec-2018**	27-Dec-2018	✓	**23-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP066)							
BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00, BH21@3.00, BH07@0.20	**14-Dec-2018**	**21-Dec-2018**	28-Dec-2018	✓	**23-Dec-2018**	30-Jan-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP068A: Organochlorine Pesticides (OC)							
Soil Glass Jar - Unpreserved (EP068) BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	**12-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**23-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP068) BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00, BH23@1.00, BH23@3.00	**13-Dec-2018**	**21-Dec-2018**	27-Dec-2018	✓	**23-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP068) BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00, BH21@3.00, BH07@0.20	**14-Dec-2018**	**21-Dec-2018**	28-Dec-2018	✓	**23-Dec-2018**	30-Jan-2019	✓
EP068B: Organophosphorus Pesticides (OP)							
Soil Glass Jar - Unpreserved (EP068) BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	**12-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**23-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP068) BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00, BH23@1.00, BH23@3.00	**13-Dec-2018**	**21-Dec-2018**	27-Dec-2018	✓	**23-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP068) BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00, BH21@3.00, BH07@0.20	**14-Dec-2018**	**21-Dec-2018**	28-Dec-2018	✓	**23-Dec-2018**	30-Jan-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP074A: Monocyclic Aromatic Hydrocarbons							
Soil Glass Jar - Unpreserved (EP074) BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	**12-Dec-2018**	**21-Dec-2018**	19-Dec-2018	×	**22-Dec-2018**	19-Dec-2018	×
Soil Glass Jar - Unpreserved (EP074) BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00, BH23@1.00, BH23@3.00	**13-Dec-2018**	**21-Dec-2018**	20-Dec-2018	×	**22-Dec-2018**	20-Dec-2018	×
Soil Glass Jar - Unpreserved (EP074) BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00, BH21@3.00, BH07@0.20	**14-Dec-2018**	**21-Dec-2018**	21-Dec-2018	✓	**22-Dec-2018**	21-Dec-2018	×
EP074B: Oxygenated Compounds							
Soil Glass Jar - Unpreserved (EP074) BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	**12-Dec-2018**	**21-Dec-2018**	19-Dec-2018	×	**22-Dec-2018**	19-Dec-2018	×
Soil Glass Jar - Unpreserved (EP074) BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00, BH23@1.00, BH23@3.00	**13-Dec-2018**	**21-Dec-2018**	20-Dec-2018	×	**22-Dec-2018**	20-Dec-2018	×
Soil Glass Jar - Unpreserved (EP074) BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00, BH21@3.00, BH07@0.20	**14-Dec-2018**	**21-Dec-2018**	21-Dec-2018	✓	**22-Dec-2018**	21-Dec-2018	×

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP074C: Sulfonated Compounds							
Soil Glass Jar - Unpreserved (EP074)							
BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	**12-Dec-2018**	**21-Dec-2018**	19-Dec-2018	×	**22-Dec-2018**	19-Dec-2018	×
Soil Glass Jar - Unpreserved (EP074)							
BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00, BH23@1.00, BH23@3.00	**13-Dec-2018**	**21-Dec-2018**	20-Dec-2018	×	**22-Dec-2018**	20-Dec-2018	×
Soil Glass Jar - Unpreserved (EP074)							
BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00, BH21@3.00, BH07@0.20	**14-Dec-2018**	**21-Dec-2018**	21-Dec-2018	✓	**22-Dec-2018**	21-Dec-2018	×
EP074D: Fumigants							
Soil Glass Jar - Unpreserved (EP074)							
BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	**12-Dec-2018**	**21-Dec-2018**	19-Dec-2018	×	**22-Dec-2018**	19-Dec-2018	×
Soil Glass Jar - Unpreserved (EP074)							
BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00, BH23@1.00, BH23@3.00	**13-Dec-2018**	**21-Dec-2018**	20-Dec-2018	×	**22-Dec-2018**	20-Dec-2018	×
Soil Glass Jar - Unpreserved (EP074)							
BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00, BH21@3.00, BH07@0.20	**14-Dec-2018**	**21-Dec-2018**	21-Dec-2018	✓	**22-Dec-2018**	21-Dec-2018	×

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP074E: Halogenated Aliphatic Compounds							
Soil Glass Jar - Unpreserved (EP074) BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	**12-Dec-2018**	**21-Dec-2018**	19-Dec-2018	×	**22-Dec-2018**	19-Dec-2018	×
Soil Glass Jar - Unpreserved (EP074) BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00, BH23@1.00, BH23@3.00	**13-Dec-2018**	**21-Dec-2018**	20-Dec-2018	×	**22-Dec-2018**	20-Dec-2018	×
Soil Glass Jar - Unpreserved (EP074) BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00, BH21@3.00, BH07@0.20	**14-Dec-2018**	**21-Dec-2018**	21-Dec-2018	✓	**22-Dec-2018**	21-Dec-2018	×
EP074F: Halogenated Aromatic Compounds							
Soil Glass Jar - Unpreserved (EP074) BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	**12-Dec-2018**	**21-Dec-2018**	19-Dec-2018	×	**22-Dec-2018**	19-Dec-2018	×
Soil Glass Jar - Unpreserved (EP074) BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00, BH23@1.00, BH23@3.00	**13-Dec-2018**	**21-Dec-2018**	20-Dec-2018	×	**22-Dec-2018**	20-Dec-2018	×
Soil Glass Jar - Unpreserved (EP074) BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00, BH21@3.00, BH07@0.20	**14-Dec-2018**	**21-Dec-2018**	21-Dec-2018	✓	**22-Dec-2018**	21-Dec-2018	×

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP074G: Trihalomethanes							
Soil Glass Jar - Unpreserved (EP074) BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	**12-Dec-2018**	**21-Dec-2018**	19-Dec-2018	×	**22-Dec-2018**	19-Dec-2018	×
Soil Glass Jar - Unpreserved (EP074) BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00, BH23@1.00, BH23@3.00	**13-Dec-2018**	**21-Dec-2018**	20-Dec-2018	×	**22-Dec-2018**	20-Dec-2018	×
Soil Glass Jar - Unpreserved (EP074) BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00, BH21@3.00, BH07@0.20	**14-Dec-2018**	**21-Dec-2018**	21-Dec-2018	✓	**22-Dec-2018**	21-Dec-2018	×
EP075A: Phenolic Compounds							
Soil Glass Jar - Unpreserved (EP075) BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	**12-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075) BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00, BH23@1.00, BH23@3.00	**13-Dec-2018**	**21-Dec-2018**	27-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075) BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00, BH21@3.00, BH07@0.20	**14-Dec-2018**	**21-Dec-2018**	28-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP075B: Polynuclear Aromatic Hydrocarbons							
Soil Glass Jar - Unpreserved (EP075) BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	**12-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075) BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00, BH23@1.00, BH23@3.00	**13-Dec-2018**	**21-Dec-2018**	27-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075) BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00, BH21@3.00, BH07@0.20	**14-Dec-2018**	**21-Dec-2018**	28-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
EP075C: Phthalate Esters							
Soil Glass Jar - Unpreserved (EP075) BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	**12-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075) BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00, BH23@1.00, BH23@3.00	**13-Dec-2018**	**21-Dec-2018**	27-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075) BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00, BH21@3.00, BH07@0.20	**14-Dec-2018**	**21-Dec-2018**	28-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP075D: Nitrosamines							
Soil Glass Jar - Unpreserved (EP075) BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	**12-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075) BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00, BH23@1.00, BH23@3.00	**13-Dec-2018**	**21-Dec-2018**	27-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075) BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00, BH21@3.00, BH07@0.20	**14-Dec-2018**	**21-Dec-2018**	28-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
EP075E: Nitroaromatics and Ketones							
Soil Glass Jar - Unpreserved (EP075) BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	**12-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075) BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00, BH23@1.00, BH23@3.00	**13-Dec-2018**	**21-Dec-2018**	27-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075) BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00, BH21@3.00, BH07@0.20	**14-Dec-2018**	**21-Dec-2018**	28-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP075F: Haloethers							
Soil Glass Jar - Unpreserved (EP075) BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	**12-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075) BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00, BH23@1.00, BH23@3.00	**13-Dec-2018**	**21-Dec-2018**	27-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075) BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00, BH21@3.00, BH07@0.20	**14-Dec-2018**	**21-Dec-2018**	28-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
EP075G: Chlorinated Hydrocarbons							
Soil Glass Jar - Unpreserved (EP075) BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	**12-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075) BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00, BH23@1.00, BH23@3.00	**13-Dec-2018**	**21-Dec-2018**	27-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075) BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00, BH21@3.00, BH07@0.20	**14-Dec-2018**	**21-Dec-2018**	28-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP075H: Anilines and Benzidines							
Soil Glass Jar - Unpreserved (EP075) BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	**12-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075) BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00, BH23@1.00, BH23@3.00	**13-Dec-2018**	**21-Dec-2018**	27-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075) BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00, BH21@3.00, BH07@0.20	**14-Dec-2018**	**21-Dec-2018**	28-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
EP075I: Organochlorine Pesticides							
Soil Glass Jar - Unpreserved (EP075) BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	**12-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075) BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00, BH23@1.00, BH23@3.00	**13-Dec-2018**	**21-Dec-2018**	27-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075) BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00, BH21@3.00, BH07@0.20	**14-Dec-2018**	**21-Dec-2018**	28-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP075J: Organophosphorus Pesticides							
Soil Glass Jar - Unpreserved (EP075) BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	**12-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075) BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00, BH23@1.00, BH23@3.00	**13-Dec-2018**	**21-Dec-2018**	27-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
Soil Glass Jar - Unpreserved (EP075) BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00, BH21@3.00, BH07@0.20	**14-Dec-2018**	**21-Dec-2018**	28-Dec-2018	✓	**28-Dec-2018**	30-Jan-2019	✓
EP080/071: Total Petroleum Hydrocarbons							
Soil Glass Jar - Unpreserved (EP080) BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	**12-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**22-Dec-2018**	26-Dec-2018	✓
Soil Glass Jar - Unpreserved (EP080) BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00, BH23@1.00, BH23@3.00	**13-Dec-2018**	**21-Dec-2018**	27-Dec-2018	✓	**22-Dec-2018**	27-Dec-2018	✓
Soil Glass Jar - Unpreserved (EP080) BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00, BH21@3.00, BH07@0.20	**14-Dec-2018**	**21-Dec-2018**	28-Dec-2018	✓	**22-Dec-2018**	28-Dec-2018	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions							
Soil Glass Jar - Unpreserved (EP080) BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	**12-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**22-Dec-2018**	26-Dec-2018	✓
Soil Glass Jar - Unpreserved (EP080) BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00, BH23@1.00, BH23@3.00	**13-Dec-2018**	**21-Dec-2018**	27-Dec-2018	✓	**22-Dec-2018**	27-Dec-2018	✓
Soil Glass Jar - Unpreserved (EP080) BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00, BH21@3.00, BH07@0.20	**14-Dec-2018**	**21-Dec-2018**	28-Dec-2018	✓	**22-Dec-2018**	28-Dec-2018	✓
EP080: BTEXN							
Soil Glass Jar - Unpreserved (EP080) BH25@1.00, BH22@1.00, BH03@1.00, BH05@1.00, BH04@0.20, MW01@1.00, MW01@4.00	**12-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**22-Dec-2018**	26-Dec-2018	✓
Soil Glass Jar - Unpreserved (EP080) BH19@4.00, BH27@0.50, BH28@0.50, BH28@3.00, BH26@1 .00, BH26@3.00, BH23@1.00, BH23@3.00	**13-Dec-2018**	**21-Dec-2018**	27-Dec-2018	✓	**22-Dec-2018**	27-Dec-2018	✓
Soil Glass Jar - Unpreserved (EP080) BH13@1.50, BH14@0.80, BH14@2.00, BH21@1.00, BH21@3.00, BH07@0.20	**14-Dec-2018**	**21-Dec-2018**	28-Dec-2018	✓	**22-Dec-2018**	28-Dec-2018	✓
EP231A: Perfluoroalkyl Sulfonic Acids							
HDPE Soil Jar (EP231X) MW01@1.00	**12-Dec-2018**	**21-Dec-2018**	10-Jun-2019	✓	**21-Dec-2018**	30-Jan-2019	✓
HDPE Soil Jar (EP231X) BH28@3.00, BH23@2.00	**13-Dec-2018**	**21-Dec-2018**	11-Jun-2019	✓	**21-Dec-2018**	30-Jan-2019	✓
HDPE Soil Jar (EP231X) BH14@0.80	**14-Dec-2018**	**21-Dec-2018**	12-Jun-2019	✓	**21-Dec-2018**	30-Jan-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP231B: Perfluoroalkyl Carboxylic Acids							
HDPE Soil Jar (EP231X) MW01@1.00	**12-Dec-2018**	**21-Dec-2018**	10-Jun-2019	✓	**21-Dec-2018**	30-Jan-2019	✓
HDPE Soil Jar (EP231X) BH28@3.00, BH23@2.00	**13-Dec-2018**	**21-Dec-2018**	11-Jun-2019	✓	**21-Dec-2018**	30-Jan-2019	✓
HDPE Soil Jar (EP231X) BH14@0.80	**14-Dec-2018**	**21-Dec-2018**	12-Jun-2019	✓	**21-Dec-2018**	30-Jan-2019	✓
EP231C: Perfluoroalkyl Sulfonamides							
HDPE Soil Jar (EP231X) MW01@1.00	**12-Dec-2018**	**21-Dec-2018**	10-Jun-2019	✓	**21-Dec-2018**	30-Jan-2019	✓
HDPE Soil Jar (EP231X) BH28@3.00, BH23@2.00	**13-Dec-2018**	**21-Dec-2018**	11-Jun-2019	✓	**21-Dec-2018**	30-Jan-2019	✓
HDPE Soil Jar (EP231X) BH14@0.80	**14-Dec-2018**	**21-Dec-2018**	12-Jun-2019	✓	**21-Dec-2018**	30-Jan-2019	✓
EP231D: (n:2) Fluorotelomer Sulfonic Acids							
HDPE Soil Jar (EP231X) MW01@1.00	**12-Dec-2018**	**21-Dec-2018**	10-Jun-2019	✓	**21-Dec-2018**	30-Jan-2019	✓
HDPE Soil Jar (EP231X) BH28@3.00, BH23@2.00	**13-Dec-2018**	**21-Dec-2018**	11-Jun-2019	✓	**21-Dec-2018**	30-Jan-2019	✓
HDPE Soil Jar (EP231X) BH14@0.80	**14-Dec-2018**	**21-Dec-2018**	12-Jun-2019	✓	**21-Dec-2018**	30-Jan-2019	✓
EP231P: PFAS Sums							
HDPE Soil Jar (EP231X) MW01@1.00	**12-Dec-2018**	**21-Dec-2018**	10-Jun-2019	✓	**21-Dec-2018**	30-Jan-2019	✓
HDPE Soil Jar (EP231X) BH28@3.00, BH23@2.00	**13-Dec-2018**	**21-Dec-2018**	11-Jun-2019	✓	**21-Dec-2018**	30-Jan-2019	✓
HDPE Soil Jar (EP231X) BH14@0.80	**14-Dec-2018**	**21-Dec-2018**	12-Jun-2019	✓	**21-Dec-2018**	30-Jan-2019	✓

Quality Control Parameter Frequency Compliance

The following report summarises the frequency of laboratory QC samples analysed within the analytical lot(s) in which the submitted sample(s) was(were) processed. Actual rate should be greater than or equal to the expected rate. A listing of breaches is provided in the Summary of Outliers.

Matrix: **SOIL**

Evaluation: × = Quality Control frequency not within specification ; ✓ = Quality Control frequency within specification.

Quality Control Sample Type		Count		Rate (%)			Quality Control Specification
Analytical Methods	*Method*	*QC*	*Regular*	***Actual***	***Expected***	*Evaluation*	
Laboratory Duplicates (DUP)							
Moisture Content	EA055	4	40	**10.00**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	2	20	**10.00**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Pesticides by GCMS	EP068	4	31	**12.90**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Polychlorinated Biphenyls (PCB)	EP066	4	31	**12.90**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Semivolatile Organic Compounds	EP075	4	31	**12.90**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Total Mercury by FIMS	EG035T	4	40	**10.00**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Total Metals by ICP-AES	EG005T	4	40	**10.00**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH - Semivolatile Fraction	EP071	4	31	**12.90**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH Volatiles/BTEX	EP080	4	40	**10.00**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Volatile Organic Compounds	EP074	4	40	**10.00**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Laboratory Control Samples (LCS)							
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	1	20	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Pesticides by GCMS	EP068	2	31	**6.45**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Polychlorinated Biphenyls (PCB)	EP066	2	31	**6.45**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Semivolatile Organic Compounds	EP075	2	31	**6.45**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Total Mercury by FIMS	EG035T	2	40	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Total Metals by ICP-AES	EG005T	2	40	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH - Semivolatile Fraction	EP071	2	31	**6.45**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH Volatiles/BTEX	EP080	2	40	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Volatile Organic Compounds	EP074	2	40	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Method Blanks (MB)							
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	1	20	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Pesticides by GCMS	EP068	2	31	**6.45**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Polychlorinated Biphenyls (PCB)	EP066	2	31	**6.45**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Semivolatile Organic Compounds	EP075	2	31	**6.45**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Total Mercury by FIMS	EG035T	2	40	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Total Metals by ICP-AES	EG005T	2	40	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH - Semivolatile Fraction	EP071	2	31	**6.45**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH Volatiles/BTEX	EP080	2	40	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Volatile Organic Compounds	EP074	2	40	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Matrix Spikes (MS)							
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	1	20	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Pesticides by GCMS	EP068	2	31	**6.45**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Polychlorinated Biphenyls (PCB)	EP066	2	31	**6.45**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Semivolatile Organic Compounds	EP075	2	31	**6.45**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Total Mercury by FIMS	EG035T	2	40	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard

Matrix: **SOIL**

Evaluation: × = Quality Control frequency not within specification ; ✓ = Quality Control frequency within specification.

Quality Control Sample Type		Count		Rate (%)			Quality Control Specification
Analytical Methods	*Method*	*QC*	*Regular*	***Actual***	***Expected***	*Evaluation*	
Matrix Spikes (MS) - Continued							
Total Metals by ICP-AES	EG005T	2	40	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH - Semivolatile Fraction	EP071	2	31	**6.45**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH Volatiles/BTEX	EP080	2	40	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Volatile Organic Compounds	EP074	2	40	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard

Brief Method Summaries

The analytical procedures used by the Environmental Division have been developed from established internationally recognized procedures such as those published by the US EPA, APHA, AS and NEPM. In house developed procedures are employed in the absence of documented standards or by client request. The following report provides brief descriptions of the analytical procedures employed for results reported in the Certificate of Analysis. Sources from which ALS methods have been developed are provided within the Method Descriptions.

Analytical Methods	Method	Matrix	Method Descriptions
Moisture Content	EA055	SOIL	In house: A gravimetric procedure based on weight loss over a 12 hour drying period at 105-110 degrees C. This method is compliant with NEPM (2013) Schedule B(3) Section 7.1 and Table 1 (14 day holding time).
Asbestos Identification in Soils	EA200	SOIL	AS 4964 - 2004 Method for the qualitative identification of asbestos in bulk samples Analysis by Polarised Light Microscopy including dispersion staining
Asbestos Classification and Quantitation per NEPM 2013	* EA200N	SOIL	Asbestos Classification and Quantitation per NEPM 2013 with Confirmation of Identification by AS 4964 - 2004 Gravimetric determination of Asbestos Containing Material, Fibrous Asbestos, Asbestos Fines and sample weight and calculation of percentage concentrations per NEPM protocols. Asbestos (Fines and Fibrous FA+AF) is reported as the equivalent weight in the sample received after accounting for sub-sampling (where applicable for the <7mm and/or <2mm fractions).
Total Metals by ICP-AES	EG005T	SOIL	In house: Referenced to APHA 3120; USEPA SW 846 - 6010. Metals are determined following an appropriate acid digestion of the soil. The ICPAES technique ionises samples in a plasma, emitting a characteristic spectrum based on metals present. Intensities at selected wavelengths are compared against those of matrix matched standards. This method is compliant with NEPM (2013) Schedule B(3)
Total Mercury by FIMS	EG035T	SOIL	In house: Referenced to AS 3550, APHA 3112 Hg - B (Flow-injection (SnCl2) (Cold Vapour generation) AAS) FIM-AAS is an automated flameless atomic absorption technique. Mercury in solids are determined following an appropriate acid digestion. Ionic mercury is reduced online to atomic mercury vapour by SnCl2 which is then purged into a heated quartz cell. Quantification is by comparing absorbance against a calibration curve. This method is compliant with NEPM (2013) Schedule B(3)
Polychlorinated Biphenyls (PCB)	EP066	SOIL	In house: Referenced to USEPA SW 846 - 8270D Extracts are analysed by Capillary GC/MS and quantification is by comparison against an established 5 point calibration curve. This method is compliant with NEPM (2013) Schedule B(3) (Method 504)
Pesticides by GCMS	EP068	SOIL	In house: Referenced to USEPA SW 846 - 8270D Extracts are analysed by Capillary GC/MS and quantification is by comparison against an established 5 point calibration curve. This technique is compliant with NEPM (2013) Schedule B(3) (Method 504,505)
TRH - Semivolatile Fraction	EP071	SOIL	In house: Referenced to USEPA SW 846 - 8015A Sample extracts are analysed by Capillary GC/FID and quantified against alkane standards over the range C10 - C40. Compliant with NEPM amended 2013.
Volatile Organic Compounds	EP074	SOIL	In house: Referenced to USEPA SW 846 - 8260B Extracts are analysed by Purge and Trap, Capillary GC/MS. Quantification is by comparison against an established 5 point calibration curve. This method is compliant with NEPM (2013) Schedule B(3) (Method 501)
Semivolatile Organic Compounds	EP075	SOIL	In house: Referenced to USEPA SW 846 - 8270D Extracts are analysed by Capillary GC/MS and quantification is by comparison against an established 5 point calibration curve. This technique is compliant with NEPM (2013) Schedule B(3) (Method 502)
TRH Volatiles/BTEX	EP080	SOIL	In house: Referenced to USEPA SW 846 - 8260B. Extracts are analysed by Purge and Trap, Capillary GC/MS. Quantification is by comparison against an established 5 point calibration curve. Compliant with NEPM amended 2013.

Analytical Methods	Method	Matrix	Method Descriptions
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	SOIL	In-House. A portion of soil is extracted with MTBE. The extract is taken to dryness, made up in mobile phase. Analysis is by LC/MSMS, ESI Negative Mode using MRM. Where commercially available, isotopically labelled analogues of the target analytes are used as internal standards for quantification. Where a labelled analogue is not commercially available, the internal standard with similar chemistry and the closest retention time to the target is used for quantification. The DQO for internal standard response is 50-150% of that established at initial calibration. PFOS is quantified using a certified, traceable standard consisting of linear and branched PFOS isomers. This method complies with the quality control definitions as stated in QSM 5.1. Data is reviewed in line with the DQOs as stated in QSM5.1

Preparation Methods	Method	Matrix	Method Descriptions
Hot Block Digest for metals in soils sediments and sludges	EN69	SOIL	In house: Referenced to USEPA 200.2. Hot Block Acid Digestion 1.0g of sample is heated with Nitric and Hydrochloric acids, then cooled. Peroxide is added and samples heated and cooled again before being filtered and bulked to volume for analysis. Digest is appropriate for determination of selected metals in sludge, sediments, and soils. This method is compliant with NEPM (2013) Schedule B(3) (Method 202)
Sample Extraction for PFAS	EP231-PR	SOIL	In house
Methanolic Extraction of Soils for Purge and Trap	ORG16	SOIL	In house: Referenced to USEPA SW 846 - 5030A. 5g of solid is shaken with surrogate and 10mL methanol prior to analysis by Purge and Trap - GC/MS.
Tumbler Extraction of Solids	ORG17	SOIL	In house: Mechanical agitation (tumbler). 10g of sample, Na2SO4 and surrogate are extracted with 30mL 1:1 DCM/Acetone by end over end tumble. The solvent is decanted, dehydrated and concentrated (by KD) to the desired volume for analysis.

CHAIN OF CUSTODY

ALS Laboratory: please tick →

ADELAIDE: 21 Burma Road Pooraka SA 5095 Ph: 08 8359 0890 E: adelaide@alsglobal.com

BRISBANE: 32 Shand Street Stafford QLD 4053 Ph: 07 3243 7222 E: samples.brisbane@alsglobal.com

GOLD COAST: 46 Dellamondah Drive Upper Coomera QLD 4209 Ph: 07 5413 5000 E: gladstone@alsglobal.com

MACKAY: 78 Harbour Road Mackay QLD 4740 Ph: 07 4944 0177 E: mackay@alsglobal.com

MELBOURNE: 24 Westall Road Springvale VIC 3171 Ph: 03 8549 9600 E: samples.melbourne@alsglobal.com

MUDGEE: 27 Sydney Road Mudgee NSW 2850 Ph: 02 6372 6735 E: mudgee.mail@alsglobal.com

NEWCASTLE: 5/585 Maitland Rd Mayfield West NSW 2304 Ph: 02 4014 2500 E: samples.newcastle@alsglobal.com

NOWRA: 2/19 Bearly Place North Nowra NSW 2541 Ph: 0423 259 630 E: nowra@alsglobal.com

PERTH: 10 Hod Way Malaga WA 6090 Ph: 08 9209 7655 E: samples.perth@alsglobal.com

SYDNEY: 277-289 Woodpark Road Smithfield NSW 2164 Ph: 02 8784 8555 E: samples.sydney@alsglobal.com

TOWNSVILLE: 14-15 Desma Court Garbutt QLD 4814 Ph: 07 4796 0600 E: townsville.environmental@alsglobal.com

WOLLONGONG: 99 Kenny Street Wollongong NSW 2500 Ph: 02 4225 1595 E: portkembla@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	TURNAROUND REQUIREMENTS : (Standard TAT may be longer for some tests e.g.. Ultra Trace Organics)	☒ Standard TAT (List due date):	FOR LABORATORY USE ONLY (Circle)
OFFICE:		☐ Non Standard or urgent TAT (List due date):	Custody Seal Intact? Yes No N/A
PROJECT: King St North ESA	ALS QUOTE NO.:	COC SEQUENCE NUMBER (Circle)	Free ice / frozen ice bricks present upon receipt? Yes No N/A
ORDER NUMBER: 10026439		COC: 1 2 3 4 5 6 7	Random Sample Temperature on Receipt: °C
PROJECT MANAGER: Dean Stafford	CONTACT PH: 0434 657 155	OF: 1 2 3 4 5 6 7	Other comment: 5.7
SAMPLER: Caitlain Regena	SAMPLER MOBILE: 0438 263 112		
COC emailed to ALS? (NO)	EDD FORMAT (or default):		
Email Reports to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com			
Email Invoice to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com			

RELINQUISHED BY:	RECEIVED BY:	RELINQUISHED BY:	RECEIVED BY:
Caitlain Regena			
DATE/TIME: 17/12/18	DATE/TIME: 17/12/18 1730	DATE/TIME:	DATE/TIME:

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)			CONTAINER INFORMATION		ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).								Additional Information
LAB ID	SAMPLE ID	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	TOTAL CONTAINERS	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Analytes)	BTEX			Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
	DUP2		S		1									
	TRIP2		S		1									
	TB		S		1						x			
	TS		S		1						x			
					4									

Subcon / Forward Lab / Split No:
Lab / Analysis: ES1838118
Organised By / Date: 17/12/18
Relinquished By / Date: Newcastle
Connote / Courier:
WO No:
Attach By PO / Internal Sheet:

Environmental Division
Sydney
Work Order Reference
ES1838118

Telephone : +61-2-8784 8555

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass;
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

CHAIN OF CUSTODY

ALS Laboratory: please tick →

CLIENT: Arcadis Australia Pacific Pty Ltd	TURNAROUND REQUIREMENTS : (Standard TAT may be longer for some tests e.g. Ultra Trace Organics) ☒ Standard TAT (List due date): ☐ Non Standard or urgent TAT (List due date):
OFFICE:	
PROJECT: King St North ESA	ALS QUOTE NO.:
ORDER NUMBER: 10026439	COC SEQUENCE NUMBER (Circle) COC: 1 2 3 4 5 6 7 OF: 1 2 3 4 5 6 7
PROJECT MANAGER: Dean Stafford	CONTACT PH: 0434 657 155
SAMPLER: Caitlain Regena	SAMPLER MOBILE: 0438 263 112
COC emailed to ALS? (NO)	EDD FORMAT (or default):
Email Reports to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com	
Email invoice to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com	

FOR LABORATORY USE ONLY (Circle)

Custody Seal Intact?	Yes	No	N/A
Free ice / frozen ice bricks present upon receipt?	Yes	No	N/A
Random Sample Temperature on Receipt:		°C	
Other comment:	5.7		

RELINQUISHED BY:	RECEIVED BY:	RELINQUISHED BY:	RECEIVED BY:
Caitlain Regena			
DATE/TIME: 17/12/18	DATE/TIME: 17/12/18	DATE/TIME:	DATE/TIME:

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)			CONTAINER INFORMATION		ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).								Additional Information
LAB ID	SAMPLE ID	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	TOTAL CONTAINERS	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Analytes)				Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
	BH03@2.00	12-12-18	S		1	x	x	x						
	BH01@0.50	12-12-18	S		1	x	x	x	x					
	BH01@1.00	12-12-18	S		1									
	BH01@2.00	12-12-18	S		1	x	x	x						
	DUP1	12-12-18	S		1	x	x	x						
	TRIP1	12-12-18	S		1	x	x	x						
	BH02@1.00	12-12-18	S		1	x	x	x	x					Please send to ~~ALS~~ ENVIROLAB
	BH02@1.50	12-12-18	S		1									
	BH02@2.50	12-12-18	S		1	x	x	x						
	MW02@1.00	12-12-18	S		1	x	x	x	x					
	MW02@3.00	12-12-18	S		1									
	MW02@6.00	12-12-18	S		1	x	x	x						
					12									

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP = Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass;
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

CHAIN OF CUSTODY

ALS Laboratory: please tick →

ADELAIDE 21 Burma Road Pooraka SA 5095 Ph: 08 8359 0890 E: adelaide@alsglobal.com

BRISBANE 32 Shand Street Stafford QLD 4053 Ph: 07 3243 7222 E: samples.brisbane@alsglobal.com

GOLD COAST 74 Stenlake Dr Varsity Lakes QLD 4227 Ph: 07 5644 8000 E: goldcoast@alsglobal.com

MELBOURNE 4 Westall Rd Springvale VIC 3171 Ph: 03 8549 9600 E: melbourne@alsglobal.com

SYDNEY 277-289 Woodpark Road Smithfield NSW 2164 Ph: 02 8784 8555 E: samples.sydney@alsglobal.com

NEWCASTLE 5/585 Maitland Rd Mayfield West NSW 2304 Ph: 02 4968 9433 E: samples.newcastle@alsglobal.com

PERTH 10 Hod Way Malaga WA 6090 Ph: 08 9209 7655 E: samples.perth@alsglobal.com

BROOME 1/21 Sheen Rd Broome WA 6725 Ph: 08 9194 1524 E: broome@alsglobal.com

TOWNSVILLE 14-15 Desma Court Bohle QLD 4818 Ph: 07 4796 0600 E: townsville@alsglobal.com

DARWIN 1/5 Kenny Street Winnellie NT 0820 Ph: 08 8947 4555 E: darwin@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	TURNAROUND REQUIREMENTS : (Standard TAT may be longer for some tests e.g. Ultra Trace Organics)	☒ Standard TAT (List due date):	FOR LABORATORY USE ONLY (Circle)
OFFICE:		☐ Non Standard or urgent TAT (List due date):	Custody Seal Intact? Yes No N/A
PROJECT: King St North ESA	ALS QUOTE NO.:	COC SEQUENCE NUMBER (Circle)	Free ice / frozen ice bricks present upon receipt? Yes No N/A
ORDER NUMBER: 10026439		COC: 1 2 3 4 5 6 7	Random Sample Temperature on Receipt: °C
PROJECT MANAGER: Dean Stafford	CONTACT PH: 0434 657 155	OF: 1 2 3 4 5 6 7	Other comment: S-7
SAMPLER: Caitlain Regena	SAMPLER MOBILE: 0438 263 112		
COC emailed to ALS? (NO)	EDD FORMAT (or default):		
Email Reports to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com			
Email Invoice to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com			

RELINQUISHED BY:	RECEIVED BY:	RELINQUISHED BY:	RECEIVED BY:
Caitlain Regena	Sarah Hale ALS		
DATE/TIME: 17/12/18	DATE/TIME: 17/12/18 1730	DATE/TIME:	DATE/TIME:

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)			CONTAINER INFORMATION		ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).								Additional Information
LAB ID	SAMPLE ID	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	TOTAL CONTAINERS	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Analytes)				
	BH06@0.50	14-12-18	S		2	x	x	x	x	x				Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
	BH06@1.50	14-12-18	S		1									
	BH06@2.40	14-12-18	S		1	x	x	x						
	BH08@0.30	14-12-18	S		1									
	BH08@1.00	14-12-18	S		2	x	x	x	x					
	BH08@3.00	14-12-18	S		1	x	x	x						
	MW06@0.50	13-12-18	S		1									
	MW06@1.50	13-12-18	S		1	x	x	x	x					
	MW06@3.00	13-12-18	S		1									
	MW06@4.50	13-12-18	S		2	x	x	x		x				
	MW06@6.00	13-12-18	S		1									
	BH15@0.30	13-12-18	S		1									
					15									

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass;
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

CHAIN OF CUSTODY

ALS Laboratory: please tick →

CLIENT: Arcadis Australia Pacific Pty Ltd	TURNAROUND REQUIREMENTS : ☒ Standard TAT (List due date):	FOR LABORATORY USE ONLY (Circle)
OFFICE:	(Standard TAT may be longer for some tests e.g., Ultra Trace Organics) ☐ Non Standard or urgent TAT (List due date):	Custody Seal Intact? Yes No N/A
PROJECT: King St North ESA	ALS QUOTE NO.:	Free ice / frozen ice bricks present upon receipt? Yes No N/A
ORDER NUMBER: 10026439	COC SEQUENCE NUMBER (Circle) COC: 1 2 3 4 5 6 7 OF: 1 2 3 4 5 6 7	Random Sample Temperature on Receipt: °C
PROJECT MANAGER: Dean Stafford	CONTACT PH: 0434 657 155	Other comment: S-7
SAMPLER: Caitlain Regena	SAMPLER MOBILE: 0438 263 112	
COC emailed to ALS? (NO)	EDD FORMAT (or default):	
Email Reports to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com		
Email Invoice to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com		

RELINQUISHED BY:	RECEIVED BY:	RELINQUISHED BY:	RECEIVED BY:
Caitlain Regena	Sanjiv Lo Yan		
DATE/TIME: 17/12/18	DATE/TIME: 17/12/18 1730	DATE/TIME:	DATE/TIME:

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)			CONTAINER INFORMATION		ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).								Additional Information
LAB ID	SAMPLE ID	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	TOTAL CONTAINERS	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Analytes)				Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
	BH15@1.50	13-12-18	S		1	x	x	x	x					
	BH15@3.00	13-12-18	S		1									
	BH12@0.30	13-12-18	S		1									
	BH12@1.00	13-12-18	S		1	x	x	x	x					
	BH12@2.00	13-12-18	S		1									
	BH12@3.00	13-12-18	S		1									
	BH24@0.30	13-12-18	S		1									
	BH24@1.50	13-12-18	S		1	x	x	x	x					
	BH24@3.00	13-12-18	S		1									
	BH24@4.50	13-12-18	S		1	x	x	x						
	BH19@0.40	13-12-18	S		2	x	x	x	x	x				
	BH19@1.00	13-12-18	S		1									
					13									

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass;
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

CHAIN OF CUSTODY

ALS Laboratory: please tick →

ADELAIDE: 21 Burma Road Pooraka SA 5095 Ph: 08 8359 0890 E: adelaide@alsglobal.com

BRISBANE: 1/2 Byth Street Stafford QLD 4053 Ph: 07 3243 7222 E: samples.brisbane@alsglobal.com

GOLD COAST: 16 Callinan Drive Call Call QLD 4209 Ph: 07 5521 7733 E: goldcoast@alsglobal.com

MELBOURNE: 4 Westall Road Springvale VIC 3171 Ph: 03 8549 9600 E: samples.melbourne@alsglobal.com

SYDNEY: 277 Woodpark Road Smithfield NSW 2164 Ph: 02 8784 8555 E: samples.sydney@alsglobal.com

NEWCASTLE: 5/585 Maitland Rd Mayfield West NSW 2304 Ph: 02 4014 2500 E: samples.newcastle@alsglobal.com

ORANGE: 1/10 Kite Close Orange NSW 2800 Ph: 02 6364 9990 E: orange@alsglobal.com

PERTH: 10 Hod Way Malaga WA 6090 Ph: 08 9209 7655 E: samples.perth@alsglobal.com

TOWNSVILLE: 14-15 Desma Court Bohle QLD 4818 Ph: 07 4796 0600 E: townsville@alsglobal.com

WAGGA WAGGA: 1/7 Dalman Road Bomen NSW 2650 Ph: 02 6971 9696 E: wagga@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	TURNAROUND REQUIREMENTS : ☒ Standard TAT (List due date):	FOR LABORATORY USE ONLY (Circle)	
OFFICE:	(Standard TAT may be longer for some tests e.g. Ultra Trace Organics) ☐ Non Standard or urgent TAT (List due date):	Custody Seal Intact?	Yes No N/A
PROJECT: King St North ESA	ALS QUOTE NO.:	Free ice / frozen ice bricks present upon receipt?	Yes No N/A
ORDER NUMBER: 10026439	COC SEQUENCE NUMBER (Circle) COC: 1 2 3 4 5 6 7 OF: 1 2 3 4 5 6 7	Random Sample Temperature on Receipt:	°C
PROJECT MANAGER: Dean Stafford	CONTACT PH: 0434 657 155	Other comment:	S-7
SAMPLER: Caitlain Regena	SAMPLER MOBILE: 0438 263 112		
COC emailed to ALS? (NO)	EDD FORMAT (or default):		
Email Reports to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com			
Email Invoice to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com			

RELINQUISHED BY:	RECEIVED BY:	RELINQUISHED BY:	RECEIVED BY:
Caitlain Regena			
DATE/TIME: 17/12/18	DATE/TIME: 17/12/18 1730	DATE/TIME:	DATE/TIME:

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)			CONTAINER INFORMATION		ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).								Additional Information
LAB ID	SAMPLE ID	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	TOTAL CONTAINERS	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Analytes)				Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
	BH16@0.50	14-12-18	S		1	x	x	x	x					
	BH16@1.50	14-12-18	S		1									
	BH16@2.50	14-12-18	S		1									
	BH16@3.00	14-12-18	S		1	x	x	x						
	BH18@0.20	14-12-18	S		1									
	BH18@1.00	14-12-18	S		1	x	x	x	x					
	BH18@2.00	14-12-18	S		1									
	BH18@3.00	14-12-18	S		1	x	x	x						
	BH17@0.30	14-12-18	S		1									
	BH17@1.50	14-12-18	S		1	x	x	x	x					
	BH17@2.60	14-12-18	S		1									
	BH17@3.00	14-12-18	S		1									
					12									

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass;
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

CHAIN OF CUSTODY

ALS Laboratory: please tick →

ADELAIDE: 1 Burma Road Pooraka SA 5095 Ph: 08 8359 0890 E: adelaide@alsglobal.com

BRISBANE: 32 Shand Street Stafford QLD 4053 Ph: 07 3243 7222 E: samples.brisbane@alsglobal.com

GLADSTONE: 2/46 Callemondah Drive Clinton QLD 4680 Ph: 07 4971 5900 E: gladstone@alsglobal.com

MACKAY: 78 Harbour Road Mackay QLD 4740 Ph: 07 4944 0177 E: mackay@alsglobal.com

MELBOURNE: 24 Westall Road Springvale VIC 3171 Ph: 03 8549 9600 E: samples.melbourne@alsglobal.com

NEWCASTLE: 5/26 Maitland Rd Mayfield West NSW 2304 Ph: 02 4968 9433 E: samples.newcastle@alsglobal.com

TOWNSVILLE: 14-15 Desma Court Bohle QLD 4818 Ph: 07 4796 0600 E: townsville.environmental@alsglobal.com

SYDNEY: 277 Woodpark Road Smithfield NSW 2164 Ph: 02 8784 8555 E: samples.sydney@alsglobal.com

NOWRA: 4/5 Yalunga Place Bomaderry NSW 2541 Ph: 02 4422 2000 E: nowra@alsglobal.com

PERTH: 10 Hod Way Malaga WA 6090 Ph: 08 9209 7655 E: samples.perth@alsglobal.com

WOLLONGONG: 99 Kenny Street Wollongong NSW 2500 Ph: 02 4225 3125 E: portkembla@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	TURNAROUND REQUIREMENTS : (Standard TAT may be longer for some tests e.g. Ultra Trace Organics)	☒ Standard TAT (List due date):	FOR LABORATORY USE ONLY (Circle)
OFFICE:		☐ Non Standard or urgent TAT (List due date):	Custody Seal Intact? Yes No N/A
PROJECT: King St North ESA	ALS QUOTE NO.:	COC SEQUENCE NUMBER (Circle)	Free ice / frozen ice bricks present upon receipt? Yes No N/A
ORDER NUMBER: 10026439		COC: 1 2 3 4 5 6 7	Random Sample Temperature on Receipt: °C
PROJECT MANAGER: Dean Stafford	CONTACT PH: 0434 657 155	OF: 1 2 3 4 5 6 7	Other comment: S-7
SAMPLER: Caitlain Regena	SAMPLER MOBILE: 0438 263 112		
COC emailed to ALS? (NO)	EDD FORMAT (or default):		
Email Reports to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com			
Email Invoice to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com			

RELINQUISHED BY:	RECEIVED BY:	RELINQUISHED BY:	RECEIVED BY:
Caitlain Regena			
DATE/TIME: 17/12/18	DATE/TIME: 17/12/18 1730	DATE/TIME:	DATE/TIME:

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)			CONTAINER INFORMATION		ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).								Additional Information
LAB ID	SAMPLE ID	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	TOTAL CONTAINERS	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Analytes)				Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
	BH10@.020	14-12-18	S		1	x	x	x	x					
	BH10@1.50	14-12-18	S		1									
	BH10@3.00	14-12-18	S		1									
	BH10@4.00	14-12-18	S		1	x	x	x						
	BH09@0.30	14-12-18	S		1									
	BH09@1.50	14-12-18	S		1	x	x	x	x					
	BH09@2.50	14-12-18	S		1									
	BH09@3.00	14-12-18	S		1	x	x	x						
	BH11@1.00	14-12-18	S		1	x	x	x	x					
	BH11@3.00	14-12-18	S		2	x	x	x		x				
					11									

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass;
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

CHAIN OF CUSTODY

ALS Laboratory: please tick →

ADELAIDE 21 Burma Road Pooraka SA 5095 Ph: 08 8359 0790 E: adelaide@alsglobal.com

BRISBANE 32 Shand Street Stafford QLD 4053 Ph: 07 3243 7222 E: samples.brisbane@alsglobal.com

TOWNSVILLE Unit 13, 5 Eyre Street Garbutt QLD 4814 Ph: 07 4796 0600 E: townsville.environmental@alsglobal.com

GLADSTONE 76 Harbour Road Gladstone QLD 4680 Ph: 07 4944 0177 E: gladstone@alsglobal.com

MELBOURNE 4 Westall Road Springvale VIC 3171 Ph: 03 8549 9600 E: samples.melbourne@alsglobal.com

MUDGEE Unit 50, 37 Sydney Road Mudgee NSW 2850 Ph: 02 6372 6735 E: mudgee.mail@alsglobal.com

NEWCASTLE 5/585 Maitland Rd Mayfield West NSW 2304 Ph: 02 4014 2500 E: samples.newcastle@alsglobal.com

ORANGE 1/9 Geary Place North Orange NSW 2800 Ph: 02 6371 4931 E: orange@alsglobal.com

PERTH 10 Hod Way Malaga WA 6090 Ph: 08 9209 7655 E: samples.perth@alsglobal.com

SYDNEY 277-289 Woodpark Road Smithfield NSW 2164 Ph: 02 8784 8555 E: samples.sydney@alsglobal.com

WOLLONGONG Unit 2, 16 Kenny Street Wollongong NSW 2500 Ph: 02 4225 3125 E: wollongong@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	**TURNAROUND REQUIREMENTS :** (Standard TAT may be longer for some tests e.g. Ultra Trace Organics)	☒ Standard TAT (List due date):	**FOR LABORATORY USE ONLY (Circle)**
OFFICE:		☐ Non Standard or urgent TAT (List due date):	Custody Seal Intact? Yes No N/A
PROJECT: King St North ESA	**ALS QUOTE NO.:**	**COC SEQUENCE NUMBER (Circle)**	Free ice / frozen ice bricks present upon receipt? Yes No N/A
ORDER NUMBER: 10026439		COC: 1 2 3 4 5 6 7	Random Sample Temperature on Receipt: °C
PROJECT MANAGER: Dean Stafford	**CONTACT PH:** 0434 657 155	OF: 1 2 3 4 5 6 7	Other comment: S7
SAMPLER: Caitlain Regena	**SAMPLER MOBILE:** 0438 263 112	**RELINQUISHED BY:**	**RECEIVED BY:**
COC emailed to ALS? (NO)	**EDD FORMAT** (or default):	*Caitlain Regena*	DATE/TIME: 17/12/18 1730
Email Reports to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com		DATE/TIME: 17/12/18	**RELINQUISHED BY:** DATE/TIME:
Email Invoice to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com			**RECEIVED BY:** DATE/TIME:

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)			CONTAINER INFORMATION		ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).								Additional Information
LAB ID	SAMPLE ID	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	TOTAL CONTAINERS	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Analytes)				Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
1	BH19@2.00	13-12-18	S		1									
2	BH19@3.00	13-12-18	S		1									
3	BH19@4.00	13-12-18	S		1	x	x	x						
4	BH27@0.50	13-12-18	S		1	x	x	x	x					
5	BH27@1.50	13-12-18	S		1									
6	BH27@3.00	13-12-18	S		1									
7	BH28@0.50	13-12-18	S		1	x	x	x	x					
8	BH28@1.50	13-12-18	S		1									
9	BH28@3.00	13-12-18	S		2	x	x	x		x				
10	BH26@0.20	13-12-18	S		1									
11	BH26@1.00	13-12-18	S		1	x	x	x	x					
12	BH26@3.00	13-12-18	S		1	x	x	x						
				TOTAL	13									

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass;
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

CHAIN OF CUSTODY

ALS Laboratory: please tick →

ADELAIDE: 21 Burma Road Pooraka SA 5095 Ph: 08 8359 0890 E: adelaide@alsglobal.com

BRISBANE: 32 Shand Street Stafford QLD 4053 Ph: 07 3243 7222 E: samples.brisbane@alsglobal.com

GLADSTONE: 46 Callemondah Drive Clinton QLD 4680 Ph: 07 4971 9900 E: gladstone@alsglobal.com

MACKAY: 4 Fiji Court Mount Pleasant QLD 4740 Ph: 07 4944 0177 E: mackay@alsglobal.com

MELBOURNE: 4 Westall Road Springvale VIC 3171 Ph: 03 8549 9600 E: samples.melbourne@alsglobal.com

MUDGEE: 27 Sydney Road Mudgee NSW 2850 Ph: 02 6372 6735 E: mudgee.mail@alsglobal.com

NEWCASTLE: 5/585 Maitland Rd Mayfield West NSW 2304 Ph: 02 4014 2500 E: samples.newcastle@alsglobal.com

NOWRA: unit 4 Geary Place North Nowra NSW 2541 Ph: 02 4423 2063 E: nowra@alsglobal.com

PERTH: 10 Hod Way Malaga WA 6090 Ph: 08 9209 7655 E: samples.perth@alsglobal.com

SYDNEY: Unit 20, 277-289 Woodpark Road Smithfield NSW 2164 Ph: 02 8784 8555 E: samples.sydney@alsglobal.com

TOWNSVILLE: Unit 1, 14-15 Desma Court Garbutt QLD 4814 Ph: 07 4796 0600 E: townsville.environmental@alsglobal.com

WOLLONGONG: 99 Kenny Street Wollongong NSW 2500 Ph: 02 4225 3125 E: wollongong@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	**TURNAROUND REQUIREMENTS :** (Standard TAT may be longer for some tests e.g., Ultra Trace Organics)	☒ Standard TAT (List due date):	**FOR LABORATORY USE ONLY (Circle)**
OFFICE:		☐ Non Standard or urgent TAT (List due date):	Custody Seal Intact? Yes No N/A
PROJECT: King St North ESA	**ALS QUOTE NO.:**	**COC SEQUENCE NUMBER (Circle)**	Free ice / frozen ice bricks present upon receipt? Yes No N/A
ORDER NUMBER: 10026439		COC: 1 2 3 4 5 6 7	Random Sample Temperature on Receipt: °C
PROJECT MANAGER: Dean Stafford	**CONTACT PH:** 0434 657 155	OF: 1 2 3 4 5 6 7	Other comment: S-7
SAMPLER: Caitlain Regena	**SAMPLER MOBILE:** 0438 263 112	**RELINQUISHED BY:**	**RECEIVED BY:**
COC emailed to ALS? (NO)	**EDD FORMAT (or default):**	*Caitlain Regena*	Stanislava
Email Reports to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com		DATE/TIME: 17/12/18	DATE/TIME: 17/12/18 1750
Email Invoice to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com		**RELINQUISHED BY:** DATE/TIME:	**RECEIVED BY:** DATE/TIME:

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)			CONTAINER INFORMATION		ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).								Additional Information
LAB ID	SAMPLE ID	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	TOTAL CONTAINERS	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Analytes)				Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
13	BH13@0.20	14-12-18	S		1									
14	BH13@1.50	14-12-18	S		1	x	x	x	x					
15	BH13@2.50	14-12-18	S		1									
16	BH14@0.80	14-12-18	S		2	x	x	x	x	x				
17	BH14@1.50	14-12-18	S		1									
18	BH14@2.00	14-12-18	S		1	x	x	x						
19	BH21@1.00	14-12-18	S		1	x	x	x	x					
20	BH21@3.00	14-12-18	S		1	x	x	x						
21	BH07@0.20	14-12-18	S		1	x	x	x	x					
22	BH07@1.50	14-12-18	S		1									
23	BH07@2.00	14-12-18	S		1									
24	SNR BH07@3.00	14-12-18	S		1									
				TOTAL	13									

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass;
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

CHAIN OF CUSTODY

ALS Laboratory: please tick →

ADELAIDE: 1 Burma Road Pooraka SA 5095 Ph: 08 8359 0890 E: adelaide@alsglobal.com

BRISBANE: 32 Shand Street Stafford QLD 4053 Ph: 07 3243 7222 E: samples.brisbane@alsglobal.com

GLADSTONE: 46 Callemondah Drive Clinton QLD 4680 Ph: 07 4971 6300 E: gladstone@alsglobal.com

MACKAY: 78 Norbour Road Mackay QLD 4740 Ph: 07 4944 0177 E: mackay@alsglobal.com

MELBOURNE: 4 Westall Road Springvale VIC 3171 Ph: 03 8549 9600 E: samples.melbourne@alsglobal.com

MURARRIE: 27 Sydney Road Murarrie NSW 2480 Ph: 02 4872 8705 E: murarrie.mail@alsglobal.com

NEWCASTLE: Unit 1/ 5 Closeburn Rd Mayfield West NSW 2304 Ph: 02 4014 2500 E: samples.newcastle@alsglobal.com

NOWRA: Unit 10 Geary Pl 5 North Nowra NSW 2541 Ph: 02 4423 2063 E: nowra@alsglobal.com

PERTH: 10 Hod Way Malaga WA 6090 Ph: 08 9209 7655 E: samples.perth@alsglobal.com

SYDNEY: Unit 209 Woodpark Road Smithfield NSW 2164 Ph: 02 8784 [illegible] E: samples.sydney@alsglobal.com

TOWNSVILLE: 14-15 Desma Court Bohle QLD 4818 Ph: 07 4796 0600 E: townsville.environmental@alsglobal.com

WOLLONGONG: Unit 1/ 99 Kenny Street Wollongong NSW 2500 Ph: 02 4225 3125 E: portkembla@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	TURNAROUND REQUIREMENTS : (Standard TAT may be longer for some tests e.g. Ultra Trace Organics)	☒ Standard TAT (List due date): ☐ Non Standard or urgent TAT (List due date):
OFFICE:		
PROJECT: King St North ESA	ALS QUOTE NO.:	
ORDER NUMBER: 10026439		
PROJECT MANAGER: Dean Stafford	CONTACT PH: 0434 657 155	
SAMPLER: Caitlain Regena	SAMPLER MOBILE: 0438 263 112	
COC emailed to ALS? (NO)	EDD FORMAT (or default):	
Email Reports to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com		
Email Invoice to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com		

COC SEQUENCE NUMBER (Circle)

COC:	1	2	3	4	5	6	7
OF:	1	2	3	4	5	6	7

FOR LABORATORY USE ONLY (Circle)

Custody Seal Intact?	Yes	No	(N/A)
Free ice / frozen ice bricks present upon receipt?	Yes	No	N/A
Random Sample Temperature on Receipt:		°C	
Other comment:	5.7		

RELINQUISHED BY:	RECEIVED BY:	RELINQUISHED BY:	RECEIVED BY:
Caitlain Regena	Sally Hine ALS		
DATE/TIME: 17/12/18	DATE/TIME: 17/12/18 1730	DATE/TIME:	DATE/TIME:

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)			CONTAINER INFORMATION		ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).								Additional Information
LAB ID	SAMPLE ID	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	TOTAL CONTAINERS	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Analytes)				Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
25	BH23@0.15	13-12-18	S		1									
26	BH23@1.00	13-12-18	S		1	x	x	x	x					
27	BH23@2.00	13-12-18	S		2					x				
28	BH23@3.00	13-12-18	S		1	x	x	x						
29	BH25@1.00	12-12-18	S		1	x	x	x	x					
30	BH25@2.00	12-12-18	S		1									
31	BH22@1.00	12-12-18	S		1	x	x	x	x					
32	BH22@2.00	12-12-18	S		1									
33	BH22@3.00	12-12-18	S		1									
34	BH03@0.50	12-12-18	S		1									
35	BH03@1.00	12-12-18	S		1	x	x	x	x					
36	BH03@1.50	12-12-18	S		1									
				TOTAL	13									

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass;
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

CHAIN OF CUSTODY

ALS Laboratory: please tick →

ADELAIDE 21 Burma Road Pooraka SA 5095 Ph: 08 8359 0890 E: adelaide@alsglobal.com

BRISBANE 32 Shand Street Stafford QLD 4053 Ph: 07 3243 7222 E: samples.brisbane@alsglobal.com

GLADSTONE 46 Callemondah Drive Clinton QLD 4680 Ph: 07 4971 6600 E: gladstone@alsglobal.com

MACKAY 78 Harbour Road Mackay QLD 4740 Ph: 07 4944 0177 E: mackay@alsglobal.com

MELBOURNE 3-4 Westall Road Springvale VIC 3171 Ph: 03 8549 9600 E: samples.melbourne@alsglobal.com

MUDGEE 27 Sydney Road Mudgee NSW 2850 Ph: 02 6372 6735 E: mudgee.mail@alsglobal.com

NEWCASTLE 5/585 Maitland Rd Mayfield West NSW 2304 Ph: 02 4014 2500 E: samples.newcastle@alsglobal.com

NOWRA 4/4 Geary Place North Nowra NSW 2541 Ph: 02 4421 2000 E: nowra@alsglobal.com

PERTH 10 Hod Way Malaga WA 6090 Ph: 08 9209 7655 E: samples.perth@alsglobal.com

SYDNEY 277-289 Woodpark Road Smithfield NSW 2164 Ph: 02 8784 8555 E: samples.sydney@alsglobal.com

TOWNSVILLE 14-15 Desma Court Bohle QLD 4818 Ph: 07 4796 0600 E: townsville.environmental@alsglobal.com

WOLLONGONG 99 Kenny Street Wollongong NSW 2500 Ph: 02 4225 3125 E: wollongong@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	TURNAROUND REQUIREMENTS : (Standard TAT may be longer for some tests e.g. Ultra Trace Organics)	☒ Standard TAT (List due date):	FOR LABORATORY USE ONLY (Circle)
OFFICE:		☐ Non Standard or urgent TAT (List due date):	Custody Seal Intact? Yes No N/A
PROJECT: King St North ESA	ALS QUOTE NO.:	COC SEQUENCE NUMBER (Circle)	Free ice / frozen ice bricks present upon receipt? Yes No N/A
ORDER NUMBER: 10026439		COC: 1 2 3 4 5 6 7	Random Sample Temperature on Receipt: °C
PROJECT MANAGER: Dean Stafford	CONTACT PH: 0434 657 155	OF: 1 2 3 4 5 6 7	Other comment: 5.7
SAMPLER: Caitlain Regena	SAMPLER MOBILE: 0438 263 112	RELINQUISHED BY:	RECEIVED BY:
COC emailed to ALS? (NO)	EDD FORMAT (or default):	*Caitlain Regena*	Sonya Hyne
Email Reports to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com		DATE/TIME: 17/12/18	DATE/TIME: 17/12/18 1730
Email Invoice to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com		RELINQUISHED BY:	RECEIVED BY:
COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:		DATE/TIME:	DATE/TIME:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)			CONTAINER INFORMATION		ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).								Additional Information
	SAMPLE ID	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	TOTAL CONTAINERS	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Analytes)				Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
37	BH05@0.30	12-12-18	S		1									
38	BH05@1.00	12-12-18	S		1	x	x	x	x					
39	BH05@2.00	12-12-18	S		1									
40	BH05@3.00	12-12-18	S		1									
41	BH04@0.20	12-12-18	S		1	x	x	x	x					
42	BH04@1.00	12-12-18	S		1									
43	BH04@3.00	12-12-18	S		1									
44	MW01@0.20	12-12-18	S		1									
45	MW01@1.00	12-12-18	S		2	x	x	x	x	x				
46	MW01@2.00	12-12-18	S		1									
47	MW01@4.00	12-12-18	S		1	x	x	x						
		12-12-18	S		1									
				TOTAL	13									

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass;
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

ALS Environmental

CERTIFICATE OF ANALYSIS

Work Order	: **ES1838498**	Page	: 1 of 27
Client	: **ARCADIS AUSTRALIA PACIFIC PTY LTD**	Laboratory	: Environmental Division Sydney
Contact	: MR DEAN STAFFORD	Contact	: Loren Schiavon
Address	: L16, 480 GEORGE STREET SYDNEY NSW 2000	Address	: 277-289 Woodpark Road Smithfield NSW Australia 2164
Telephone	: 02 9690 2555	Telephone	: +61 2 8784 8555
Project	: King St North ESA	Date Samples Received	: 19-Dec-2018 17:45
Order number	: 10026439	Date Analysis Commenced	: 21-Dec-2018
C-O-C number	: ----	Issue Date	: 03-Jan-2019 12:38
Sampler	: CAITLAIN REGENA		
Site	: ----		
Quote number	: EN/091/17 (Primary Work only)		
No. of samples received	: 22		
No. of samples analysed	: 8		

This report supersedes any previous report(s) with this reference. Results apply to the sample(s) as submitted. This document shall not be reproduced, except in full.

This Certificate of Analysis contains the following information:

- General Comments
- Analytical Results
- Descriptive Results
- Surrogate Control Limits

Additional information pertinent to this report will be found in the following separate attachments: Quality Control Report, QA/QC Compliance Assessment to assist with Quality Review and Sample Receipt Notification.

Signatories

This document has been electronically signed by the authorized signatories below. Electronic signing is carried out in compliance with procedures specified in 21 CFR Part 11.

Signatories	*Position*	*Accreditation Category*
Alex Rossi	Organic Chemist	Sydney Inorganics, Smithfield, NSW
Alex Rossi	Organic Chemist	Sydney Organics, Smithfield, NSW
Christopher Owler	Team Leader - Asbestos	Newcastle - Asbestos, Mayfield West, NSW
Ivan Taylor	Analyst	Sydney Inorganics, Smithfield, NSW
Wisam Marassa	Inorganics Coordinator	Sydney Inorganics, Smithfield, NSW

General Comments

The analytical procedures used by the Environmental Division have been developed from established internationally recognized procedures such as those published by the USEPA, APHA, AS and NEPM. In house developed procedures are employed in the absence of documented standards or by client request.

Where moisture determination has been performed, results are reported on a dry weight basis.

Where a reported less than (<) result is higher than the LOR, this may be due to primary sample extract/digestate dilution and/or insufficient sample for analysis.

Where the LOR of a reported result differs from standard LOR, this may be due to high moisture content, insufficient sample (reduced weight employed) or matrix interference.

When sampling time information is not provided by the client, sampling dates are shown without a time component. In these instances, the time component has been assumed by the laboratory for processing purposes.

Where a result is required to meet compliance limits the associated uncertainty must be considered. Refer to the ALS Contact for details.

Key : CAS Number = CAS registry number from database maintained by Chemical Abstracts Services. The Chemical Abstracts Service is a division of the American Chemical Society.
LOR = Limit of reporting
^ = This result is computed from individual analyte detections at or above the level of reporting
~ = Indicates an estimated value.

- EP068 : Positive Dieldrin result is confirmed by re-extraction and re-analysis.
- EP075: 'Sum of PAH' is the sum of the USEPA 16 priority PAHs
- EA200N: Asbestos weights and percentages are not covered under the Scope of NATA Accreditation.
  Weights of Asbestos are based on extracted bulk asbestos, fibre bundles, and/or ACM and do not include respirable fibres (if present)
  The Asbestos (Fines and Fibrous) weight is calculated from the extracted Fibrous Asbestos and Asbestos Fines as an equivalent weight of 100% Asbestos
  Percentages for Asbestos content in ACM are based on the 2013 NEPM default values.
  All calculations of percentage Asbestos under this method are approximate and should be used as a guide only.
- EA200 'Am' Amosite (brown asbestos)
- EA200 'Cr' Crocidolite (blue asbestos)
- EA200 'Trace' - Asbestos fibres ("Free Fibres") detected by trace analysis per AS4964. The result can be interpreted that the sample contains detectable 'respirable' asbestos fibres
- EA200: Asbestos Identification Samples were analysed by Polarised Light Microscopy including dispersion staining.
- EA200 Legend
- EA200 'Ch' Chrysotile (white asbestos)
- EA200: 'UMF' Unknown Mineral Fibres. "-" indicates fibres detected may or may not be asbestos fibres. Confirmation by alternative techniques is recommended.
- EA200: Negative results for vinyl tiles should be confirmed by an independent analytical technique.
- EA200N: ALS laboratory procedures and methods used for the identification and quantitation of asbestos are consistent with AS4964-2004 and the requirements of the 2013 NEPM for Assessment of Site Contamination
- Benzo(a)pyrene Toxicity Equivalent Quotient (TEQ) is the sum total of the concentration of the eight carcinogenic PAHs multiplied by their Toxicity Equivalence Factor (TEF) relative to Benzo(a)pyrene. TEF values are provided in brackets as follows: Benz(a)anthracene (0.1), Chrysene (0.01), Benzo(b+j) & Benzo(k)fluoranthene (0.1), Benzo(a)pyrene (1.0), Indeno(1.2.3.cd)pyrene (0.1), Dibenz(a.h)anthracene (1.0), Benzo(g.h.i)perylene (0.01). Less than LOR results for 'TEQ Zero' are treated as zero, for 'TEQ 1/2LOR' are treated as half the reported LOR, and for 'TEQ LOR' are treated as being equal to the reported LOR.
  Note: TEQ 1/2LOR and TEQ LOR will calculate as 0.6mg/Kg and 1.2mg/Kg respectively for samples with non-detects for all of the eight TEQ PAHs.
- EA200: For samples larger than 30g, the <2mm fraction may be sub-sampled prior to trace analysis as outlined in ISO23909:2008(E) Sect 6.3.2-2
- EA200: 'Yes' - Asbestos detected by polarised light microscopy including dispersion staining.
- EA200: 'No*' - No asbestos found, at the reporting limit of 0.1g/kg, by polarised light microscopy including dispersion staining. Asbestos material was detected and positively identified at concentrations estimated to be below 0.1g/kg.
- EA200: 'No' - No asbestos found at the reporting limit 0.1g/kg, by polarised light microscopy including dispersion staining.

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	DUP4	MW05@1.00	MW05@3.00	MW07@1.00	MW03@1.00
			Client sampling date / time	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00
Compound	CAS Number	LOR	Unit	ES1838498-001	ES1838498-002	ES1838498-004	ES1838498-007	ES1838498-012
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	----	1.0	%	14.7	8.1	6.6	6.3	7.7
EA200: AS 4964 - 2004 Identification of Asbestos in Soils								
Asbestos Detected	1332-21-4	0.1	g/kg	----	Yes	----	No	No
Asbestos (Trace)	1332-21-4	5	Fibres	----	No	----	No	No
Asbestos Type	1332-21-4	-	--	----	Ch	----	-	-
Sample weight (dry)	----	0.01	g	----	406	----	338	370
APPROVED IDENTIFIER:	----	-	--	----	C.OWLER	----	C.OWLER	C.OWLER
EA200N: Asbestos Quantification (non-NATA)								
Asbestos (Fines and Fibrous <7mm)	1332-21-4	0.0004	g	----	0.147	----	<0.0004	----
Asbestos (Fines and Fibrous FA+AF)	----	0.001	% (w/w)	----	0.036	----	<0.001	----
Asbestos Containing Material	1332-21-4	0.1	g	----	<0.1	----	<0.1	----
Asbestos Containing Material (as 15% Asbestos in ACM >7mm)	1332-21-4	0.01	% (w/w)	----	<0.01	----	<0.01	----
Weight Used for % Calculation	----	0.0001	kg	----	0.406	----	0.338	----
EG005T: Total Metals by ICP-AES								
Arsenic	7440-38-2	5	mg/kg	<5	44	<5	<5	<5
Cadmium	7440-43-9	1	mg/kg	<1	20	8	<1	<1
Chromium	7440-47-3	2	mg/kg	<2	11	<2	3	<2
Copper	7440-50-8	5	mg/kg	<5	133	<5	<5	<5
Lead	7439-92-1	5	mg/kg	<5	937	12	<5	<5
Nickel	7440-02-0	2	mg/kg	<2	13	<2	<2	<2
Zinc	7440-66-6	5	mg/kg	13	118	15	5	<5
EG035T: Total Recoverable Mercury by FIMS								
Mercury	7439-97-6	0.1	mg/kg	<0.1	0.4	0.1	<0.1	<0.1
EP066: Polychlorinated Biphenyls (PCB)								
Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
EP068A: Organochlorine Pesticides (OC)								
alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
delta-BHC	319-86-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
Heptachlor	76-44-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	DUP4	MW05@1.00	MW05@3.00	MW07@1.00	MW03@1.00
				Client sampling date / time	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838498-001	ES1838498-002	ES1838498-004	ES1838498-007	ES1838498-012
					Result	Result	Result	Result	Result
EP068A: Organochlorine Pesticides (OC) - Continued									
Aldrin	309-00-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Heptachlor epoxide	1024-57-3	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
^ Total Chlordane (sum)	----	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
trans-Chlordane	5103-74-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
alpha-Endosulfan	959-98-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
cis-Chlordane	5103-71-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Dieldrin	60-57-1	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
4.4`-DDE	72-55-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Endrin	72-20-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
beta-Endosulfan	33213-65-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
^ Endosulfan (sum)	115-29-7	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
4.4`-DDD	72-54-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Endrin aldehyde	7421-93-4	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Endosulfan sulfate	1031-07-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
4.4`-DDT	50-29-3	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Endrin ketone	53494-70-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Methoxychlor	72-43-5	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
^ Sum of Aldrin + Dieldrin	309-00-2/60-57-1	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
^ Sum of DDD + DDE + DDT	72-54-8/72-55-9/50-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
EP068B: Organophosphorus Pesticides (OP)									
Dichlorvos	62-73-7	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Demeton-S-methyl	919-86-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Monocrotophos	6923-22-4	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Dimethoate	60-51-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Diazinon	333-41-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Parathion-methyl	298-00-0	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Malathion	121-75-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Fenthion	55-38-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Chlorpyrifos	2921-88-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Parathion	56-38-2	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Pirimphos-ethyl	23505-41-1	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Chlorfenvinphos	470-90-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Bromophos-ethyl	4824-78-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	DUP4	MW05@1.00	MW05@3.00	MW07@1.00	MW03@1.00
				Client sampling date / time	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838498-001	ES1838498-002	ES1838498-004	ES1838498-007	ES1838498-012
					Result	Result	Result	Result	Result
EP068B: Organophosphorus Pesticides (OP) - Continued									
Fenamiphos	22224-92-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Prothiofos	34643-46-4	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Ethion	563-12-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Carbophenothion	786-19-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Azinphos Methyl	86-50-0	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
EP074A: Monocyclic Aromatic Hydrocarbons									
Benzene	71-43-2	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Toluene	108-88-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Ethylbenzene	100-41-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Styrene	100-42-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
ortho-Xylene	95-47-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Isopropylbenzene	98-82-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
n-Propylbenzene	103-65-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
sec-Butylbenzene	135-98-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
tert-Butylbenzene	98-06-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
p-Isopropyltoluene	99-87-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
n-Butylbenzene	104-51-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074B: Oxygenated Compounds									
Vinyl Acetate	108-05-4	5	mg/kg		<5	<5	<5	<5	<5
2-Butanone (MEK)	78-93-3	5	mg/kg		<5	<5	<5	<5	<5
4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg		<5	<5	<5	<5	<5
2-Hexanone (MBK)	591-78-6	5	mg/kg		<5	<5	<5	<5	<5
EP074C: Sulfonated Compounds									
Carbon disulfide	75-15-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074D: Fumigants									
2.2-Dichloropropane	594-20-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichloropropane	78-87-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074E: Halogenated Aliphatic Compounds									

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	DUP4	MW05@1.00	MW05@3.00	MW07@1.00	MW03@1.00
				Client sampling date / time	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838498-001	ES1838498-002	ES1838498-004	ES1838498-007	ES1838498-012
					Result	Result	Result	Result	Result
EP074E: Halogenated Aliphatic Compounds - Continued									
Dichlorodifluoromethane	75-71-8	5	mg/kg		<5	<5	<5	<5	<5
Chloromethane	74-87-3	5	mg/kg		<5	<5	<5	<5	<5
Vinyl chloride	75-01-4	5	mg/kg		<5	<5	<5	<5	<5
Bromomethane	74-83-9	5	mg/kg		<5	<5	<5	<5	<5
Chloroethane	75-00-3	5	mg/kg		<5	<5	<5	<5	<5
Trichlorofluoromethane	75-69-4	5	mg/kg		<5	<5	<5	<5	<5
1.1-Dichloroethene	75-35-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Iodomethane	74-88-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1-Dichloroethane	75-34-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.1-Trichloroethane	71-55-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1-Dichloropropylene	563-58-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Carbon Tetrachloride	56-23-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichloroethane	107-06-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Trichloroethene	79-01-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dibromomethane	74-95-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.2-Trichloroethane	79-00-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.3-Dichloropropane	142-28-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Tetrachloroethene	127-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.3-Trichloropropane	96-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pentachloroethane	76-01-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074F: Halogenated Aromatic Compounds									
Chlorobenzene	108-90-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bromobenzene	108-86-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Chlorotoluene	95-49-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chlorotoluene	106-43-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074G: Trihalomethanes									

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	DUP4	MW05@1.00	MW05@3.00	MW07@1.00	MW03@1.00
			Client sampling date / time	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00
Compound	CAS Number	LOR	Unit	ES1838498-001	ES1838498-002	ES1838498-004	ES1838498-007	ES1838498-012
				Result	Result	Result	Result	Result
EP074G: Trihalomethanes - Continued								
Chloroform	67-66-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Bromodichloromethane	75-27-4	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Dibromochloromethane	124-48-1	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Bromoform	75-25-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
EP075A: Phenolic Compounds								
Phenol	108-95-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2-Chlorophenol	95-57-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2-Methylphenol	95-48-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
3- & 4-Methylphenol	1319-77-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2-Nitrophenol	88-75-5	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.4-Dimethylphenol	105-67-9	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.4-Dichlorophenol	120-83-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.6-Dichlorophenol	87-65-0	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Pentachlorophenol	87-86-5	1	mg/kg	<1	<1	<1	<1	<1
EP075B: Polynuclear Aromatic Hydrocarbons								
Naphthalene	91-20-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2-Methylnaphthalene	91-57-6	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2-Chloronaphthalene	91-58-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Acenaphthylene	208-96-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Acenaphthene	83-32-9	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Fluorene	86-73-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Phenanthrene	85-01-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	1.8
Anthracene	120-12-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Fluoranthene	206-44-0	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	2.4
Pyrene	129-00-0	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	2.1
N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Benz(a)anthracene	56-55-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	1.2
Chrysene	218-01-9	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	1.0
Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg	<1	<1	<1	<1	2
7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Benzo(a)pyrene	50-32-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	1.2

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	DUP4	MW05@1.00	MW05@3.00	MW07@1.00	MW03@1.00
				Client sampling date / time	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838498-001	ES1838498-002	ES1838498-004	ES1838498-007	ES1838498-012
					Result	Result	Result	Result	Result
EP075B: Polynuclear Aromatic Hydrocarbons - Continued									
3-Methylcholanthrene	56-49-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	**0.6**
^ Sum of PAHs	----	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	**12.3**
^ Benzo(a)pyrene TEQ (zero)	----	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	**1.5**
^ Benzo(a)pyrene TEQ (half LOR)	----	0.5	mg/kg		**0.6**	**0.6**	**0.6**	**0.6**	**1.8**
^ Benzo(a)pyrene TEQ (LOR)	----	0.5	mg/kg		**1.2**	**1.2**	**1.2**	**1.2**	**2.1**
EP075C: Phthalate Esters									
Dimethyl phthalate	131-11-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Diethyl phthalate	84-66-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Di-n-butyl phthalate	84-74-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Butyl benzyl phthalate	85-68-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
bis(2-ethylhexyl) phthalate	117-81-7	5.0	mg/kg		<5.0	<5.0	<5.0	<5.0	<5.0
Di-n-octylphthalate	117-84-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075D: Nitrosamines									
N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodiethylamine	55-18-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosopyrrolidine	930-55-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
N-Nitrosomorpholine	59-89-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosopiperidine	100-75-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodibutylamine	924-16-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
Methapyrilene	91-80-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075E: Nitroaromatics and Ketones									
2-Picoline	109-06-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Acetophenone	98-86-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Nitrobenzene	98-95-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Isophorone	78-59-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.6-Dinitrotoluene	606-20-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
2.4-Dinitrotoluene	121-14-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
1-Naphthylamine	134-32-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	DUP4	MW05@1.00	MW05@3.00	MW07@1.00	MW03@1.00
				Client sampling date / time	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838498-001	ES1838498-002	ES1838498-004	ES1838498-007	ES1838498-012
					Result	Result	Result	Result	Result
EP075E: Nitroaromatics and Ketones - Continued									
4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
5-Nitro-o-toluidine	99-55-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Azobenzene	103-33-3	1	mg/kg		<1	<1	<1	<1	<1
1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Phenacetin	62-44-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Aminobiphenyl	92-67-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pentachloronitrobenzene	82-68-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pronamide	23950-58-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dimethylaminoazobenzene	60-11-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorobenzilate	510-15-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075F: Haloethers									
Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075G: Chlorinated Hydrocarbons									
1.3-Dichlorobenzene	541-73-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.4-Dichlorobenzene	106-46-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichlorobenzene	95-50-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachloroethane	67-72-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachloropropylene	1888-71-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorobutadiene	87-68-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg		<2.5	<2.5	<2.5	<2.5	<2.5
Pentachlorobenzene	608-93-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorobenzene (HCB)	118-74-1	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
EP075H: Anilines and Benzidines									
Aniline	62-53-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chloroaniline	106-47-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Nitroaniline	88-74-4	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
3-Nitroaniline	99-09-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
Dibenzofuran	132-64-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Nitroaniline	100-01-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Carbazole	86-74-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	DUP4	MW05@1.00	MW05@3.00	MW07@1.00	MW03@1.00
				Client sampling date / time	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838498-001	ES1838498-002	ES1838498-004	ES1838498-007	ES1838498-012
					Result	Result	Result	Result	Result
EP075H: Anilines and Benzidines - Continued									
3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075I: Organochlorine Pesticides									
alpha-BHC	319-84-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
beta-BHC	319-85-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
gamma-BHC	58-89-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
delta-BHC	319-86-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Heptachlor	76-44-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Aldrin	309-00-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Heptachlor epoxide	1024-57-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
alpha-Endosulfan	959-98-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4.4`-DDE	72-55-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dieldrin	60-57-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Endrin	72-20-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
beta-Endosulfan	33213-65-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4.4`-DDD	72-54-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Endosulfan sulfate	1031-07-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4.4`-DDT	50-29-3	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
EP075J: Organophosphorus Pesticides									
Dichlorvos	62-73-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dimethoate	60-51-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Diazinon	333-41-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorpyrifos-methyl	5598-13-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Malathion	121-75-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Fenthion	55-38-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorpyrifos	2921-88-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pirimphos-ethyl	23505-41-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorfenvinphos	470-90-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Prothiofos	34643-46-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Ethion	563-12-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP080/071: Total Petroleum Hydrocarbons									
C6 - C9 Fraction	----	10	mg/kg		<10	<10	<10	<10	<10
C10 - C14 Fraction	----	50	mg/kg		<50	<50	<50	<50	<50
C15 - C28 Fraction	----	100	mg/kg		<100	<100	<100	<100	<100
C29 - C36 Fraction	----	100	mg/kg		<100	<100	<100	<100	<100

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	DUP4	MW05@1.00	MW05@3.00	MW07@1.00	MW03@1.00
				Client sampling date / time	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838498-001	ES1838498-002	ES1838498-004	ES1838498-007	ES1838498-012
					Result	Result	Result	Result	Result
EP080/071: Total Petroleum Hydrocarbons - Continued									
^ C10 - C36 Fraction (sum)	----	50	mg/kg		<50	<50	<50	<50	<50
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions									
C6 - C10 Fraction	C6_C10	10	mg/kg		<10	<10	<10	<10	<10
^ C6 - C10 Fraction minus BTEX (F1)	C6_C10-BTEX	10	mg/kg		<10	<10	<10	<10	<10
>C10 - C16 Fraction	----	50	mg/kg		<50	<50	<50	<50	<50
>C16 - C34 Fraction	----	100	mg/kg		<100	<100	<100	<100	<100
>C34 - C40 Fraction	----	100	mg/kg		<100	<100	<100	<100	<100
^ >C10 - C40 Fraction (sum)	----	50	mg/kg		<50	<50	<50	<50	<50
^ >C10 - C16 Fraction minus Naphthalene (F2)	----	50	mg/kg		<50	<50	<50	<50	<50
EP080: BTEXN									
Benzene	71-43-2	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Toluene	108-88-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Ethylbenzene	100-41-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
ortho-Xylene	95-47-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
^ Sum of BTEX	----	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
^ Total Xylenes	----	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Naphthalene	91-20-3	1	mg/kg		<1	<1	<1	<1	<1
EP231A: Perfluoroalkyl Sulfonic Acids									
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg		----	----	----	<0.0002	----
EP231B: Perfluoroalkyl Carboxylic Acids									
Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg		----	----	----	<0.001	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	DUP4	MW05@1.00	MW05@3.00	MW07@1.00	MW03@1.00
				Client sampling date / time	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838498-001	ES1838498-002	ES1838498-004	ES1838498-007	ES1838498-012
					Result	Result	Result	Result	Result
EP231B: Perfluoroalkyl Carboxylic Acids - Continued									
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg		----	----	----	<0.0005	----
EP231C: Perfluoroalkyl Sulfonamides									
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg		----	----	----	<0.0002	----
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg		----	----	----	<0.0005	----
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg		----	----	----	<0.0005	----
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg		----	----	----	<0.0005	----
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg		----	----	----	<0.0005	----
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg		----	----	----	<0.0002	----
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg		----	----	----	<0.0002	----
EP231D: (n:2) Fluorotelomer Sulfonic Acids									
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg		----	----	----	<0.0005	----
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg		----	----	----	<0.0005	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	DUP4	MW05@1.00	MW05@3.00	MW07@1.00	MW03@1.00
				Client sampling date / time	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838498-001	ES1838498-002	ES1838498-004	ES1838498-007	ES1838498-012
					Result	Result	Result	Result	Result
EP231D: (n:2) Fluorotelomer Sulfonic Acids - Continued									
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg		----	----	----	<0.0005	----
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg		----	----	----	<0.0005	----
EP231P: PFAS Sums									
Sum of PFAS	----	0.0002	mg/kg		----	----	----	<0.0002	----
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	mg/kg		----	----	----	<0.0002	----
Sum of PFAS (WA DER List)	----	0.0002	mg/kg		----	----	----	<0.0002	----
EP066S: PCB Surrogate									
Decachlorobiphenyl	2051-24-3	0.1	%		96.0	96.0	100.0	106	102
EP068S: Organochlorine Pesticide Surrogate									
Dibromo-DDE	21655-73-2	0.05	%		114	109	102	105	108
EP068T: Organophosphorus Pesticide Surrogate									
DEF	78-48-8	0.05	%		88.9	88.0	97.1	69.9	110
EP074S: VOC Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.5	%		86.7	91.7	85.4	90.6	90.5
Toluene-D8	2037-26-5	0.5	%		102	106	101	99.9	105
4-Bromofluorobenzene	460-00-4	0.5	%		102	102	102	101	102
EP075S: Acid Extractable Surrogates									
2-Fluorophenol	367-12-4	0.5	%		94.0	80.9	96.7	96.9	102
Phenol-d6	13127-88-3	0.5	%		95.7	95.7	96.9	96.8	100
2-Chlorophenol-D4	93951-73-6	0.5	%		95.8	98.4	97.4	98.0	100
2.4.6-Tribromophenol	118-79-6	0.5	%		61.4	51.2	60.9	56.2	70.9
EP075T: Base/Neutral Extractable Surrogates									
Nitrobenzene-D5	4165-60-0	0.5	%		92.6	98.4	94.4	94.9	97.2
1.2-Dichlorobenzene-D4	2199-69-1	0.5	%		87.8	93.9	89.4	88.4	90.1
2-Fluorobiphenyl	321-60-8	0.5	%		101	102	97.4	99.2	98.0
Anthracene-d10	1719-06-8	0.5	%		100.0	96.9	98.2	98.4	95.1
4-Terphenyl-d14	1718-51-0	0.5	%		95.3	87.2	91.8	91.8	90.8
EP080S: TPH(V)/BTEX Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.2	%		88.0	94.0	86.4	92.2	92.0
Toluene-D8	2037-26-5	0.2	%		94.4	98.7	93.9	92.4	95.9
4-Bromofluorobenzene	460-00-4	0.2	%		99.1	102	98.5	99.9	101

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	DUP4	MW05@1.00	MW05@3.00	MW07@1.00	MW03@1.00
				Client sampling date / time	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00
Compound	CAS Number	LOR	Unit		ES1838498-001	ES1838498-002	ES1838498-004	ES1838498-007	ES1838498-012
					Result	Result	Result	Result	Result
EP231S: PFAS Surrogate									
13C4-PFOS	----	0.0002	%		----	----	----	66.0	----
13C8-PFOA	----	0.0002	%		----	----	----	78.0	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	MW04@0.50	MW04@3.00	DUP3	----	----
			Client sampling date / time	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	----	----
Compound	CAS Number	LOR	Unit	ES1838498-016	ES1838498-018	ES1838498-021	--------	--------
				Result	Result	Result	----	----
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	----	1.0	%	**20.7**	**23.1**	**7.5**	----	----
EA200: AS 4964 - 2004 Identification of Asbestos in Soils								
Asbestos Detected	1332-21-4	0.1	g/kg	**Yes**	----	----	----	----
Asbestos (Trace)	1332-21-4	5	Fibres	**No**	----	----	----	----
Asbestos Type	1332-21-4	-	--	**Ch + Am**	----	----	----	----
Sample weight (dry)	----	0.01	g	**506**	----	----	----	----
APPROVED IDENTIFIER:	----	-	--	**C.OWLER**	----	----	----	----
EG005T: Total Metals by ICP-AES								
Arsenic	7440-38-2	5	mg/kg	<5	<5	<5	----	----
Cadmium	7440-43-9	1	mg/kg	<1	<1	<1	----	----
Chromium	7440-47-3	2	mg/kg	**9**	<2	**5**	----	----
Copper	7440-50-8	5	mg/kg	**29**	<5	**10**	----	----
Lead	7439-92-1	5	mg/kg	**64**	<5	**113**	----	----
Nickel	7440-02-0	2	mg/kg	**5**	<2	<2	----	----
Zinc	7440-66-6	5	mg/kg	**81**	**14**	**54**	----	----
EG035T: Total Recoverable Mercury by FIMS								
Mercury	7439-97-6	0.1	mg/kg	**0.2**	<0.1	<0.1	----	----
EP066: Polychlorinated Biphenyls (PCB)								
Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	<0.1	<0.1	----	----
EP068A: Organochlorine Pesticides (OC)								
alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	<0.05	----	----
Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	<0.05	----	----
beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	<0.05	----	----
gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	<0.05	----	----
delta-BHC	319-86-8	0.05	mg/kg	<0.05	<0.05	<0.05	----	----
Heptachlor	76-44-8	0.05	mg/kg	<0.05	<0.05	<0.05	----	----
Aldrin	309-00-2	0.05	mg/kg	<0.05	<0.05	<0.05	----	----
Heptachlor epoxide	1024-57-3	0.05	mg/kg	<0.05	<0.05	<0.05	----	----
^ Total Chlordane (sum)	----	0.05	mg/kg	<0.05	<0.05	<0.05	----	----
trans-Chlordane	5103-74-2	0.05	mg/kg	<0.05	<0.05	<0.05	----	----
alpha-Endosulfan	959-98-8	0.05	mg/kg	<0.05	<0.05	<0.05	----	----
cis-Chlordane	5103-71-9	0.05	mg/kg	<0.05	<0.05	<0.05	----	----
Dieldrin	60-57-1	0.05	mg/kg	**0.11**	<0.05	<0.05	----	----
4.4`-DDE	72-55-9	0.05	mg/kg	<0.05	<0.05	<0.05	----	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	MW04@0.50	MW04@3.00	DUP3	----	----
				Client sampling date / time	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	----	----
Compound	CAS Number	LOR	Unit		ES1838498-016	ES1838498-018	ES1838498-021	--------	--------
					Result	Result	Result	----	----
EP068A: Organochlorine Pesticides (OC) - Continued									
Endrin	72-20-8	0.05	mg/kg		<0.05	<0.05	<0.05	----	----
beta-Endosulfan	33213-65-9	0.05	mg/kg		<0.05	<0.05	<0.05	----	----
^ **Endosulfan (sum)**	115-29-7	0.05	mg/kg		<0.05	<0.05	<0.05	----	----
4.4`-DDD	72-54-8	0.05	mg/kg		<0.05	<0.05	<0.05	----	----
Endrin aldehyde	7421-93-4	0.05	mg/kg		<0.05	<0.05	<0.05	----	----
Endosulfan sulfate	1031-07-8	0.05	mg/kg		<0.05	<0.05	<0.05	----	----
4.4`-DDT	50-29-3	0.2	mg/kg		<0.2	<0.2	<0.2	----	----
Endrin ketone	53494-70-5	0.05	mg/kg		<0.05	<0.05	<0.05	----	----
Methoxychlor	72-43-5	0.2	mg/kg		<0.2	<0.2	<0.2	----	----
^ **Sum of Aldrin + Dieldrin**	309-00-2/60-57-1	0.05	mg/kg		**0.11**	<0.05	<0.05	----	----
^ **Sum of DDD + DDE + DDT**	72-54-8/72-55-9/50-29-3	0.05	mg/kg		<0.05	<0.05	<0.05	----	----
EP068B: Organophosphorus Pesticides (OP)									
Dichlorvos	62-73-7	0.05	mg/kg		<0.05	<0.05	<0.05	----	----
Demeton-S-methyl	919-86-8	0.05	mg/kg		<0.05	<0.05	<0.05	----	----
Monocrotophos	6923-22-4	0.2	mg/kg		<0.2	<0.2	<0.2	----	----
Dimethoate	60-51-5	0.05	mg/kg		<0.05	<0.05	<0.05	----	----
Diazinon	333-41-5	0.05	mg/kg		<0.05	<0.05	<0.05	----	----
Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg		<0.05	<0.05	<0.05	----	----
Parathion-methyl	298-00-0	0.2	mg/kg		<0.2	<0.2	<0.2	----	----
Malathion	121-75-5	0.05	mg/kg		<0.05	<0.05	<0.05	----	----
Fenthion	55-38-9	0.05	mg/kg		<0.05	<0.05	<0.05	----	----
Chlorpyrifos	2921-88-2	0.05	mg/kg		<0.05	<0.05	<0.05	----	----
Parathion	56-38-2	0.2	mg/kg		<0.2	<0.2	<0.2	----	----
Pirimphos-ethyl	23505-41-1	0.05	mg/kg		<0.05	<0.05	<0.05	----	----
Chlorfenvinphos	470-90-6	0.05	mg/kg		<0.05	<0.05	<0.05	----	----
Bromophos-ethyl	4824-78-6	0.05	mg/kg		<0.05	<0.05	<0.05	----	----
Fenamiphos	22224-92-6	0.05	mg/kg		<0.05	<0.05	<0.05	----	----
Prothiofos	34643-46-4	0.05	mg/kg		<0.05	<0.05	<0.05	----	----
Ethion	563-12-2	0.05	mg/kg		<0.05	<0.05	<0.05	----	----
Carbophenothion	786-19-6	0.05	mg/kg		<0.05	<0.05	<0.05	----	----
Azinphos Methyl	86-50-0	0.05	mg/kg		<0.05	<0.05	<0.05	----	----
EP074A: Monocyclic Aromatic Hydrocarbons									
Benzene	71-43-2	0.2	mg/kg		<0.2	<0.2	<0.2	----	----
Toluene	108-88-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	MW04@0.50	MW04@3.00	DUP3	----	----
				Client sampling date / time	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	----	----
Compound	CAS Number	LOR	Unit		ES1838498-016	ES1838498-018	ES1838498-021	--------	--------
					Result	Result	Result	----	----
EP074A: Monocyclic Aromatic Hydrocarbons - Continued									
Ethylbenzene	100-41-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Styrene	100-42-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
ortho-Xylene	95-47-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Isopropylbenzene	98-82-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
n-Propylbenzene	103-65-1	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
sec-Butylbenzene	135-98-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
tert-Butylbenzene	98-06-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
p-Isopropyltoluene	99-87-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
n-Butylbenzene	104-51-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
EP074B: Oxygenated Compounds									
Vinyl Acetate	108-05-4	5	mg/kg		<5	<5	<5	----	----
2-Butanone (MEK)	78-93-3	5	mg/kg		<5	<5	<5	----	----
4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg		<5	<5	<5	----	----
2-Hexanone (MBK)	591-78-6	5	mg/kg		<5	<5	<5	----	----
EP074C: Sulfonated Compounds									
Carbon disulfide	75-15-0	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
EP074D: Fumigants									
2.2-Dichloropropane	594-20-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
1.2-Dichloropropane	78-87-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
EP074E: Halogenated Aliphatic Compounds									
Dichlorodifluoromethane	75-71-8	5	mg/kg		<5	<5	<5	----	----
Chloromethane	74-87-3	5	mg/kg		<5	<5	<5	----	----
Vinyl chloride	75-01-4	5	mg/kg		<5	<5	<5	----	----
Bromomethane	74-83-9	5	mg/kg		<5	<5	<5	----	----
Chloroethane	75-00-3	5	mg/kg		<5	<5	<5	----	----
Trichlorofluoromethane	75-69-4	5	mg/kg		<5	<5	<5	----	----
1.1-Dichloroethene	75-35-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Iodomethane	74-88-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	MW04@0.50	MW04@3.00	DUP3	----	----
				Client sampling date / time	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	----	----
Compound	CAS Number	LOR	Unit		ES1838498-016	ES1838498-018	ES1838498-021	--------	--------
					Result	Result	Result	----	----
EP074E: Halogenated Aliphatic Compounds - Continued									
trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
1.1-Dichloroethane	75-34-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
1.1.1-Trichloroethane	71-55-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
1.1-Dichloropropylene	563-58-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Carbon Tetrachloride	56-23-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
1.2-Dichloroethane	107-06-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Trichloroethene	79-01-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Dibromomethane	74-95-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
1.1.2-Trichloroethane	79-00-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
1.3-Dichloropropane	142-28-9	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Tetrachloroethene	127-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
1.2.3-Trichloropropane	96-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Pentachloroethane	76-01-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
EP074F: Halogenated Aromatic Compounds									
Chlorobenzene	108-90-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Bromobenzene	108-86-1	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
2-Chlorotoluene	95-49-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
4-Chlorotoluene	106-43-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
EP074G: Trihalomethanes									
Chloroform	67-66-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Bromodichloromethane	75-27-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Dibromochloromethane	124-48-1	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Bromoform	75-25-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
EP075A: Phenolic Compounds									
Phenol	108-95-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
2-Chlorophenol	95-57-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
2-Methylphenol	95-48-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	MW04@0.50	MW04@3.00	DUP3	----	----
				Client sampling date / time	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	----	----
Compound	CAS Number	LOR	Unit		ES1838498-016	ES1838498-018	ES1838498-021	--------	--------
					Result	Result	Result	----	----
EP075A: Phenolic Compounds - Continued									
3- & 4-Methylphenol	1319-77-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
2-Nitrophenol	88-75-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
2.4-Dimethylphenol	105-67-9	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
2.4-Dichlorophenol	120-83-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
2.6-Dichlorophenol	87-65-0	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Pentachlorophenol	87-86-5	1	mg/kg		<1	<1	<1	----	----
EP075B: Polynuclear Aromatic Hydrocarbons									
Naphthalene	91-20-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
2-Methylnaphthalene	91-57-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
2-Chloronaphthalene	91-58-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Acenaphthylene	208-96-8	0.5	mg/kg		**0.6**	<0.5	<0.5	----	----
Acenaphthene	83-32-9	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Fluorene	86-73-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Phenanthrene	85-01-8	0.5	mg/kg		**3.7**	<0.5	<0.5	----	----
Anthracene	120-12-7	0.5	mg/kg		**0.8**	<0.5	<0.5	----	----
Fluoranthene	206-44-0	0.5	mg/kg		**8.1**	**0.7**	<0.5	----	----
Pyrene	129-00-0	0.5	mg/kg		**7.8**	**0.7**	<0.5	----	----
N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Benz(a)anthracene	56-55-3	0.5	mg/kg		**4.0**	<0.5	<0.5	----	----
Chrysene	218-01-9	0.5	mg/kg		**3.1**	<0.5	<0.5	----	----
Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg		**6**	<1	<1	----	----
7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Benzo(a)pyrene	50-32-8	0.5	mg/kg		**3.7**	<0.5	<0.5	----	----
3-Methylcholanthrene	56-49-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg		**1.2**	<0.5	<0.5	----	----
Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg		**1.5**	<0.5	<0.5	----	----
^ Sum of PAHs	----	0.5	mg/kg		**40.5**	**1.4**	<0.5	----	----
^ Benzo(a)pyrene TEQ (zero)	----	0.5	mg/kg		**4.9**	<0.5	<0.5	----	----
^ Benzo(a)pyrene TEQ (half LOR)	----	0.5	mg/kg		**5.1**	**0.6**	**0.6**	----	----
^ Benzo(a)pyrene TEQ (LOR)	----	0.5	mg/kg		**5.4**	**1.2**	**1.2**	----	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	MW04@0.50	MW04@3.00	DUP3	----	----
				Client sampling date / time	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	----	----
Compound	CAS Number	LOR	Unit		ES1838498-016	ES1838498-018	ES1838498-021	--------	--------
					Result	Result	Result	----	----
EP075C: Phthalate Esters									
Dimethyl phthalate	131-11-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Diethyl phthalate	84-66-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Di-n-butyl phthalate	84-74-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Butyl benzyl phthalate	85-68-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
bis(2-ethylhexyl) phthalate	117-81-7	5.0	mg/kg		<5.0	<5.0	<5.0	----	----
Di-n-octylphthalate	117-84-0	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
EP075D: Nitrosamines									
N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
N-Nitrosodiethylamine	55-18-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
N-Nitrosopyrrolidine	930-55-2	1.0	mg/kg		<1.0	<1.0	<1.0	----	----
N-Nitrosomorpholine	59-89-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
N-Nitrosopiperidine	100-75-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
N-Nitrosodibutylamine	924-16-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	1.0	mg/kg		<1.0	<1.0	<1.0	----	----
Methapyrilene	91-80-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
EP075E: Nitroaromatics and Ketones									
2-Picoline	109-06-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Acetophenone	98-86-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Nitrobenzene	98-95-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Isophorone	78-59-1	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
2.6-Dinitrotoluene	606-20-2	1.0	mg/kg		<1.0	<1.0	<1.0	----	----
2.4-Dinitrotoluene	121-14-2	1.0	mg/kg		<1.0	<1.0	<1.0	----	----
1-Naphthylamine	134-32-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
5-Nitro-o-toluidine	99-55-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Azobenzene	103-33-3	1	mg/kg		<1	<1	<1	----	----
1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Phenacetin	62-44-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
4-Aminobiphenyl	92-67-1	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Pentachloronitrobenzene	82-68-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Pronamide	23950-58-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Dimethylaminoazobenzene	60-11-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Chlorobenzilate	510-15-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	MW04@0.50	MW04@3.00	DUP3	----	----
				Client sampling date / time	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	----	----
Compound	CAS Number	LOR	Unit		ES1838498-016	ES1838498-018	ES1838498-021	--------	--------
					Result	Result	Result	----	----
EP075E: Nitroaromatics and Ketones - Continued									
EP075F: Haloethers									
Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
EP075G: Chlorinated Hydrocarbons									
1.3-Dichlorobenzene	541-73-1	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
1.4-Dichlorobenzene	106-46-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
1.2-Dichlorobenzene	95-50-1	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Hexachloroethane	67-72-1	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Hexachloropropylene	1888-71-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Hexachlorobutadiene	87-68-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg		<2.5	<2.5	<2.5	----	----
Pentachlorobenzene	608-93-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Hexachlorobenzene (HCB)	118-74-1	1.0	mg/kg		<1.0	<1.0	<1.0	----	----
EP075H: Anilines and Benzidines									
Aniline	62-53-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
4-Chloroaniline	106-47-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
2-Nitroaniline	88-74-4	1.0	mg/kg		<1.0	<1.0	<1.0	----	----
3-Nitroaniline	99-09-2	1.0	mg/kg		<1.0	<1.0	<1.0	----	----
Dibenzofuran	132-64-9	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
4-Nitroaniline	100-01-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Carbazole	86-74-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
EP075I: Organochlorine Pesticides									
alpha-BHC	319-84-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
beta-BHC	319-85-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
gamma-BHC	58-89-9	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
delta-BHC	319-86-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Heptachlor	76-44-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Aldrin	309-00-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Heptachlor epoxide	1024-57-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
alpha-Endosulfan	959-98-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	MW04@0.50	MW04@3.00	DUP3	----	----
				Client sampling date / time	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	----	----
Compound	CAS Number	LOR	Unit		ES1838498-016	ES1838498-018	ES1838498-021	--------	--------
					Result	Result	Result	----	----
EP075I: Organochlorine Pesticides - Continued									
4.4`-DDE	72-55-9	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Dieldrin	60-57-1	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Endrin	72-20-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
beta-Endosulfan	33213-65-9	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
4.4`-DDD	72-54-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Endosulfan sulfate	1031-07-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
4.4`-DDT	50-29-3	1.0	mg/kg		<1.0	<1.0	<1.0	----	----
EP075J: Organophosphorus Pesticides									
Dichlorvos	62-73-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Dimethoate	60-51-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Diazinon	333-41-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Chlorpyrifos-methyl	5598-13-0	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Malathion	121-75-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Fenthion	55-38-9	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Chlorpyrifos	2921-88-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Pirimphos-ethyl	23505-41-1	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Chlorfenvinphos	470-90-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Prothiofos	34643-46-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Ethion	563-12-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
EP080/071: Total Petroleum Hydrocarbons									
C6 - C9 Fraction	----	10	mg/kg		<10	<10	<10	----	----
C10 - C14 Fraction	----	50	mg/kg		<50	<50	<50	----	----
C15 - C28 Fraction	----	100	mg/kg		<100	<100	<100	----	----
C29 - C36 Fraction	----	100	mg/kg		<100	<100	<100	----	----
^ C10 - C36 Fraction (sum)	----	50	mg/kg		<50	<50	<50	----	----
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions									
C6 - C10 Fraction	C6_C10	10	mg/kg		<10	<10	<10	----	----
^ C6 - C10 Fraction minus BTEX (F1)	C6_C10-BTEX	10	mg/kg		<10	<10	<10	----	----
>C10 - C16 Fraction	----	50	mg/kg		<50	<50	<50	----	----
>C16 - C34 Fraction	----	100	mg/kg		<100	<100	<100	----	----
>C34 - C40 Fraction	----	100	mg/kg		<100	<100	<100	----	----
^ >C10 - C40 Fraction (sum)	----	50	mg/kg		<50	<50	<50	----	----
^ >C10 - C16 Fraction minus Naphthalene (F2)	----	50	mg/kg		<50	<50	<50	----	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	MW04@0.50	MW04@3.00	DUP3	----	----
				Client sampling date / time	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	----	----
Compound	CAS Number	LOR	Unit		ES1838498-016	ES1838498-018	ES1838498-021	--------	--------
					Result	Result	Result	----	----
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions - Continued									
EP080: BTEXN									
Benzene	71-43-2	0.2	mg/kg		<0.2	<0.2	<0.2	----	----
Toluene	108-88-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Ethylbenzene	100-41-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
ortho-Xylene	95-47-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
^ **Sum of BTEX**	----	0.2	mg/kg		<0.2	<0.2	<0.2	----	----
^ **Total Xylenes**	----	0.5	mg/kg		<0.5	<0.5	<0.5	----	----
Naphthalene	91-20-3	1	mg/kg		<1	<1	<1	----	----
EP231A: Perfluoroalkyl Sulfonic Acids									
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg		<0.0002	----	----	----	----
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg		<0.0002	----	----	----	----
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg		<0.0002	----	----	----	----
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg		<0.0002	----	----	----	----
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg		<0.0002	----	----	----	----
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg		<0.0002	----	----	----	----
EP231B: Perfluoroalkyl Carboxylic Acids									
Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg		<0.001	----	----	----	----
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg		<0.0002	----	----	----	----
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg		<0.0002	----	----	----	----
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg		<0.0002	----	----	----	----
Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg		<0.0002	----	----	----	----
Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg		<0.0002	----	----	----	----
Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg		<0.0002	----	----	----	----
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg		<0.0002	----	----	----	----
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg		<0.0002	----	----	----	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	MW04@0.50	MW04@3.00	DUP3	----	----
				Client sampling date / time	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	----	----
Compound	CAS Number	LOR	Unit		ES1838498-016	ES1838498-018	ES1838498-021	--------	--------
					Result	Result	Result	----	----
EP231B: Perfluoroalkyl Carboxylic Acids - Continued									
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg		<0.0002	----	----	----	----
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg		<0.0005	----	----	----	----
EP231C: Perfluoroalkyl Sulfonamides									
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg		<0.0002	----	----	----	----
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg		<0.0005	----	----	----	----
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg		<0.0005	----	----	----	----
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg		<0.0005	----	----	----	----
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg		<0.0005	----	----	----	----
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg		<0.0002	----	----	----	----
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg		<0.0002	----	----	----	----
EP231D: (n:2) Fluorotelomer Sulfonic Acids									
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg		<0.0005	----	----	----	----
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg		<0.0005	----	----	----	----
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg		<0.0005	----	----	----	----
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg		<0.0005	----	----	----	----
EP231P: PFAS Sums									
Sum of PFAS	----	0.0002	mg/kg		<0.0002	----	----	----	----
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	mg/kg		<0.0002	----	----	----	----
Sum of PFAS (WA DER List)	----	0.0002	mg/kg		<0.0002	----	----	----	----
EP066S: PCB Surrogate									

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	MW04@0.50	MW04@3.00	DUP3	----	----
				Client sampling date / time	19-Dec-2018 00:00	19-Dec-2018 00:00	19-Dec-2018 00:00	----	----
Compound	CAS Number	LOR	Unit		ES1838498-016	ES1838498-018	ES1838498-021	--------	--------
					Result	Result	Result	----	----
EP066S: PCB Surrogate - Continued									
Decachlorobiphenyl	2051-24-3	0.1	%		95.0	87.0	101	----	----
EP068S: Organochlorine Pesticide Surrogate									
Dibromo-DDE	21655-73-2	0.05	%		115	118	119	----	----
EP068T: Organophosphorus Pesticide Surrogate									
DEF	78-48-8	0.05	%		112	92.6	108	----	----
EP074S: VOC Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.5	%		82.8	78.6	83.8	----	----
Toluene-D8	2037-26-5	0.5	%		95.8	88.6	100	----	----
4-Bromofluorobenzene	460-00-4	0.5	%		96.2	91.2	102	----	----
EP075S: Acid Extractable Surrogates									
2-Fluorophenol	367-12-4	0.5	%		93.4	94.2	94.9	----	----
Phenol-d6	13127-88-3	0.5	%		93.0	95.6	98.2	----	----
2-Chlorophenol-D4	93951-73-6	0.5	%		92.8	95.0	96.0	----	----
2.4.6-Tribromophenol	118-79-6	0.5	%		67.8	57.3	52.8	----	----
EP075T: Base/Neutral Extractable Surrogates									
Nitrobenzene-D5	4165-60-0	0.5	%		93.0	92.0	93.3	----	----
1.2-Dichlorobenzene-D4	2199-69-1	0.5	%		85.7	84.2	87.2	----	----
2-Fluorobiphenyl	321-60-8	0.5	%		93.2	93.9	94.5	----	----
Anthracene-d10	1719-06-8	0.5	%		92.1	91.9	95.4	----	----
4-Terphenyl-d14	1718-51-0	0.5	%		84.7	85.6	88.1	----	----
EP080S: TPH(V)/BTEX Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.2	%		84.0	79.5	85.3	----	----
Toluene-D8	2037-26-5	0.2	%		88.2	81.9	92.5	----	----
4-Bromofluorobenzene	460-00-4	0.2	%		94.2	89.5	99.5	----	----
EP231S: PFAS Surrogate									
13C4-PFOS	----	0.0002	%		97.0	----	----	----	----
13C8-PFOA	----	0.0002	%		118	----	----	----	----

Analytical Results

Descriptive Results

Sub-Matrix: **SOIL**

Method: Compound	Client sample ID - Client sampling date / time	Analytical Results
EA200: AS 4964 - 2004 Identification of Asbestos in Soils		
EA200: Description	MW05@1.00 - 19-Dec-2018 00:00	Mid brown sandy soil plus three fragments of asbestos fibre board approx 5 x 5 x 4mm plus several asbestos fibre bundles approx 5 x 1 x 0.5mm
EA200: Description	MW07@1.00 - 19-Dec-2018 00:00	Pale brown sandy soil
EA200: Description	MW03@1.00 - 19-Dec-2018 00:00	Mid brown clay soil
EA200: Description	MW04@0.50 - 19-Dec-2018 00:00	Mid brown sandy soil containing one piece of asbestos cement sheeting approx. 25 x 20 x 5mm.

Surrogate Control Limits

Sub-Matrix: **SOIL**

Compound	CAS Number	Recovery Limits (%) Low	High
EP066S: PCB Surrogate			
Decachlorobiphenyl	2051-24-3	39	149
EP068S: Organochlorine Pesticide Surrogate			
Dibromo-DDE	21655-73-2	49	147
EP068T: Organophosphorus Pesticide Surrogate			
DEF	78-48-8	35	143
EP074S: VOC Surrogates			
1.2-Dichloroethane-D4	17060-07-0	64	130
Toluene-D8	2037-26-5	66	136
4-Bromofluorobenzene	460-00-4	60	122
EP075S: Acid Extractable Surrogates			
2-Fluorophenol	367-12-4	29	149
Phenol-d6	13127-88-3	32	128
2-Chlorophenol-D4	93951-73-6	32	128
2.4.6-Tribromophenol	118-79-6	13	121
EP075T: Base/Neutral Extractable Surrogates			
Nitrobenzene-D5	4165-60-0	33	125
1.2-Dichlorobenzene-D4	2199-69-1	34	108
2-Fluorobiphenyl	321-60-8	35	121
Anthracene-d10	1719-06-8	35	123
4-Terphenyl-d14	1718-51-0	33	125
EP080S: TPH(V)/BTEX Surrogates			
1.2-Dichloroethane-D4	17060-07-0	73	133
Toluene-D8	2037-26-5	74	132
4-Bromofluorobenzene	460-00-4	72	130
EP231S: PFAS Surrogate			
13C4-PFOS	----	60	120
13C8-PFOA	----	60	120

ALS Environmental

QUALITY CONTROL REPORT

Work Order	: **ES1838498**	Page	: 1 of 24
Client	: **ARCADIS AUSTRALIA PACIFIC PTY LTD**	Laboratory	: Environmental Division Sydney
Contact	: MR DEAN STAFFORD	Contact	: Loren Schiavon
Address	: L16, 480 GEORGE STREET SYDNEY NSW 2000	Address	: 277-289 Woodpark Road Smithfield NSW Australia 2164
Telephone	: 02 9690 2555	Telephone	: +61 2 8784 8555
Project	: King St North ESA	Date Samples Received	: 19-Dec-2018
Order number	: 10026439	Date Analysis Commenced	: 21-Dec-2018
C-O-C number	: ----	Issue Date	: 03-Jan-2019
Sampler	: CAITLAIN REGENA		
Site	: ----		
Quote number	: EN/091/17 (Primary Work only)		
No. of samples received	: 22		
No. of samples analysed	: 8		

This report supersedes any previous report(s) with this reference. Results apply to the sample(s) as submitted. This document shall not be reproduced, except in full.

This Quality Control Report contains the following information:

- Laboratory Duplicate (DUP) Report; Relative Percentage Difference (RPD) and Acceptance Limits
- Method Blank (MB) and Laboratory Control Spike (LCS) Report; Recovery and Acceptance Limits
- Matrix Spike (MS) Report; Recovery and Acceptance Limits

Signatories

This document has been electronically signed by the authorized signatories below. Electronic signing is carried out in compliance with procedures specified in 21 CFR Part 11.

Signatories	*Position*	*Accreditation Category*
Alex Rossi	Organic Chemist	Sydney Inorganics, Smithfield, NSW
Alex Rossi	Organic Chemist	Sydney Organics, Smithfield, NSW
Christopher Owler	Team Leader - Asbestos	Newcastle - Asbestos, Mayfield West, NSW
Ivan Taylor	Analyst	Sydney Inorganics, Smithfield, NSW
Wisam Marassa	Inorganics Coordinator	Sydney Inorganics, Smithfield, NSW

General Comments

The analytical procedures used by the Environmental Division have been developed from established internationally recognized procedures such as those published by the USEPA, APHA, AS and NEPM. In house developed procedures are employed in the absence of documented standards or by client request.

Where moisture determination has been performed, results are reported on a dry weight basis.

Where a reported less than (<) result is higher than the LOR, this may be due to primary sample extract/digestate dilution and/or insufficient sample for analysis. Where the LOR of a reported result differs from standard LOR, this may be due to high

Key : Anonymous = Refers to samples which are not specifically part of this work order but formed part of the QC process lot
CAS Number = CAS registry number from database maintained by Chemical Abstracts Services. The Chemical Abstracts Service is a division of the American Chemical Society.
LOR = Limit of reporting
RPD = Relative Percentage Difference
# = Indicates failed QC

Laboratory Duplicate (DUP) Report

The quality control term Laboratory Duplicate refers to a randomly selected intralaboratory split. Laboratory duplicates provide information regarding method precision and sample heterogeneity. The permitted ranges for the Relative Percent Deviation (RPD) of Laboratory Duplicates are specified in ALS Method QWI-EN/38 and are dependent on the magnitude of results in comparison to the level of reporting: Result < 10 times LOR: No Limit; Result between 10 and 20 times LOR: 0% - 50%; Result > 20 times LOR: 0% - 20%.

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EA055: Moisture Content (Dried @ 105-110°C) (QC Lot: 2111263)									
ES1838193-003	Anonymous	EA055: Moisture Content	----	0.1	%	2.2	1.9	14.7	0% - 20%
ES1838512-002	Anonymous	EA055: Moisture Content	----	0.1	%	12.4	14.6	16.7	0% - 50%
EG005T: Total Metals by ICP-AES (QC Lot: 2115538)									
ES1837035-001	Anonymous	EG005T: Cadmium	7440-43-9	1	mg/kg	2	2	0.00	No Limit
		EG005T: Chromium	7440-47-3	2	mg/kg	11	11	0.00	No Limit
		EG005T: Nickel	7440-02-0	2	mg/kg	8	9	0.00	No Limit
		EG005T: Arsenic	7440-38-2	5	mg/kg	623	630	1.11	0% - 20%
		EG005T: Copper	7440-50-8	5	mg/kg	44	44	0.00	No Limit
		EG005T: Lead	7439-92-1	5	mg/kg	107	97	9.90	0% - 20%
		EG005T: Zinc	7440-66-6	5	mg/kg	839	839	0.00	0% - 20%
ES1838498-007	MW07@1.00	EG005T: Cadmium	7440-43-9	1	mg/kg	<1	<1	0.00	No Limit
		EG005T: Chromium	7440-47-3	2	mg/kg	3	3	0.00	No Limit
		EG005T: Nickel	7440-02-0	2	mg/kg	<2	<2	0.00	No Limit
		EG005T: Arsenic	7440-38-2	5	mg/kg	<5	<5	0.00	No Limit
		EG005T: Copper	7440-50-8	5	mg/kg	<5	<5	0.00	No Limit
		EG005T: Lead	7439-92-1	5	mg/kg	<5	<5	0.00	No Limit
		EG005T: Zinc	7440-66-6	5	mg/kg	5	5	0.00	No Limit
EG035T: Total Recoverable Mercury by FIMS (QC Lot: 2115539)									
ES1837035-001	Anonymous	EG035T: Mercury	7439-97-6	0.1	mg/kg	0.8	0.5	46.1	No Limit
ES1838498-007	MW07@1.00	EG035T: Mercury	7439-97-6	0.1	mg/kg	<0.1	<0.1	0.00	No Limit
EP066: Polychlorinated Biphenyls (PCB) (QC Lot: 2107971)									
ES1838498-001	DUP4	EP066: Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	<0.1	0.00	No Limit
EP068A: Organochlorine Pesticides (OC) (QC Lot: 2107968)									
ES1838498-001	DUP4	EP068: alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP068A: Organochlorine Pesticides (OC) (QC Lot: 2107968) - continued									
ES1838498-001	DUP4	EP068: Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: delta-BHC	319-86-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Heptachlor	76-44-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Aldrin	309-00-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Heptachlor epoxide	1024-57-3	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: trans-Chlordane	5103-74-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: alpha-Endosulfan	959-98-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: cis-Chlordane	5103-71-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Dieldrin	60-57-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDE	72-55-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin	72-20-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: beta-Endosulfan	33213-65-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDD	72-54-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin aldehyde	7421-93-4	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endosulfan sulfate	1031-07-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin ketone	53494-70-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDT	50-29-3	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Methoxychlor	72-43-5	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
EP068B: Organophosphorus Pesticides (OP) (QC Lot: 2107968)									
ES1838498-001	DUP4	EP068: Dichlorvos	62-73-7	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Demeton-S-methyl	919-86-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Dimethoate	60-51-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Diazinon	333-41-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Malathion	121-75-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Fenthion	55-38-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorpyrifos	2921-88-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Pirimphos-ethyl	23505-41-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorfenvinphos	470-90-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Bromophos-ethyl	4824-78-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Fenamiphos	22224-92-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Prothiofos	34643-46-4	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Ethion	563-12-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Carbophenothion	786-19-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Azinphos Methyl	86-50-0	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Monocrotophos	6923-22-4	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Parathion-methyl	298-00-0	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Parathion	56-38-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP074A: Monocyclic Aromatic Hydrocarbons (QC Lot: 2109182)									
ES1838118-047	Anonymous	EP074: Benzene	71-43-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP074: Toluene	108-88-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Styrene	100-42-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Isopropylbenzene	98-82-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: n-Propylbenzene	103-65-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: sec-Butylbenzene	135-98-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: tert-Butylbenzene	98-06-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: p-Isopropyltoluene	99-87-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: n-Butylbenzene	104-51-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838480-039	Anonymous	EP074: Benzene	71-43-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP074: Toluene	108-88-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Styrene	100-42-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Isopropylbenzene	98-82-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: n-Propylbenzene	103-65-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: sec-Butylbenzene	135-98-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: tert-Butylbenzene	98-06-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: p-Isopropyltoluene	99-87-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: n-Butylbenzene	104-51-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074B: Oxygenated Compounds (QC Lot: 2109182)									
ES1838118-047	Anonymous	EP074: Vinyl Acetate	108-05-4	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 2-Butanone (MEK)	78-93-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 2-Hexanone (MBK)	591-78-6	5	mg/kg	<5	<5	0.00	No Limit
ES1838480-039	Anonymous	EP074: Vinyl Acetate	108-05-4	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 2-Butanone (MEK)	78-93-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 2-Hexanone (MBK)	591-78-6	5	mg/kg	<5	<5	0.00	No Limit
EP074C: Sulfonated Compounds (QC Lot: 2109182)									

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP074C: Sulfonated Compounds (QC Lot: 2109182) - continued									
ES1838118-047	Anonymous	EP074: Carbon disulfide	75-15-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838480-039	Anonymous	EP074: Carbon disulfide	75-15-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074D: Fumigants (QC Lot: 2109182)									
ES1838118-047	Anonymous	EP074: 2.2-Dichloropropane	594-20-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dichloropropane	78-87-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838480-039	Anonymous	EP074: 2.2-Dichloropropane	594-20-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dichloropropane	78-87-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074E: Halogenated Aliphatic Compounds (QC Lot: 2109182)									
ES1838118-047	Anonymous	EP074: 1.1-Dichloroethene	75-35-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Iodomethane	74-88-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1-Dichloroethane	75-34-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.1-Trichloroethane	71-55-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1-Dichloropropylene	563-58-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Carbon Tetrachloride	56-23-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dichloroethane	107-06-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Trichloroethene	79-01-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dibromomethane	74-95-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.2-Trichloroethane	79-00-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.3-Dichloropropane	142-28-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Tetrachloroethene	127-18-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.3-Trichloropropane	96-18-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Pentachloroethane	76-01-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dichlorodifluoromethane	75-71-8	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Chloromethane	74-87-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Vinyl chloride	75-01-4	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Bromomethane	74-83-9	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Chloroethane	75-00-3	5	mg/kg	<5	<5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP074E: Halogenated Aliphatic Compounds (QC Lot: 2109182) - continued									
ES1838118-047	Anonymous	EP074: Trichlorofluoromethane	75-69-4	5	mg/kg	<5	<5	0.00	No Limit
ES1838480-039	Anonymous	EP074: 1.1-Dichloroethene	75-35-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Iodomethane	74-88-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1-Dichloroethane	75-34-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.1-Trichloroethane	71-55-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1-Dichloropropylene	563-58-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Carbon Tetrachloride	56-23-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dichloroethane	107-06-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Trichloroethene	79-01-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dibromomethane	74-95-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.2-Trichloroethane	79-00-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.3-Dichloropropane	142-28-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Tetrachloroethene	127-18-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.3-Trichloropropane	96-18-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Pentachloroethane	76-01-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dichlorodifluoromethane	75-71-8	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Chloromethane	74-87-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Vinyl chloride	75-01-4	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Bromomethane	74-83-9	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Chloroethane	75-00-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Trichlorofluoromethane	75-69-4	5	mg/kg	<5	<5	0.00	No Limit
EP074F: Halogenated Aromatic Compounds (QC Lot: 2109182)									
ES1838118-047	Anonymous	EP074: Chlorobenzene	108-90-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromobenzene	108-86-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 2-Chlorotoluene	95-49-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 4-Chlorotoluene	106-43-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838480-039	Anonymous	EP074: Chlorobenzene	108-90-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromobenzene	108-86-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 2-Chlorotoluene	95-49-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 4-Chlorotoluene	106-43-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074G: Trihalomethanes (QC Lot: 2109182)									

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP074G: Trihalomethanes (QC Lot: 2109182) - continued									
ES1838118-047	Anonymous	EP074: Chloroform	67-66-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromodichloromethane	75-27-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dibromochloromethane	124-48-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromoform	75-25-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1838480-039	Anonymous	EP074: Chloroform	67-66-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromodichloromethane	75-27-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dibromochloromethane	124-48-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromoform	75-25-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075A: Phenolic Compounds (QC Lot: 2107970)									
ES1838498-001	DUP4	EP075: Phenol	108-95-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Chlorophenol	95-57-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Methylphenol	95-48-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3- & 4-Methylphenol	1319-77-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Nitrophenol	88-75-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4-Dimethylphenol	105-67-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4-Dichlorophenol	120-83-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.6-Dichlorophenol	87-65-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachlorophenol	87-86-5	1	mg/kg	<1	<1	0.00	No Limit
EP075B: Polynuclear Aromatic Hydrocarbons (QC Lot: 2107970)									
ES1838498-001	DUP4	EP075: Naphthalene	91-20-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Methylnaphthalene	91-57-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Chloronaphthalene	91-58-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acenaphthylene	208-96-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acenaphthene	83-32-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fluorene	86-73-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Phenanthrene	85-01-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Anthracene	120-12-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fluoranthene	206-44-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pyrene	129-00-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benz(a)anthracene	56-55-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chrysene	218-01-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(a)pyrene	50-32-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3-Methylcholanthrene	56-49-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075B: Polynuclear Aromatic Hydrocarbons (QC Lot: 2107970) - continued									
ES1838498-001	DUP4	EP075: Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg	<1	<1	0.00	No Limit
EP075C: Phthalate Esters (QC Lot: 2107970)									
ES1838498-001	DUP4	EP075: Dimethyl phthalate	131-11-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Diethyl phthalate	84-66-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Di-n-butyl phthalate	84-74-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Butyl benzyl phthalate	85-68-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Di-n-octylphthalate	117-84-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075D: Nitrosamines (QC Lot: 2107970)									
ES1838498-001	DUP4	EP075: N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodiethylamine	55-18-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosopyrrolidine	930-55-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: N-Nitrosomorpholine	59-89-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosopiperidine	100-75-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodibutylamine	924-16-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Methapyrilene	91-80-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075E: Nitroaromatics and Ketones (QC Lot: 2107970)									
ES1838498-001	DUP4	EP075: 2-Picoline	109-06-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acetophenone	98-86-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Nitrobenzene	98-95-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Isophorone	78-59-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.6-Dinitrotoluene	606-20-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 2.4-Dinitrotoluene	121-14-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 1-Naphthylamine	134-32-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 5-Nitro-o-toluidine	99-55-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Phenacetin	62-44-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Aminobiphenyl	92-67-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachloronitrobenzene	82-68-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pronamide	23950-58-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dimethylaminoazobenzene	60-11-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorobenzilate	510-15-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Azobenzene	103-33-3	1	mg/kg	<1	<1	0.00	No Limit
EP075F: Haloethers (QC Lot: 2107970)									
ES1838498-001	DUP4	EP075: Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075F: Haloethers (QC Lot: 2107970) - continued									
ES1838498-001	DUP4	EP075: Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075G: Chlorinated Hydrocarbons (QC Lot: 2107970)									
ES1838498-001	DUP4	EP075: 1.3-Dichlorobenzene	541-73-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.4-Dichlorobenzene	106-46-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.2-Dichlorobenzene	95-50-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachloroethane	67-72-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachloropropylene	1888-71-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachlorobutadiene	87-68-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachlorobenzene	608-93-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachlorobenzene (HCB)	118-74-1	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg	<2.5	<2.5	0.00	No Limit
EP075H: Anilines and Benzidines (QC Lot: 2107970)									
ES1838498-001	DUP4	EP075: Aniline	62-53-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chloroaniline	106-47-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Nitroaniline	88-74-4	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 3-Nitroaniline	99-09-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Dibenzofuran	132-64-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Nitroaniline	100-01-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Carbazole	86-74-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075I: Organochlorine Pesticides (QC Lot: 2107970)									
ES1838498-001	DUP4	EP075: alpha-BHC	319-84-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: beta-BHC	319-85-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: gamma-BHC	58-89-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: delta-BHC	319-86-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Heptachlor	76-44-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Aldrin	309-00-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Heptachlor epoxide	1024-57-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: alpha-Endosulfan	959-98-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4.4`-DDE	72-55-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dieldrin	60-57-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Endrin	72-20-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: beta-Endosulfan	33213-65-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4.4`-DDD	72-54-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Endosulfan sulfate	1031-07-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4.4`-DDT	50-29-3	0.5	mg/kg	<1.0	<1.0	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075J: Organophosphorus Pesticides (QC Lot: 2107970)									
ES1838498-001	DUP4	EP075: Dichlorvos	62-73-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dimethoate	60-51-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Diazinon	333-41-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorpyrifos-methyl	5598-13-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Malathion	121-75-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fenthion	55-38-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorpyrifos	2921-88-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pirimphos-ethyl	23505-41-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorfenvinphos	470-90-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Prothiofos	34643-46-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Ethion	563-12-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP080/071: Total Petroleum Hydrocarbons (QC Lot: 2107969)									
ES1838498-001	DUP4	EP071: C15 - C28 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: C29 - C36 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: C10 - C14 Fraction	----	50	mg/kg	<50	<50	0.00	No Limit
EP080/071: Total Petroleum Hydrocarbons (QC Lot: 2109183)									
ES1838118-047	Anonymous	EP080: C6 - C9 Fraction	----	10	mg/kg	<10	<10	0.00	No Limit
ES1838480-039	Anonymous	EP080: C6 - C9 Fraction	----	10	mg/kg	<10	<10	0.00	No Limit
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QC Lot: 2107969)									
ES1838498-001	DUP4	EP071: >C16 - C34 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: >C34 - C40 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: >C10 - C16 Fraction	----	50	mg/kg	<50	<50	0.00	No Limit
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QC Lot: 2109183)									
ES1838118-047	Anonymous	EP080: C6 - C10 Fraction	C6_C10	10	mg/kg	<10	<10	0.00	No Limit
ES1838480-039	Anonymous	EP080: C6 - C10 Fraction	C6_C10	10	mg/kg	<10	<10	0.00	No Limit
EP080: BTEXN (QC Lot: 2109183)									
ES1838118-047	Anonymous	EP080: Benzene	71-43-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP080: Toluene	108-88-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Naphthalene	91-20-3	1	mg/kg	<1	<1	0.00	No Limit
ES1838480-039	Anonymous	EP080: Benzene	71-43-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP080: Toluene	108-88-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP080: BTEXN (QC Lot: 2109183) - continued									
ES1838480-039	Anonymous	EP080: Naphthalene	91-20-3	1	mg/kg	<1	<1	0.00	No Limit
EP231A: Perfluoroalkyl Sulfonic Acids (QC Lot: 2109256)									
ES1838193-001	Anonymous	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	0.0007	0.0009	19.9	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	0.0003	0.0003	0.00	No Limit
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	0.0011	0.0012	9.52	No Limit
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	0.0099	0.0113	12.6	0% - 20%
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 2109256)									
ES1838193-001	Anonymous	EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	0.0016	0.0018	14.1	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	0.0023	0.0023	0.00	0% - 50%
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	0.0002	0.00	No Limit
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	0.0004	0.0004	0.00	No Limit
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	<0.001	0.00	No Limit
EP231C: Perfluoroalkyl Sulfonamides (QC Lot: 2109256)									
ES1838193-001	Anonymous	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QC Lot: 2109256)									
ES1838193-001	Anonymous	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	0.0008	0.0008	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QC Lot: 2109256) - continued									
ES1838193-001	Anonymous	EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit

Method Blank (MB) and Laboratory Control Spike (LCS) Report

The quality control term Method / Laboratory Blank refers to an analyte free matrix to which all reagents are added in the same volumes or proportions as used in standard sample preparation. The purpose of this QC parameter is to monitor potential laboratory contamination. The quality control term Laboratory Control Spike (LCS) refers to a certified reference material, or a known interference free matrix spiked with target analytes. The purpose of this QC parameter is to monitor method precision and accuracy independent of sample matrix. Dynamic Recovery Limits are based on statistical evaluation of processed LCS.

Sub-Matrix: **SOIL**

				Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
Method: Compound	CAS Number	LOR	Unit	Result	Concentration	LCS	Low	High
EG005T: Total Metals by ICP-AES (QCLot: 2115538)								
EG005T: Arsenic	7440-38-2	5	mg/kg	<5	21.7 mg/kg	91.1	86	126
EG005T: Cadmium	7440-43-9	1	mg/kg	<1	4.64 mg/kg	96.4	83	113
EG005T: Chromium	7440-47-3	2	mg/kg	<2	43.9 mg/kg	93.4	76	128
EG005T: Copper	7440-50-8	5	mg/kg	<5	32 mg/kg	93.1	86	120
EG005T: Lead	7439-92-1	5	mg/kg	<5	40 mg/kg	93.7	80	114
EG005T: Nickel	7440-02-0	2	mg/kg	<2	55 mg/kg	97.1	87	123
EG005T: Zinc	7440-66-6	5	mg/kg	<5	60.8 mg/kg	103	80	122
EG035T: Total Recoverable Mercury by FIMS (QCLot: 2115539)								
EG035T: Mercury	7439-97-6	0.1	mg/kg	<0.1	2.57 mg/kg	73.6	70	105
EP066: Polychlorinated Biphenyls (PCB) (QCLot: 2107971)								
EP066: Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	1 mg/kg	107	62	126
EP068A: Organochlorine Pesticides (OC) (QCLot: 2107968)								
EP068: alpha-BHC	319-84-6	0.05	mg/kg	<0.05	0.5 mg/kg	96.1	69	113
EP068: Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	0.5 mg/kg	95.5	65	117
EP068: beta-BHC	319-85-7	0.05	mg/kg	<0.05	0.5 mg/kg	109	67	119
EP068: gamma-BHC	58-89-9	0.05	mg/kg	<0.05	0.5 mg/kg	95.2	68	116
EP068: delta-BHC	319-86-8	0.05	mg/kg	<0.05	0.5 mg/kg	103	65	117
EP068: Heptachlor	76-44-8	0.05	mg/kg	<0.05	0.5 mg/kg	81.6	67	115
EP068: Aldrin	309-00-2	0.05	mg/kg	<0.05	0.5 mg/kg	97.4	69	115
EP068: Heptachlor epoxide	1024-57-3	0.05	mg/kg	<0.05	0.5 mg/kg	106	62	118
EP068: trans-Chlordane	5103-74-2	0.05	mg/kg	<0.05	0.5 mg/kg	110	63	117
EP068: alpha-Endosulfan	959-98-8	0.05	mg/kg	<0.05	0.5 mg/kg	104	66	116
EP068: cis-Chlordane	5103-71-9	0.05	mg/kg	<0.05	0.5 mg/kg	105	64	116
EP068: Dieldrin	60-57-1	0.05	mg/kg	<0.05	0.5 mg/kg	104	66	116
EP068: 4.4`-DDE	72-55-9	0.05	mg/kg	<0.05	0.5 mg/kg	106	67	115
EP068: Endrin	72-20-8	0.05	mg/kg	<0.05	0.5 mg/kg	103	67	123
EP068: beta-Endosulfan	33213-65-9	0.05	mg/kg	<0.05	0.5 mg/kg	112	69	115
EP068: 4.4`-DDD	72-54-8	0.05	mg/kg	<0.05	0.5 mg/kg	108	69	121
EP068: Endrin aldehyde	7421-93-4	0.05	mg/kg	<0.05	0.5 mg/kg	82.1	56	120
EP068: Endosulfan sulfate	1031-07-8	0.05	mg/kg	<0.05	0.5 mg/kg	83.8	62	124
EP068: 4.4`-DDT	50-29-3	0.2	mg/kg	<0.2	0.5 mg/kg	89.8	66	120
EP068: Endrin ketone	53494-70-5	0.05	mg/kg	<0.05	0.5 mg/kg	97.4	64	122
EP068: Methoxychlor	72-43-5	0.2	mg/kg	<0.2	0.5 mg/kg	77.5	54	130
EP068B: Organophosphorus Pesticides (OP) (QCLot: 2107968)								

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP068B: Organophosphorus Pesticides (OP) (QCLot: 2107968) - continued								
EP068: Dichlorvos	62-73-7	0.05	mg/kg	<0.05	0.5 mg/kg	72.0	59	119
EP068: Demeton-S-methyl	919-86-8	0.05	mg/kg	<0.05	0.5 mg/kg	74.0	62	128
EP068: Monocrotophos	6923-22-4	0.2	mg/kg	<0.2	0.5 mg/kg	70.6	54	126
EP068: Dimethoate	60-51-5	0.05	mg/kg	<0.05	0.5 mg/kg	76.4	67	119
EP068: Diazinon	333-41-5	0.05	mg/kg	<0.05	0.5 mg/kg	89.4	70	120
EP068: Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg	<0.05	0.5 mg/kg	86.7	72	120
EP068: Parathion-methyl	298-00-0	0.2	mg/kg	<0.2	0.5 mg/kg	83.8	68	120
EP068: Malathion	121-75-5	0.05	mg/kg	<0.05	0.5 mg/kg	71.0	68	122
EP068: Fenthion	55-38-9	0.05	mg/kg	<0.05	0.5 mg/kg	104	69	117
EP068: Chlorpyrifos	2921-88-2	0.05	mg/kg	<0.05	0.5 mg/kg	113	76	118
EP068: Parathion	56-38-2	0.2	mg/kg	<0.2	0.5 mg/kg	108	64	122
EP068: Pirimphos-ethyl	23505-41-1	0.05	mg/kg	<0.05	0.5 mg/kg	103	70	116
EP068: Chlorfenvinphos	470-90-6	0.05	mg/kg	<0.05	0.5 mg/kg	76.8	69	121
EP068: Bromophos-ethyl	4824-78-6	0.05	mg/kg	<0.05	0.5 mg/kg	106	66	118
EP068: Fenamiphos	22224-92-6	0.05	mg/kg	<0.05	0.5 mg/kg	82.2	68	124
EP068: Prothiofos	34643-46-4	0.05	mg/kg	<0.05	0.5 mg/kg	99.0	62	112
EP068: Ethion	563-12-2	0.05	mg/kg	<0.05	0.5 mg/kg	95.0	68	120
EP068: Carbophenothion	786-19-6	0.05	mg/kg	<0.05	0.5 mg/kg	70.2	65	127
EP068: Azinphos Methyl	86-50-0	0.05	mg/kg	<0.05	0.5 mg/kg	68.3	41	123
EP074A: Monocyclic Aromatic Hydrocarbons (QCLot: 2109182)								
EP074: Benzene	71-43-2	0.2	mg/kg	<0.2	1 mg/kg	98.7	71	121
EP074: Toluene	108-88-3	0.5	mg/kg	<0.5	1 mg/kg	105	65	131
EP074: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	1 mg/kg	104	72	114
EP074: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	2 mg/kg	105	70	116
EP074: Styrene	100-42-5	0.5	mg/kg	<0.5	1 mg/kg	99.5	67	113
EP074: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	1 mg/kg	103	75	115
EP074: Isopropylbenzene	98-82-8	0.5	mg/kg	<0.5	1 mg/kg	105	65	117
EP074: n-Propylbenzene	103-65-1	0.5	mg/kg	<0.5	1 mg/kg	101	66	122
EP074: 1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg	<0.5	1 mg/kg	102	68	118
EP074: sec-Butylbenzene	135-98-8	0.5	mg/kg	<0.5	1 mg/kg	102	69	119
EP074: 1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg	<0.5	1 mg/kg	102	69	117
EP074: tert-Butylbenzene	98-06-6	0.5	mg/kg	<0.5	1 mg/kg	101	69	115
EP074: p-Isopropyltoluene	99-87-6	0.5	mg/kg	<0.5	1 mg/kg	103	66	118
EP074: n-Butylbenzene	104-51-8	0.5	mg/kg	<0.5	1 mg/kg	103	59	125
EP074B: Oxygenated Compounds (QCLot: 2109182)								
EP074: Vinyl Acetate	108-05-4	5	mg/kg	<5	10 mg/kg	90.6	30	156
EP074: 2-Butanone (MEK)	78-93-3	5	mg/kg	<5	10 mg/kg	102	58	136
EP074: 4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg	<5	10 mg/kg	86.9	62	132

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP074B: Oxygenated Compounds (QCLot: 2109182) - continued								
EP074: 2-Hexanone (MBK)	591-78-6	5	mg/kg	<5	10 mg/kg	88.8	54	136
EP074C: Sulfonated Compounds (QCLot: 2109182)								
EP074: Carbon disulfide	75-15-0	0.5	mg/kg	<0.5	1 mg/kg	95.3	54	126
EP074D: Fumigants (QCLot: 2109182)								
EP074: 2.2-Dichloropropane	594-20-7	0.5	mg/kg	<0.5	1 mg/kg	103	60	126
EP074: 1.2-Dichloropropane	78-87-5	0.5	mg/kg	<0.5	1 mg/kg	93.4	68	124
EP074: cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg	<0.5	1 mg/kg	94.9	51	119
EP074: trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg	<0.5	1 mg/kg	94.0	52	114
EP074: 1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg	<0.5	1 mg/kg	98.6	63	115
EP074E: Halogenated Aliphatic Compounds (QCLot: 2109182)								
EP074: Dichlorodifluoromethane	75-71-8	5	mg/kg	<5	10 mg/kg	62.1	30	148
EP074: Chloromethane	74-87-3	5	mg/kg	<5	10 mg/kg	78.3	41	141
EP074: Vinyl chloride	75-01-4	5	mg/kg	<5	10 mg/kg	97.0	43	147
EP074: Bromomethane	74-83-9	5	mg/kg	<5	10 mg/kg	88.8	47	141
EP074: Chloroethane	75-00-3	5	mg/kg	<5	10 mg/kg	91.7	49	143
EP074: Trichlorofluoromethane	75-69-4	5	mg/kg	<5	10 mg/kg	95.8	49	135
EP074: 1.1-Dichloroethene	75-35-4	0.5	mg/kg	<0.5	1 mg/kg	98.8	54	126
EP074: Iodomethane	74-88-4	0.5	mg/kg	<0.5	1 mg/kg	81.7	43	129
EP074: trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg	<0.5	1 mg/kg	104	64	120
EP074: 1.1-Dichloroethane	75-34-3	0.5	mg/kg	<0.5	1 mg/kg	96.2	67	125
EP074: cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg	<0.5	1 mg/kg	97.5	69	121
EP074: 1.1.1-Trichloroethane	71-55-6	0.5	mg/kg	<0.5	1 mg/kg	99.4	65	117
EP074: 1.1-Dichloropropylene	563-58-6	0.5	mg/kg	<0.5	1 mg/kg	99.2	65	123
EP074: Carbon Tetrachloride	56-23-5	0.5	mg/kg	<0.5	1 mg/kg	99.1	59	125
EP074: 1.2-Dichloroethane	107-06-2	0.5	mg/kg	<0.5	1 mg/kg	86.9	65	125
EP074: Trichloroethene	79-01-6	0.5	mg/kg	<0.5	1 mg/kg	97.6	70	118
EP074: Dibromomethane	74-95-3	0.5	mg/kg	<0.5	1 mg/kg	92.0	68	118
EP074: 1.1.2-Trichloroethane	79-00-5	0.5	mg/kg	<0.5	1 mg/kg	98.5	64	126
EP074: 1.3-Dichloropropane	142-28-9	0.5	mg/kg	<0.5	1 mg/kg	98.3	68	122
EP074: Tetrachloroethene	127-18-4	0.5	mg/kg	<0.5	1 mg/kg	114	67	143
EP074: 1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg	<0.5	1 mg/kg	101	62	122
EP074: trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg	<0.5	1 mg/kg	98.1	54	128
EP074: cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg	<0.5	1 mg/kg	104	55	129
EP074: 1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg	<0.5	1 mg/kg	95.5	65	121
EP074: 1.2.3-Trichloropropane	96-18-4	0.5	mg/kg	<0.5	1 mg/kg	93.8	61	125
EP074: Pentachloroethane	76-01-7	0.5	mg/kg	<0.5	1 mg/kg	99.8	20	134
EP074: 1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg	<0.5	1 mg/kg	83.3	53	129
EP074F: Halogenated Aromatic Compounds (QCLot: 2109182)								

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP074F: Halogenated Aromatic Compounds (QCLot: 2109182) - continued								
EP074: Chlorobenzene	108-90-7	0.5	mg/kg	<0.5	1 mg/kg	105	68	116
EP074: Bromobenzene	108-86-1	0.5	mg/kg	<0.5	1 mg/kg	97.7	70	114
EP074: 2-Chlorotoluene	95-49-8	0.5	mg/kg	<0.5	1 mg/kg	97.1	68	122
EP074: 4-Chlorotoluene	106-43-4	0.5	mg/kg	<0.5	1 mg/kg	96.5	67	123
EP074: 1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg	<0.5	1 mg/kg	104	52	122
EP074G: Trihalomethanes (QCLot: 2109182)								
EP074: Chloroform	67-66-3	0.5	mg/kg	<0.5	1 mg/kg	94.8	66	124
EP074: Bromodichloromethane	75-27-4	0.5	mg/kg	<0.5	1 mg/kg	94.0	61	121
EP074: Dibromochloromethane	124-48-1	0.5	mg/kg	<0.5	1 mg/kg	102	63	121
EP074: Bromoform	75-25-2	0.5	mg/kg	<0.5	1 mg/kg	96.5	60	126
EP075A: Phenolic Compounds (QCLot: 2107970)								
EP075: Phenol	108-95-2	0.5	mg/kg	<0.5	1.5 mg/kg	91.4	64	114
EP075: 2-Chlorophenol	95-57-8	0.5	mg/kg	<0.5	1.5 mg/kg	88.4	57	115
EP075: 2-Methylphenol	95-48-7	0.5	mg/kg	<0.5	1.5 mg/kg	93.2	55	117
EP075: 3- & 4-Methylphenol	1319-77-3	0.5	mg/kg	<0.5	1.5 mg/kg	83.4	46	122
EP075: 2-Nitrophenol	88-75-5	0.5	mg/kg	<0.5	1.5 mg/kg	77.1	47	117
EP075: 2.4-Dimethylphenol	105-67-9	0.5	mg/kg	<0.5	1.5 mg/kg	90.2	14	108
EP075: 2.4-Dichlorophenol	120-83-2	0.5	mg/kg	<0.5	1.5 mg/kg	90.0	47	105
EP075: 2.6-Dichlorophenol	87-65-0	0.5	mg/kg	<0.5	1.5 mg/kg	84.9	48	110
EP075: 4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg	<0.5	1.5 mg/kg	99.0	57	113
EP075: 2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg	<0.5	1.5 mg/kg	94.8	49	109
EP075: 2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg	<0.5	1.5 mg/kg	89.7	49	107
EP075: Pentachlorophenol	87-86-5	1	mg/kg	<1	3 mg/kg	37.7	12	76
EP075B: Polynuclear Aromatic Hydrocarbons (QCLot: 2107970)								
EP075: Naphthalene	91-20-3	0.5	mg/kg	<0.5	1.5 mg/kg	95.0	62	118
EP075: 2-Methylnaphthalene	91-57-6	0.5	mg/kg	<0.5	1.5 mg/kg	99.8	58	116
EP075: 2-Chloronaphthalene	91-58-7	0.5	mg/kg	<0.5	1.5 mg/kg	88.1	54	112
EP075: Acenaphthylene	208-96-8	0.5	mg/kg	<0.5	1.5 mg/kg	90.1	56	114
EP075: Acenaphthene	83-32-9	0.5	mg/kg	<0.5	1.5 mg/kg	95.5	62	112
EP075: Fluorene	86-73-7	0.5	mg/kg	<0.5	1.5 mg/kg	96.0	59	115
EP075: Phenanthrene	85-01-8	0.5	mg/kg	<0.5	1.5 mg/kg	92.7	63	113
EP075: Anthracene	120-12-7	0.5	mg/kg	<0.5	1.5 mg/kg	95.5	57	111
EP075: Fluoranthene	206-44-0	0.5	mg/kg	<0.5	1.5 mg/kg	95.9	58	114
EP075: Pyrene	129-00-0	0.5	mg/kg	<0.5	1.5 mg/kg	92.8	57	117
EP075: N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg	<0.5	1.5 mg/kg	82.9	58	114
EP075: Benz(a)anthracene	56-55-3	0.5	mg/kg	<0.5	1.5 mg/kg	102	59	115
EP075: Chrysene	218-01-9	0.5	mg/kg	<0.5	1.5 mg/kg	92.8	61	117

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP075B: Polynuclear Aromatic Hydrocarbons (QCLot: 2107970) - continued								
EP075: Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg	<1	3 mg/kg	80.0	57	119
EP075: 7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg	<0.5	1.5 mg/kg	80.6	48	106
EP075: Benzo(a)pyrene	50-32-8	0.5	mg/kg	<0.5	1.5 mg/kg	91.6	56	116
EP075: 3-Methylcholanthrene	56-49-5	0.5	mg/kg	<0.5	1.5 mg/kg	83.4	50	116
EP075: Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg	<0.5	1.5 mg/kg	92.4	55	117
EP075: Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg	<0.5	1.5 mg/kg	95.2	53	119
EP075: Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg	<0.5	1.5 mg/kg	99.3	56	120
EP075C: Phthalate Esters (QCLot: 2107970)								
EP075: Dimethyl phthalate	131-11-3	0.5	mg/kg	<0.5	1.5 mg/kg	99.3	60	118
EP075: Diethyl phthalate	84-66-2	0.5	mg/kg	<0.5	1.5 mg/kg	101	65	115
EP075: Di-n-butyl phthalate	84-74-2	0.5	mg/kg	<0.5	1.5 mg/kg	85.5	65	121
EP075: Butyl benzyl phthalate	85-68-7	0.5	mg/kg	<0.5	1.5 mg/kg	96.6	62	116
EP075: bis(2-ethylhexyl) phthalate	117-81-7	----	mg/kg	----	1.5 mg/kg	69.6	69	133
EP075: Di-n-octylphthalate	117-84-0	0.5	mg/kg	<0.5	1.5 mg/kg	73.2	62	124
EP075D: Nitrosamines (QCLot: 2107970)								
EP075: N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg	<0.5	1.5 mg/kg	82.0	39	124
EP075: N-Nitrosodiethylamine	55-18-5	0.5	mg/kg	<0.5	1.5 mg/kg	84.0	59	117
EP075: N-Nitrosopyrrolidine	930-55-2	0.5	mg/kg	<0.5	1.5 mg/kg	99.9	53	125
EP075: N-Nitrosomorpholine	59-89-2	0.5	mg/kg	<0.5	1.5 mg/kg	86.4	65	121
EP075: N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg	<0.5	1.5 mg/kg	90.7	59	123
EP075: N-Nitrosopiperidine	100-75-4	0.5	mg/kg	<0.5	1.5 mg/kg	86.5	57	115
EP075: N-Nitrosodibutylamine	924-16-3	0.5	mg/kg	<0.5	1.5 mg/kg	93.2	57	119
EP075: N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	0.5	mg/kg	<0.6	3 mg/kg	49.2	42	112
EP075: Methapyrilene	91-80-5	0.5	mg/kg	<0.5	1.5 mg/kg	97.4	16	123
EP075E: Nitroaromatics and Ketones (QCLot: 2107970)								
EP075: 2-Picoline	109-06-8	0.5	mg/kg	<0.5	1.5 mg/kg	79.4	27	129
EP075: Acetophenone	98-86-2	0.5	mg/kg	<0.5	1.5 mg/kg	89.4	60	116
EP075: Nitrobenzene	98-95-3	0.5	mg/kg	<0.5	1.5 mg/kg	99.0	65	119
EP075: Isophorone	78-59-1	0.5	mg/kg	<0.5	1.5 mg/kg	89.1	62	116
EP075: 2.6-Dinitrotoluene	606-20-2	0.5	mg/kg	<0.5	1.5 mg/kg	93.1	58	118
EP075: 2.4-Dinitrotoluene	121-14-2	0.5	mg/kg	<0.5	1.5 mg/kg	86.5	59	115
EP075: 1-Naphthylamine	134-32-7	0.5	mg/kg	<0.5	1.5 mg/kg	81.8	18	112
EP075: 4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg	<0.5	1.5 mg/kg	81.6	10	87
EP075: 5-Nitro-o-toluidine	99-55-8	0.5	mg/kg	<0.5	1.5 mg/kg	89.4	48	99
EP075: Azobenzene	103-33-3	1	mg/kg	<1	1.5 mg/kg	92.2	62	118
EP075: 1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg	<0.5	1.5 mg/kg	97.3	36	114

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP075E: Nitroaromatics and Ketones (QCLot: 2107970) - continued								
EP075: Phenacetin	62-44-2	0.5	mg/kg	<0.5	1.5 mg/kg	86.0	62	114
EP075: 4-Aminobiphenyl	92-67-1	0.5	mg/kg	<0.5	1.5 mg/kg	92.2	36	102
EP075: Pentachloronitrobenzene	82-68-8	0.5	mg/kg	<0.5	1.5 mg/kg	97.4	56	110
EP075: Pronamide	23950-58-5	0.5	mg/kg	<0.5	1.5 mg/kg	85.1	54	110
EP075: Dimethylaminoazobenzene	60-11-7	0.5	mg/kg	<0.5	1.5 mg/kg	86.3	48	108
EP075: Chlorobenzilate	510-15-6	0.5	mg/kg	<0.5	1.5 mg/kg	95.8	57	112
EP075F: Haloethers (QCLot: 2107970)								
EP075: Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg	<0.5	1.5 mg/kg	76.4	63	121
EP075: Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg	<0.5	1.5 mg/kg	88.6	59	115
EP075: 4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg	<0.5	1.5 mg/kg	97.3	58	112
EP075: 4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg	<0.5	1.5 mg/kg	91.7	58	110
EP075G: Chlorinated Hydrocarbons (QCLot: 2107970)								
EP075: 1.3-Dichlorobenzene	541-73-1	0.5	mg/kg	<0.5	1.5 mg/kg	93.1	58	112
EP075: 1.4-Dichlorobenzene	106-46-7	0.5	mg/kg	<0.5	1.5 mg/kg	85.8	58	116
EP075: 1.2-Dichlorobenzene	95-50-1	0.5	mg/kg	<0.5	1.5 mg/kg	92.9	57	115
EP075: Hexachloroethane	67-72-1	0.5	mg/kg	<0.5	1.5 mg/kg	92.5	54	116
EP075: 1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg	<0.5	1.5 mg/kg	90.9	63	108
EP075: Hexachloropropylene	1888-71-7	0.5	mg/kg	<0.5	1.5 mg/kg	99.4	39	110
EP075: Hexachlorobutadiene	87-68-3	0.5	mg/kg	<0.5	1.5 mg/kg	92.0	59	117
EP075: Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg	<2.5	1.5 mg/kg	85.3	24	108
EP075: Pentachlorobenzene	608-93-5	0.5	mg/kg	<0.5	1.5 mg/kg	96.4	57	109
EP075: Hexachlorobenzene (HCB)	118-74-1	0.5	mg/kg	<0.5	1.5 mg/kg	89.6	59	111
EP075H: Anilines and Benzidines (QCLot: 2107970)								
EP075: Aniline	62-53-3	0.5	mg/kg	<0.5	1.5 mg/kg	87.2	13	108
EP075: 4-Chloroaniline	106-47-8	0.5	mg/kg	<0.5	1.5 mg/kg	93.0	21	99
EP075: 2-Nitroaniline	88-74-4	0.5	mg/kg	<0.5	1.5 mg/kg	92.2	52	112
EP075: 3-Nitroaniline	99-09-2	0.5	mg/kg	<0.5	1.5 mg/kg	86.1	32	94
EP075: Dibenzofuran	132-64-9	0.5	mg/kg	<0.5	1.5 mg/kg	93.5	60	110
EP075: 4-Nitroaniline	100-01-8	0.5	mg/kg	<0.5	1.5 mg/kg	80.5	42	112
EP075: Carbazole	86-74-8	0.5	mg/kg	<0.5	1.5 mg/kg	93.8	59	111
EP075: 3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg	<0.5	1.5 mg/kg	85.3	23	113
EP075I: Organochlorine Pesticides (QCLot: 2107970)								
EP075: alpha-BHC	319-84-6	0.5	mg/kg	<0.5	1.5 mg/kg	96.0	63	113
EP075: beta-BHC	319-85-7	0.5	mg/kg	<0.5	1.5 mg/kg	98.2	57	113
EP075: gamma-BHC	58-89-9	0.5	mg/kg	<0.5	1.5 mg/kg	82.2	61	117
EP075: delta-BHC	319-86-8	0.5	mg/kg	<0.5	1.5 mg/kg	87.3	64	118
EP075: Heptachlor	76-44-8	0.5	mg/kg	<0.5	1.5 mg/kg	92.7	55	115
EP075: Aldrin	309-00-2	0.5	mg/kg	<0.5	1.5 mg/kg	93.7	61	115

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP075I: Organochlorine Pesticides (QCLot: 2107970) - continued								
EP075: Heptachlor epoxide	1024-57-3	0.5	mg/kg	<0.5	1.5 mg/kg	91.4	56	118
EP075: alpha-Endosulfan	959-98-8	0.5	mg/kg	<0.5	1.5 mg/kg	91.6	65	125
EP075: 4.4`-DDE	72-55-9	0.5	mg/kg	<0.5	1.5 mg/kg	94.9	60	116
EP075: Dieldrin	60-57-1	0.5	mg/kg	<0.5	1.5 mg/kg	90.1	64	118
EP075: Endrin	72-20-8	0.5	mg/kg	<0.5	1.5 mg/kg	99.4	53	117
EP075: beta-Endosulfan	33213-65-9	0.5	mg/kg	<0.5	1.5 mg/kg	94.8	65	115
EP075: 4.4`-DDD	72-54-8	0.5	mg/kg	<0.5	1.5 mg/kg	95.0	62	118
EP075: Endosulfan sulfate	1031-07-8	0.5	mg/kg	<0.5	1.5 mg/kg	95.8	63	129
EP075: 4.4`-DDT	50-29-3	0.5	mg/kg	<0.5	1.5 mg/kg	94.9	46	122
EP075J: Organophosphorus Pesticides (QCLot: 2107970)								
EP075: Dichlorvos	62-73-7	0.5	mg/kg	<0.5	1.5 mg/kg	70.5	46	112
EP075: Dimethoate	60-51-5	0.5	mg/kg	<0.5	1.5 mg/kg	72.5	63	119
EP075: Diazinon	333-41-5	0.5	mg/kg	<0.5	1.5 mg/kg	86.5	68	134
EP075: Chlorpyrifos-methyl	5598-13-0	0.5	mg/kg	<0.5	1.5 mg/kg	88.9	60	130
EP075: Malathion	121-75-5	0.5	mg/kg	<0.5	1.5 mg/kg	96.5	65	127
EP075: Fenthion	55-38-9	0.5	mg/kg	<0.5	1.5 mg/kg	86.3	60	116
EP075: Chlorpyrifos	2921-88-2	0.5	mg/kg	<0.5	1.5 mg/kg	99.9	63	113
EP075: Pirimphos-ethyl	23505-41-1	0.5	mg/kg	<0.5	1.5 mg/kg	86.8	65	115
EP075: Chlorfenvinphos	470-90-6	0.5	mg/kg	<0.5	1.5 mg/kg	87.0	59	103
EP075: Prothiofos	34643-46-4	0.5	mg/kg	<0.5	1.5 mg/kg	99.6	59	119
EP075: Ethion	563-12-2	0.5	mg/kg	<0.5	1.5 mg/kg	80.9	62	118
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2107969)								
EP071: C10 - C14 Fraction	----	50	mg/kg	<50	300 mg/kg	99.3	75	129
EP071: C15 - C28 Fraction	----	100	mg/kg	<100	450 mg/kg	102	77	131
EP071: C29 - C36 Fraction	----	100	mg/kg	<100	300 mg/kg	99.7	71	129
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2109183)								
EP080: C6 - C9 Fraction	----	10	mg/kg	<10	26 mg/kg	91.4	68	128
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2107969)								
EP071: >C10 - C16 Fraction	----	50	mg/kg	<50	375 mg/kg	101	77	125
EP071: >C16 - C34 Fraction	----	100	mg/kg	<100	525 mg/kg	100	74	138
EP071: >C34 - C40 Fraction	----	100	mg/kg	<100	225 mg/kg	100	63	131
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2109183)								
EP080: C6 - C10 Fraction	C6_C10	10	mg/kg	<10	31 mg/kg	96.6	68	128
EP080: BTEXN (QCLot: 2109183)								
EP080: Benzene	71-43-2	0.2	mg/kg	<0.2	1 mg/kg	95.0	62	116
EP080: Toluene	108-88-3	0.5	mg/kg	<0.5	1 mg/kg	93.5	67	121
EP080: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	1 mg/kg	93.0	65	117

Sub-Matrix: **SOIL**

				Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
Method: Compound	CAS Number	LOR	Unit	Result	Concentration	LCS	Low	High
EP080: BTEXN (QCLot: 2109183) - continued								
EP080: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	2 mg/kg	91.6	66	118
EP080: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	1 mg/kg	93.8	68	120
EP080: Naphthalene	91-20-3	1	mg/kg	<1	1 mg/kg	86.7	63	119
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 2109256)								
EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	0.00125 mg/kg	88.0	57	121
EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	0.00125 mg/kg	71.6	55	125
EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	<0.0002	0.00125 mg/kg	78.0	52	126
EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	<0.0002	0.00125 mg/kg	76.4	54	123
EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	72.0	55	127
EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	<0.0002	0.00125 mg/kg	65.6	54	125
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 2109256)								
EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	0.00625 mg/kg	66.9	52	128
EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	0.00125 mg/kg	102	54	129
EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	0.00125 mg/kg	94.8	58	127
EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	0.00125 mg/kg	77.6	57	128
EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	69.2	60	134
EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	68.4	63	130
EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	0.00125 mg/kg	67.6	55	130
EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	0.00125 mg/kg	84.8	62	130
EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	68.8	53	134
EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg	<0.0002	0.00125 mg/kg	70.0	49	129
EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	0.00312 mg/kg	71.0	59	129
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 2109256)								
EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	0.00125 mg/kg	79.2	52	132
EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	0.00312 mg/kg	83.2	65	126
EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	0.00312 mg/kg	79.8	64	126
EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	0.00312 mg/kg	69.7	63	124
EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	0.00312 mg/kg	70.2	58	125
EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	0.00125 mg/kg	82.8	61	130
EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	0.00125 mg/kg	73.2	55	130
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 2109256)								
EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	0.00125 mg/kg	81.6	54	130
EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	0.00125 mg/kg	72.8	61	130
EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	0.00125 mg/kg	66.0	62	130

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report: Result	Laboratory Control Spike (LCS) Report: Spike Concentration	Spike Recovery (%): LCS	Recovery Limits (%): Low	Recovery Limits (%): High
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 2109256) - continued								
EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	0.00125 mg/kg	70.0	60	130

Matrix Spike (MS) Report

The quality control term Matrix Spike (MS) refers to an intralaboratory split sample spiked with a representative set of target analytes. The purpose of this QC parameter is to monitor potential matrix effects on analyte recoveries. Static Recovery Limits as per laboratory Data Quality Objectives (DQOs). Ideal recovery ranges stated may be waived in the event of sample matrix interference.

Sub-Matrix: **SOIL**

Laboratory sample ID	Client sample ID	Method: Compound	CAS Number	Matrix Spike (MS) Report: Spike Concentration	SpikeRecovery(%): MS	Recovery Limits (%): Low	Recovery Limits (%): High
EG005T: Total Metals by ICP-AES (QCLot: 2115538)							
ES1837035-001	Anonymous	EG005T: Arsenic	7440-38-2	50 mg/kg	# Not Determined	70	130
		EG005T: Cadmium	7440-43-9	50 mg/kg	86.5	70	130
		EG005T: Chromium	7440-47-3	50 mg/kg	87.5	70	130
		EG005T: Copper	7440-50-8	250 mg/kg	85.0	70	130
		EG005T: Lead	7439-92-1	250 mg/kg	87.4	70	130
		EG005T: Nickel	7440-02-0	50 mg/kg	85.1	70	130
		EG005T: Zinc	7440-66-6	250 mg/kg	79.9	70	130
EG035T: Total Recoverable Mercury by FIMS (QCLot: 2115539)							
ES1837035-001	Anonymous	EG035T: Mercury	7439-97-6	5 mg/kg	73.6	70	130
EP066: Polychlorinated Biphenyls (PCB) (QCLot: 2107971)							
ES1838498-001	DUP4	EP066: Total Polychlorinated biphenyls	----	1 mg/kg	97.0	70	130
EP068A: Organochlorine Pesticides (OC) (QCLot: 2107968)							
ES1838498-001	DUP4	EP068: gamma-BHC	58-89-9	0.5 mg/kg	95.7	70	130
		EP068: Heptachlor	76-44-8	0.5 mg/kg	93.6	70	130
		EP068: Aldrin	309-00-2	0.5 mg/kg	114	70	130
		EP068: Dieldrin	60-57-1	0.5 mg/kg	86.6	70	130
		EP068: Endrin	72-20-8	2 mg/kg	94.7	70	130
		EP068: 4.4`-DDT	50-29-3	2 mg/kg	90.3	70	130
EP068B: Organophosphorus Pesticides (OP) (QCLot: 2107968)							
ES1838498-001	DUP4	EP068: Diazinon	333-41-5	0.5 mg/kg	80.2	70	130
		EP068: Chlorpyrifos-methyl	5598-13-0	0.5 mg/kg	77.7	70	130
		EP068: Pirimphos-ethyl	23505-41-1	0.5 mg/kg	79.7	70	130
		EP068: Bromophos-ethyl	4824-78-6	0.5 mg/kg	83.2	70	130
		EP068: Prothiofos	34643-46-4	0.5 mg/kg	89.0	70	130
EP074A: Monocyclic Aromatic Hydrocarbons (QCLot: 2109182)							
ES1838118-047	Anonymous	EP074: Benzene	71-43-2	2.5 mg/kg	93.4	70	130

Sub-Matrix: **SOIL**

				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Recovery Limits (%)	
Laboratory sample ID	Client sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP074A: Monocyclic Aromatic Hydrocarbons (QCLot: 2109182) - continued							
ES1838118-047	Anonymous	EP074: Toluene	108-88-3	2.5 mg/kg	102	70	130
EP074E: Halogenated Aliphatic Compounds (QCLot: 2109182)							
ES1838118-047	Anonymous	EP074: 1.1-Dichloroethene	75-35-4	2.5 mg/kg	98.4	70	130
		EP074: Trichloroethene	79-01-6	2.5 mg/kg	91.3	70	130
EP074F: Halogenated Aromatic Compounds (QCLot: 2109182)							
ES1838118-047	Anonymous	EP074: Chlorobenzene	108-90-7	2.5 mg/kg	100	70	130
EP075A: Phenolic Compounds (QCLot: 2107970)							
ES1838498-001	DUP4	EP075: Phenol	108-95-2	10 mg/kg	106	60	130
		EP075: 2-Chlorophenol	95-57-8	10 mg/kg	98.0	60	130
		EP075: 2-Nitrophenol	88-75-5	10 mg/kg	94.4	50	130
		EP075: 4-Chloro-3-methylphenol	59-50-7	10 mg/kg	106	50	130
		EP075: Pentachlorophenol	87-86-5	10 mg/kg	43.4	10	130
EP075B: Polynuclear Aromatic Hydrocarbons (QCLot: 2107970)							
ES1838498-001	DUP4	EP075: Acenaphthene	83-32-9	10 mg/kg	102	50	130
		EP075: Pyrene	129-00-0	10 mg/kg	90.2	50	130
EP075D: Nitrosamines (QCLot: 2107970)							
ES1838498-001	DUP4	EP075: N-Nitrosodi-n-propylamine	621-64-7	10 mg/kg	99.4	50	130
EP075E: Nitroaromatics and Ketones (QCLot: 2107970)							
ES1838498-001	DUP4	EP075: 2.4-Dinitrotoluene	121-14-2	10 mg/kg	104	40	130
EP075G: Chlorinated Hydrocarbons (QCLot: 2107970)							
ES1838498-001	DUP4	EP075: 1.4-Dichlorobenzene	106-46-7	10 mg/kg	97.8	60	130
		EP075: 1.2.4-Trichlorobenzene	120-82-1	10 mg/kg	102	50	130
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2107969)							
ES1838498-001	DUP4	EP071: C10 - C14 Fraction	----	523 mg/kg	101	73	137
		EP071: C15 - C28 Fraction	----	2319 mg/kg	110	53	131
		EP071: C29 - C36 Fraction	----	1714 mg/kg	118	52	132
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2109183)							
ES1838118-047	Anonymous	EP080: C6 - C9 Fraction	----	32.5 mg/kg	92.8	70	130
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2107969)							
ES1838498-001	DUP4	EP071: >C10 - C16 Fraction	----	860 mg/kg	110	73	137
		EP071: >C16 - C34 Fraction	----	3223 mg/kg	115	53	131
		EP071: >C34 - C40 Fraction	----	1058 mg/kg	117	52	132
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2109183)							
ES1838118-047	Anonymous	EP080: C6 - C10 Fraction	C6_C10	37.5 mg/kg	98.0	70	130
EP080: BTEXN (QCLot: 2109183)							

Sub-Matrix: **SOIL**

				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Recovery Limits (%)	
Laboratory sample ID	Client sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP080: BTEXN (QCLot: 2109183) - continued							
ES1838118-047	Anonymous	EP080: Benzene	71-43-2	2.5 mg/kg	95.3	70	130
		EP080: Toluene	108-88-3	2.5 mg/kg	98.9	70	130
		EP080: Ethylbenzene	100-41-4	2.5 mg/kg	102	70	130
		EP080: meta- & para-Xylene	108-38-3 106-42-3	2.5 mg/kg	100.0	70	130
		EP080: ortho-Xylene	95-47-6	2.5 mg/kg	105	70	130
		EP080: Naphthalene	91-20-3	2.5 mg/kg	99.0	70	130
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 2109256)							
ES1838193-001	Anonymous	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.00125 mg/kg	73.2	50	130
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.00125 mg/kg	93.6	50	130
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.00125 mg/kg	76.8	50	130
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.00125 mg/kg	75.6	50	130
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.00125 mg/kg	# Not Determined	50	130
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.00125 mg/kg	68.8	50	130
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 2109256)							
ES1838193-001	Anonymous	EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.00625 mg/kg	63.0	30	130
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.00125 mg/kg	121	50	130
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.00125 mg/kg	91.6	50	130
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.00125 mg/kg	97.6	50	130
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.00125 mg/kg	94.0	50	130
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.00125 mg/kg	90.8	50	130
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.00125 mg/kg	78.8	50	130
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.00125 mg/kg	95.6	50	130
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.00125 mg/kg	74.0	50	130
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.00125 mg/kg	86.8	30	130
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.00312 mg/kg	79.0	30	130
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 2109256)							
ES1838193-001	Anonymous	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.00125 mg/kg	75.2	50	130
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.00312 mg/kg	95.8	30	130
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.00312 mg/kg	95.2	30	130
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.00312 mg/kg	74.2	30	130
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.00312 mg/kg	75.6	30	130
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.00125 mg/kg	91.6	30	130

Sub-Matrix: **SOIL**

				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Recovery Limits (%)	
Laboratory sample ID	Client sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 2109256) - continued							
ES1838193-001	Anonymous	EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.00125 mg/kg	96.8	30	130
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 2109256)							
ES1838193-001	Anonymous	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.00125 mg/kg	99.6	50	130
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.00125 mg/kg	93.2	50	130
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.00125 mg/kg	86.8	50	130
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.00125 mg/kg	96.4	50	130

ALS Environmental

QA/QC Compliance Assessment to assist with Quality Review

Work Order	: **ES1838498**	Page	: 1 of 11
Client	: **ARCADIS AUSTRALIA PACIFIC PTY LTD**	Laboratory	: Environmental Division Sydney
Contact	: MR DEAN STAFFORD	Telephone	: +61 2 8784 8555
Project	: King St North ESA	Date Samples Received	: 19-Dec-2018
Site	: ----	Issue Date	: 03-Jan-2019
Sampler	: CAITLAIN REGENA	No. of samples received	: 22
Order number	: 10026439	No. of samples analysed	: 8

This report is automatically generated by the ALS LIMS through interpretation of the ALS Quality Control Report and several Quality Assurance parameters measured by ALS. This automated reporting highlights any non-conformances, facilitates faster and more accurate data validation and is designed to assist internal expert and external Auditor review. Many components of this report contribute to the overall DQO assessment and reporting for guideline compliance.

Brief method summaries and references are also provided to assist in traceability.

Summary of Outliers

Outliers : Quality Control Samples

This report highlights outliers flagged in the Quality Control (QC) Report.

- **NO Method Blank value outliers occur.**
- **NO Duplicate outliers occur.**
- **NO Laboratory Control outliers occur.**
- **Matrix Spike outliers exist - please see following pages for full details.**
- **For all regular sample matrices, NO surrogate recovery outliers occur.**

Outliers : Analysis Holding Time Compliance

- **NO Analysis Holding Time Outliers exist.**

Outliers : Frequency of Quality Control Samples

- **NO Quality Control Sample Frequency Outliers exist.**

Outliers : Quality Control Samples

Duplicates, Method Blanks, Laboratory Control Samples and Matrix Spikes

Matrix: **SOIL**

Compound Group Name	Laboratory Sample ID	Client Sample ID	Analyte	CAS Number	Data	Limits	Comment
Matrix Spike (MS) Recoveries							
EG005T: Total Metals by ICP-AES	ES1837035--001	Anonymous	**Arsenic**	7440-38-2	Not Determined	----	**MS recovery not determined, background level greater than or equal to 4x spike level.**
EP231A: Perfluoroalkyl Sulfonic Acids	ES1838193--001	Anonymous	**Perfluorooctane sulfonic acid (PFOS)**	1763-23-1	Not Determined	----	**MS recovery not determined, background level greater than or equal to 4x spike level.**

Analysis Holding Time Compliance

If samples are identified below as having been analysed or extracted outside of recommended holding times, this should be taken into consideration when interpreting results.

This report summarizes extraction / preparation and analysis times and compares each with ALS recommended holding times (referencing USEPA SW 846, APHA, AS and NEPM) based on the sample container provided. Dates reported represent first date of extraction or analysis and preclude subsequent dilutions and reruns. A listing of breaches (if any) is provided herein.

Holding time for leachate methods (e.g. TCLP) vary according to the analytes reported. Assessment compares the leach date with the shortest analyte holding time for the equivalent soil method. These are: organics 14 days, mercury 28 days & other metals 180 days. A recorded breach does not guarantee a breach for all non-volatile parameters.

Holding times for ***VOC in soils*** vary according to analytes of interest. Vinyl Chloride and Styrene holding time is 7 days; others 14 days. A recorded breach does not guarantee a breach for all VOC analytes and should be verified in case the reported breach is a false positive or Vinyl Chloride and Styrene are not key analytes of interest/concern.

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EA055: Moisture Content (Dried @ 105-110°C)							
Soil Glass Jar - Unpreserved (EA055)							
DUP4, MW05@1.00, MW05@3.00, MW07@1.00, MW03@1.00, MW04@0.50, MW04@3.00, DUP3	**19-Dec-2018**	**----**	----	----	**22-Dec-2018**	02-Jan-2019	✓
EA200: AS 4964 - 2004 Identification of Asbestos in Soils							
Snap Lock Bag: Separate bag received (EA200)							
MW05@1.00, MW07@1.00, MW03@1.00	**19-Dec-2018**	**----**	----	----	**21-Dec-2018**	17-Jun-2019	✓
Snap Lock Bag: Separate bag received (EA200)							
MW04@0.50	**19-Dec-2018**	**----**	----	----	**24-Dec-2018**	17-Jun-2019	✓
EA200N: Asbestos Quantification (non-NATA)							
Snap Lock Bag: Separate bag received (EA200N)							
MW05@1.00, MW07@1.00	**19-Dec-2018**	**----**	----	----	**21-Dec-2018**	17-Jun-2019	✓
EG005T: Total Metals by ICP-AES							
Soil Glass Jar - Unpreserved (EG005T)							
DUP4, MW05@1.00, MW05@3.00, MW07@1.00, MW03@1.00, MW04@0.50, MW04@3.00, DUP3	**19-Dec-2018**	**27-Dec-2018**	17-Jun-2019	✓	**27-Dec-2018**	17-Jun-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EG035T: Total Recoverable Mercury by FIMS							
Soil Glass Jar - Unpreserved (EG035T)							
DUP4, MW05@1.00, MW05@3.00, MW07@1.00, MW03@1.00, MW04@0.50, MW04@3.00, DUP3	**19-Dec-2018**	**27-Dec-2018**	16-Jan-2019	✓	**27-Dec-2018**	16-Jan-2019	✓
EP066: Polychlorinated Biphenyls (PCB)							
Soil Glass Jar - Unpreserved (EP066)							
DUP4, MW05@1.00, MW05@3.00, MW07@1.00, MW03@1.00, MW04@0.50, MW04@3.00, DUP3	**19-Dec-2018**	**22-Dec-2018**	02-Jan-2019	✓	**27-Dec-2018**	31-Jan-2019	✓
EP068A: Organochlorine Pesticides (OC)							
Soil Glass Jar - Unpreserved (EP068)							
DUP4, MW05@1.00, MW05@3.00, MW07@1.00, MW03@1.00, MW04@0.50, MW04@3.00, DUP3	**19-Dec-2018**	**22-Dec-2018**	02-Jan-2019	✓	**27-Dec-2018**	31-Jan-2019	✓
EP068B: Organophosphorus Pesticides (OP)							
Soil Glass Jar - Unpreserved (EP068)							
DUP4, MW05@1.00, MW05@3.00, MW07@1.00, MW03@1.00, MW04@0.50, MW04@3.00, DUP3	**19-Dec-2018**	**22-Dec-2018**	02-Jan-2019	✓	**27-Dec-2018**	31-Jan-2019	✓
EP074A: Monocyclic Aromatic Hydrocarbons							
Soil Glass Jar - Unpreserved (EP074)							
DUP4, MW05@1.00, MW05@3.00, MW07@1.00, MW03@1.00, MW04@0.50, MW04@3.00, DUP3	**19-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**22-Dec-2018**	26-Dec-2018	✓
EP074B: Oxygenated Compounds							
Soil Glass Jar - Unpreserved (EP074)							
DUP4, MW05@1.00, MW05@3.00, MW07@1.00, MW03@1.00, MW04@0.50, MW04@3.00, DUP3	**19-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**22-Dec-2018**	26-Dec-2018	✓
EP074C: Sulfonated Compounds							
Soil Glass Jar - Unpreserved (EP074)							
DUP4, MW05@1.00, MW05@3.00, MW07@1.00, MW03@1.00, MW04@0.50, MW04@3.00, DUP3	**19-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**22-Dec-2018**	26-Dec-2018	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP074D: Fumigants							
Soil Glass Jar - Unpreserved (EP074)							
DUP4, MW05@1.00, MW05@3.00, MW07@1.00, MW03@1.00, MW04@0.50, MW04@3.00, DUP3	**19-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**22-Dec-2018**	26-Dec-2018	✓
EP074E: Halogenated Aliphatic Compounds							
Soil Glass Jar - Unpreserved (EP074)							
DUP4, MW05@1.00, MW05@3.00, MW07@1.00, MW03@1.00, MW04@0.50, MW04@3.00, DUP3	**19-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**22-Dec-2018**	26-Dec-2018	✓
EP074F: Halogenated Aromatic Compounds							
Soil Glass Jar - Unpreserved (EP074)							
DUP4, MW05@1.00, MW05@3.00, MW07@1.00, MW03@1.00, MW04@0.50, MW04@3.00, DUP3	**19-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**22-Dec-2018**	26-Dec-2018	✓
EP074G: Trihalomethanes							
Soil Glass Jar - Unpreserved (EP074)							
DUP4, MW05@1.00, MW05@3.00, MW07@1.00, MW03@1.00, MW04@0.50, MW04@3.00, DUP3	**19-Dec-2018**	**21-Dec-2018**	26-Dec-2018	✓	**22-Dec-2018**	26-Dec-2018	✓
EP075A: Phenolic Compounds							
Soil Glass Jar - Unpreserved (EP075)							
DUP4, MW05@1.00, MW05@3.00, MW07@1.00, MW03@1.00, MW04@0.50, MW04@3.00, DUP3	**19-Dec-2018**	**22-Dec-2018**	02-Jan-2019	✓	**31-Dec-2018**	31-Jan-2019	✓
EP075B: Polynuclear Aromatic Hydrocarbons							
Soil Glass Jar - Unpreserved (EP075)							
DUP4, MW05@1.00, MW05@3.00, MW07@1.00, MW03@1.00, MW04@0.50, MW04@3.00, DUP3	**19-Dec-2018**	**22-Dec-2018**	02-Jan-2019	✓	**31-Dec-2018**	31-Jan-2019	✓
EP075C: Phthalate Esters							
Soil Glass Jar - Unpreserved (EP075)							
DUP4, MW05@1.00, MW05@3.00, MW07@1.00, MW03@1.00, MW04@0.50, MW04@3.00, DUP3	**19-Dec-2018**	**22-Dec-2018**	02-Jan-2019	✓	**31-Dec-2018**	31-Jan-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP075D: Nitrosamines							
Soil Glass Jar - Unpreserved (EP075)							
DUP4, MW05@1.00, MW05@3.00, MW07@1.00, MW03@1.00, MW04@0.50, MW04@3.00, DUP3	**19-Dec-2018**	**22-Dec-2018**	02-Jan-2019	✓	**31-Dec-2018**	31-Jan-2019	✓
EP075E: Nitroaromatics and Ketones							
Soil Glass Jar - Unpreserved (EP075)							
DUP4, MW05@1.00, MW05@3.00, MW07@1.00, MW03@1.00, MW04@0.50, MW04@3.00, DUP3	**19-Dec-2018**	**22-Dec-2018**	02-Jan-2019	✓	**31-Dec-2018**	31-Jan-2019	✓
EP075F: Haloethers							
Soil Glass Jar - Unpreserved (EP075)							
DUP4, MW05@1.00, MW05@3.00, MW07@1.00, MW03@1.00, MW04@0.50, MW04@3.00, DUP3	**19-Dec-2018**	**22-Dec-2018**	02-Jan-2019	✓	**31-Dec-2018**	31-Jan-2019	✓
EP075G: Chlorinated Hydrocarbons							
Soil Glass Jar - Unpreserved (EP075)							
DUP4, MW05@1.00, MW05@3.00, MW07@1.00, MW03@1.00, MW04@0.50, MW04@3.00, DUP3	**19-Dec-2018**	**22-Dec-2018**	02-Jan-2019	✓	**31-Dec-2018**	31-Jan-2019	✓
EP075H: Anilines and Benzidines							
Soil Glass Jar - Unpreserved (EP075)							
DUP4, MW05@1.00, MW05@3.00, MW07@1.00, MW03@1.00, MW04@0.50, MW04@3.00, DUP3	**19-Dec-2018**	**22-Dec-2018**	02-Jan-2019	✓	**31-Dec-2018**	31-Jan-2019	✓
EP075I: Organochlorine Pesticides							
Soil Glass Jar - Unpreserved (EP075)							
DUP4, MW05@1.00, MW05@3.00, MW07@1.00, MW03@1.00, MW04@0.50, MW04@3.00, DUP3	**19-Dec-2018**	**22-Dec-2018**	02-Jan-2019	✓	**31-Dec-2018**	31-Jan-2019	✓
EP075J: Organophosphorus Pesticides							
Soil Glass Jar - Unpreserved (EP075)							
DUP4, MW05@1.00, MW05@3.00, MW07@1.00, MW03@1.00, MW04@0.50, MW04@3.00, DUP3	**19-Dec-2018**	**22-Dec-2018**	02-Jan-2019	✓	**31-Dec-2018**	31-Jan-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)		Sample Date	Extraction / Preparation			Analysis		
			Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP080/071: Total Petroleum Hydrocarbons								
Soil Glass Jar - Unpreserved (EP080)								
DUP4,	MW05@1.00,	**19-Dec-2018**	**21-Dec-2018**	02-Jan-2019	✓	**22-Dec-2018**	02-Jan-2019	✓
MW05@3.00,	MW07@1.00,							
MW03@1.00,	MW04@0.50,							
MW04@3.00,	DUP3							
Soil Glass Jar - Unpreserved (EP071)								
DUP4,	MW05@1.00,	**19-Dec-2018**	**22-Dec-2018**	02-Jan-2019	✓	**27-Dec-2018**	31-Jan-2019	✓
MW05@3.00,	MW07@1.00,							
MW03@1.00,	MW04@0.50,							
MW04@3.00,	DUP3							
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions								
Soil Glass Jar - Unpreserved (EP080)								
DUP4,	MW05@1.00,	**19-Dec-2018**	**21-Dec-2018**	02-Jan-2019	✓	**22-Dec-2018**	02-Jan-2019	✓
MW05@3.00,	MW07@1.00,							
MW03@1.00,	MW04@0.50,							
MW04@3.00,	DUP3							
Soil Glass Jar - Unpreserved (EP071)								
DUP4,	MW05@1.00,	**19-Dec-2018**	**22-Dec-2018**	02-Jan-2019	✓	**27-Dec-2018**	31-Jan-2019	✓
MW05@3.00,	MW07@1.00,							
MW03@1.00,	MW04@0.50,							
MW04@3.00,	DUP3							
EP080: BTEXN								
Soil Glass Jar - Unpreserved (EP080)								
DUP4,	MW05@1.00,	**19-Dec-2018**	**21-Dec-2018**	02-Jan-2019	✓	**22-Dec-2018**	02-Jan-2019	✓
MW05@3.00,	MW07@1.00,							
MW03@1.00,	MW04@0.50,							
MW04@3.00,	DUP3							
EP231A: Perfluoroalkyl Sulfonic Acids								
HDPE Soil Jar (EP231X)								
MW07@1.00,	MW04@0.50	**19-Dec-2018**	**02-Jan-2019**	17-Jun-2019	✓	**02-Jan-2019**	11-Feb-2019	✓
EP231B: Perfluoroalkyl Carboxylic Acids								
HDPE Soil Jar (EP231X)								
MW07@1.00,	MW04@0.50	**19-Dec-2018**	**02-Jan-2019**	17-Jun-2019	✓	**02-Jan-2019**	11-Feb-2019	✓
EP231C: Perfluoroalkyl Sulfonamides								
HDPE Soil Jar (EP231X)								
MW07@1.00,	MW04@0.50	**19-Dec-2018**	**02-Jan-2019**	17-Jun-2019	✓	**02-Jan-2019**	11-Feb-2019	✓
EP231D: (n:2) Fluorotelomer Sulfonic Acids								
HDPE Soil Jar (EP231X)								
MW07@1.00,	MW04@0.50	**19-Dec-2018**	**02-Jan-2019**	17-Jun-2019	✓	**02-Jan-2019**	11-Feb-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP231P: PFAS Sums							
HDPE Soil Jar (EP231X)							
MW07@1.00, MW04@0.50	**19-Dec-2018**	**02-Jan-2019**	17-Jun-2019	✓	**02-Jan-2019**	11-Feb-2019	✓

Quality Control Parameter Frequency Compliance

The following report summarises the frequency of laboratory QC samples analysed within the analytical lot(s) in which the submitted sample(s) was(were) processed. Actual rate should be greater than or equal to the expected rate. A listing of breaches is provided in the Summary of Outliers.

Matrix: **SOIL**

Evaluation: × = Quality Control frequency not within specification ; ✓ = Quality Control frequency within specification.

Quality Control Sample Type		Count		Rate (%)			Quality Control Specification
Analytical Methods	*Method*	*QC*	*Regular*	***Actual***	***Expected***	*Evaluation*	
Laboratory Duplicates (DUP)							
Moisture Content	EA055	2	20	**10.00**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	1	6	**16.67**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Pesticides by GCMS	EP068	1	8	**12.50**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Polychlorinated Biphenyls (PCB)	EP066	1	8	**12.50**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Semivolatile Organic Compounds	EP075	1	8	**12.50**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Total Mercury by FIMS	EG035T	2	20	**10.00**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Total Metals by ICP-AES	EG005T	2	20	**10.00**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH - Semivolatile Fraction	EP071	1	8	**12.50**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH Volatiles/BTEX	EP080	2	20	**10.00**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Volatile Organic Compounds	EP074	2	20	**10.00**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Laboratory Control Samples (LCS)							
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	1	6	**16.67**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Pesticides by GCMS	EP068	1	8	**12.50**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Polychlorinated Biphenyls (PCB)	EP066	1	8	**12.50**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Semivolatile Organic Compounds	EP075	1	8	**12.50**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Total Mercury by FIMS	EG035T	1	20	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Total Metals by ICP-AES	EG005T	1	20	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH - Semivolatile Fraction	EP071	1	8	**12.50**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH Volatiles/BTEX	EP080	1	20	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Volatile Organic Compounds	EP074	1	20	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Method Blanks (MB)							
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	1	6	**16.67**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Pesticides by GCMS	EP068	1	8	**12.50**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Polychlorinated Biphenyls (PCB)	EP066	1	8	**12.50**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Semivolatile Organic Compounds	EP075	1	8	**12.50**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Total Mercury by FIMS	EG035T	1	20	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Total Metals by ICP-AES	EG005T	1	20	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH - Semivolatile Fraction	EP071	1	8	**12.50**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH Volatiles/BTEX	EP080	1	20	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Volatile Organic Compounds	EP074	1	20	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Matrix Spikes (MS)							
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	1	6	**16.67**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Pesticides by GCMS	EP068	1	8	**12.50**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Polychlorinated Biphenyls (PCB)	EP066	1	8	**12.50**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Semivolatile Organic Compounds	EP075	1	8	**12.50**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Total Mercury by FIMS	EG035T	1	20	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard

Matrix: **SOIL**

Evaluation: × = Quality Control frequency not within specification ; ✓ = Quality Control frequency within specification.

Quality Control Sample Type		Count		Rate (%)			Quality Control Specification
Analytical Methods	*Method*	*QC*	*Regular*	***Actual***	***Expected***	*Evaluation*	
Matrix Spikes (MS) - Continued							
Total Metals by ICP-AES	EG005T	1	20	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH - Semivolatile Fraction	EP071	1	8	**12.50**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH Volatiles/BTEX	EP080	1	20	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Volatile Organic Compounds	EP074	1	20	**5.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard

Brief Method Summaries

The analytical procedures used by the Environmental Division have been developed from established internationally recognized procedures such as those published by the US EPA, APHA, AS and NEPM. In house developed procedures are employed in the absence of documented standards or by client request. The following report provides brief descriptions of the analytical procedures employed for results reported in the Certificate of Analysis. Sources from which ALS methods have been developed are provided within the Method Descriptions.

Analytical Methods	Method	Matrix	Method Descriptions
Moisture Content	EA055	SOIL	In house: A gravimetric procedure based on weight loss over a 12 hour drying period at 105-110 degrees C. This method is compliant with NEPM (2013) Schedule B(3) Section 7.1 and Table 1 (14 day holding time).
Asbestos Identification in Soils	EA200	SOIL	AS 4964 - 2004 Method for the qualitative identification of asbestos in bulk samples Analysis by Polarised Light Microscopy including dispersion staining
Asbestos Classification and Quantitation per NEPM 2013	* EA200N	SOIL	Asbestos Classification and Quantitation per NEPM 2013 with Confirmation of Identification by AS 4964 - 2004 Gravimetric determination of Asbestos Containing Material, Fibrous Asbestos, Asbestos Fines and sample weight and calculation of percentage concentrations per NEPM protocols. Asbestos (Fines and Fibrous FA+AF) is reported as the equivalent weight in the sample received after accounting for sub-sampling (where applicable for the <7mm and/or <2mm fractions).
Total Metals by ICP-AES	EG005T	SOIL	In house: Referenced to APHA 3120; USEPA SW 846 - 6010. Metals are determined following an appropriate acid digestion of the soil. The ICPAES technique ionises samples in a plasma, emitting a characteristic spectrum based on metals present. Intensities at selected wavelengths are compared against those of matrix matched standards. This method is compliant with NEPM (2013) Schedule B(3)
Total Mercury by FIMS	EG035T	SOIL	In house: Referenced to AS 3550, APHA 3112 Hg - B (Flow-injection (SnCl2) (Cold Vapour generation) AAS) FIM-AAS is an automated flameless atomic absorption technique. Mercury in solids are determined following an appropriate acid digestion. Ionic mercury is reduced online to atomic mercury vapour by SnCl2 which is then purged into a heated quartz cell. Quantification is by comparing absorbance against a calibration curve. This method is compliant with NEPM (2013) Schedule B(3)
Polychlorinated Biphenyls (PCB)	EP066	SOIL	In house: Referenced to USEPA SW 846 - 8270D Extracts are analysed by Capillary GC/MS and quantification is by comparison against an established 5 point calibration curve. This method is compliant with NEPM (2013) Schedule B(3) (Method 504)
Pesticides by GCMS	EP068	SOIL	In house: Referenced to USEPA SW 846 - 8270D Extracts are analysed by Capillary GC/MS and quantification is by comparison against an established 5 point calibration curve. This technique is compliant with NEPM (2013) Schedule B(3) (Method 504,505)
TRH - Semivolatile Fraction	EP071	SOIL	In house: Referenced to USEPA SW 846 - 8015A Sample extracts are analysed by Capillary GC/FID and quantified against alkane standards over the range C10 - C40. Compliant with NEPM amended 2013.
Volatile Organic Compounds	EP074	SOIL	In house: Referenced to USEPA SW 846 - 8260B Extracts are analysed by Purge and Trap, Capillary GC/MS. Quantification is by comparison against an established 5 point calibration curve. This method is compliant with NEPM (2013) Schedule B(3) (Method 501)
Semivolatile Organic Compounds	EP075	SOIL	In house: Referenced to USEPA SW 846 - 8270D Extracts are analysed by Capillary GC/MS and quantification is by comparison against an established 5 point calibration curve. This technique is compliant with NEPM (2013) Schedule B(3) (Method 502)
TRH Volatiles/BTEX	EP080	SOIL	In house: Referenced to USEPA SW 846 - 8260B. Extracts are analysed by Purge and Trap, Capillary GC/MS. Quantification is by comparison against an established 5 point calibration curve. Compliant with NEPM amended 2013.

Analytical Methods	Method	Matrix	Method Descriptions
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	SOIL	In-House. A portion of soil is extracted with MTBE. The extract is taken to dryness, made up in mobile phase. Analysis is by LC/MSMS, ESI Negative Mode using MRM. Where commercially available, isotopically labelled analogues of the target analytes are used as internal standards for quantification. Where a labelled analogue is not commercially available, the internal standard with similar chemistry and the closest retention time to the target is used for quantification. The DQO for internal standard response is 50-150% of that established at initial calibration. PFOS is quantified using a certified, traceable standard consisting of linear and branched PFOS isomers. This method complies with the quality control definitions as stated in QSM 5.1. Data is reviewed in line with the DQOs as stated in QSM5.1

Preparation Methods	Method	Matrix	Method Descriptions
Hot Block Digest for metals in soils sediments and sludges	EN69	SOIL	In house: Referenced to USEPA 200.2. Hot Block Acid Digestion 1.0g of sample is heated with Nitric and Hydrochloric acids, then cooled. Peroxide is added and samples heated and cooled again before being filtered and bulked to volume for analysis. Digest is appropriate for determination of selected metals in sludge, sediments, and soils. This method is compliant with NEPM (2013) Schedule B(3) (Method 202)
Sample Extraction for PFAS	EP231-PR	SOIL	In house
Methanolic Extraction of Soils for Purge and Trap	ORG16	SOIL	In house: Referenced to USEPA SW 846 - 5030A. 5g of solid is shaken with surrogate and 10mL methanol prior to analysis by Purge and Trap - GC/MS.
Tumbler Extraction of Solids	ORG17	SOIL	In house: Mechanical agitation (tumbler). 10g of sample, Na2SO4 and surrogate are extracted with 30mL 1:1 DCM/Acetone by end over end tumble. The solvent is decanted, dehydrated and concentrated (by KD) to the desired volume for analysis.

CHAIN OF CUSTODY

ALS Environmental

ALS Laboratory: please tick →

☐ADELAIDE 21 Burma Road Pooraka SA 5095 Ph: 08 8359 0890 E: adelaide@alsglobal.com

☐BRISBANE 32 Shand Street Stafford QLD 4053 Ph: 07 3243 7222 E: samples.brisbane@alsglobal.com

☐GLADSTONE 46 Callemondah Drive Clinton QLD 4680 Ph: 07 7471 5600 E: gladstone@alsglobal.com

☐MACKAY 78 Harbour Road Mackay QLD 4740 Ph: 07 4944 0177 E: mackay@alsglobal.com

☐MELBOURNE 2-4 Westall Road Springvale VIC 3171 Ph: 03 8549 9600 E: samples.melbourne@alsglobal.com

☐MUDGEE 27 Sydney Road Mudgee NSW 2850 Ph: 02 63 72 6735 E: mudgee.mail@alsglobal.com

☐NEWCASTLE 6/585 Maitland Rd Mayfield West NSW 2304 Ph: 02 4014 2500 E: samples.newcastle@alsglobal.com

☐NOWRA 4/13 Geary Place North Nowra NSW 2541 Ph: 024423 2063 E: nowra@alsglobal.com

☐PERTH 10 Hod Way Malaga WA 6090 Ph: 08 9209 7655 E: samples.perth@alsglobal.com

☐SYDNEY 277-289 Woodpark Road Smithfield NSW 2164 Ph: 02 8784 8555 E: samples.sydney@alsglobal.com

☐TOWNSVILLE 14-15 Desma Court Bohle QLD 4818 Ph: 07 4796 0600 E: townsville.environmental@alsglobal.com

☐WOLLONGONG 99 Kenny Street Wollongong NSW 2500 Ph: 02 4225 3125 E: portkembla@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	**TURNAROUND REQUIREMENTS :** (Standard TAT may be longer for some tests e.g.. Ultra Trace Organics)	☒ Standard TAT (List due date):
OFFICE: [illegible]		☐ Non Standard or urgent TAT (List due date):
PROJECT: King St North ESA	**ALS QUOTE NO.:**	
ORDER NUMBER: 10026439		
PROJECT MANAGER: Dean Stafford	**CONTACT PH:** 0434 657 155	
SAMPLER: Caitlain Regena	**SAMPLER MOBILE:** 0438 263 112	
COC emailed to ALS? (NO)	**EDD FORMAT (or default):**	
Email Reports to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com		
Email Invoice to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com		

COC SEQUENCE NUMBER (Circle)

COC: 1 2 3 4 5 6 7

OF: 1 2 3 4 5 6 7

FOR LABORATORY USE ONLY (Circle)

Custody Seal Intact? Yes No N/A

Cooler Box / frozen ice bricks present upon receipt? Yes No N/A

Random Sample Temperature on Receipt: 5.2 °C

Other comments:

RELINQUISHED BY:	RECEIVED BY:	RELINQUISHED BY:	RECEIVED BY:
Caitlain Regena	JUSTIN		
DATE/TIME: 19/12/18	DATE/TIME: 19/12 5.45pm	DATE/TIME:	DATE/TIME:

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)			CONTAINER INFORMATION		ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).								Additional Information
LAB ID	SAMPLE ID	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	TOTAL CONTAINERS	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Analytes)				Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
1	DUP4	19-12-18	S		1	x	x	x						
–	TRIP4	19-12-18	S		1	x	x	x						Please send to Envirolab.
2	MW05@1.00	19-12-18	S		1	x	x	x	x					
3	MW05@2.00	19-12-18	S		1									
4	MW05@3.00	19-12-18	S		2	x	x	x						
5	MW05@5.00	19-12-18	S		1									
6	MW07@0.20	19-12-18	S		1									
7	MW07@1.00	19-12-18	S		2	x	x	x	x	x				
8	MW07@3.00	19-12-18	S		1									
9	MW07@4.50	19-12-18	S		1									
10	MW07@6.00	19-12-18	S		1									
		19-12-18	S		1									
				TOTAL	14									

Environmental Division Sydney

Work Order Reference

ES1838498

Telephone : + 61-2-8784 8555

Subcon / Forward Lab / Split WO

Lab / Analysis: Envirolab → TRIP4

Organised By / Date: Asbestos →

Relinquished By / Date: Newcastle

Connote / Courier: _____

WO No: _____

Attach By PO / Internal Sheets

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; [illegible] Preserved Plastic; [illegible] Preserved Glass;
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

CHAIN OF CUSTODY

ALS Laboratory: please tick →

☐ADELAIDE 21 Burma Road Pooraka SA 5095 Ph: 08 8359 0890 E: adelaide@alsglobal.com
☐BRISBANE 32 Shand Street Stafford QLD 4053 Ph: 07 3243 7222 E: samples.brisbane@alsglobal.com
☐GLADSTONE 46 Callemondah Drive Clinton QLD 4680 Ph: 07 7471 5600 E: gladstone@alsglobal.com
☐MACKAY 78 Harbour Road Mackay QLD 4740 Ph: 07 4944 0177 E: mackay@alsglobal.com
☐MELBOURNE 2-4 Westall Road Springvale VIC 3171 Ph: 03 8549 9600 E: samples.melbourne@alsglobal.com
☐MUDGEE 27 Sydney Road Mudgee NSW 2850 Ph: 02 6372 6735 E: mudgee.mail@alsglobal.com
☐NEWCASTLE 5/585 Maitland Rd Mayfield West NSW 2304 Ph: 02 4014 2500 E: samples.newcastle@alsglobal.com
☐NOWRA 4/13 Geary Place North Nowra NSW 2541 Ph: 024423 2063 E: nowra@alsglobal.com
☐PERTH 10 Hod Way Malaga WA 6090 Ph: 08 9209 7655 E: samples.perth@alsglobal.com
☐SYDNEY 277-289 Woodpark Rd Smithfield NSW 2164 Ph: 02 8784 8555 E: samples.sydney@alsglobal.com
☐TOWNSVILLE 14-15 Desma Court Bohle QLD 4818 Ph: 07 4796 0600 E: townsville.environmental@alsglobal.com
☐WOLLONGONG 99 Kenny Street Wollongong NSW 2500 Ph: 02 4225 3125 E: portkembla@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	**TURNAROUND REQUIREMENTS :** (Standard TAT may be longer for some tests e.g., Ultra Trace Organics)	☒ Standard TAT (List due date):	**FOR LABORATORY USE ONLY (Circle)**
OFFICE: Level 15, 141 George Street Sydney NSW 2000		☐ Non Standard or urgent TAT (List due date):	Custody Seal Intact? Yes No N/A
PROJECT: King St North ESA	**ALS QUOTE NO.:**	**COC SEQUENCE NUMBER (Circle)**	Free ice / frozen ice bricks present upon receipt? Yes No N/A
ORDER NUMBER: 10026439		COC: 1 2 3 4 5 6 7	Random Sample Temperature on Receipt: 2 °C
PROJECT MANAGER: Dean Stafford	**CONTACT PH:** 0434 657 155	OF: 1 2 3 4 5 6 7	Other comments:
SAMPLER: Caitlain Regena	**SAMPLER MOBILE:** 0438 263 112		
COC emailed to ALS? (NO)	**EDD FORMAT (or default):**		
Email Reports to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com			
Email Invoice to: Dean.Stafford@arcadis.com; Caitlain.Regena@arcadis.com			

RELINQUISHED BY:	RECEIVED BY:	RELINQUISHED BY:	RECEIVED BY:
Caitlain Regena	JUSTIN		
DATE/TIME: 17/12/18	DATE/TIME: 19/12 5.45pm	DATE/TIME:	DATE/TIME:

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)			CONTAINER INFORMATION		ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).								Additional Information
LAB ID	SAMPLE ID	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	TOTAL CONTAINERS	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Analytes)				Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
11	MW03@0.50	19-12-18	S		1									
12	MW03@1.00	19-12-18	S		1	x	x	x	x					
13	MW03@2.00	19-12-18	S		1									
14	MW03@4.00	19-12-18	S		1									
15	MW03@5.00	19-12-18	S		1									
16	MW04@0.50	19-12-18	S		2	x	x	x	x	x				
17	MW04@1.50	19-12-18	S		1									
18	MW04@3.00	19-12-18	S		1	x	x	x						
19	MW04@5.00	19-12-18	S		1									
20	MW05@0.50	18-12-18	S		1									
21	DUP3	19-12-18	S		1	x	x	x	x					
-	TRIP3	19-12-18	S		1	x	x	x	x					Please send to Envirolab.
				TOTAL	13									

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass; Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

ALS Environmental

CERTIFICATE OF ANALYSIS

Work Order	: **ES1904527**	Page	: 1 of 87
Client	: **ARCADIS AUSTRALIA PACIFIC PTY LTD**	Laboratory	: Environmental Division Sydney
Contact	: CAITLAIN REGENA	Contact	: Loren Schiavon
Address	: L16, 480 GEORGE STREET SYDNEY NSW 2000	Address	: 277-289 Woodpark Road Smithfield NSW Australia 2164
Telephone	: +61 02 8907 9000	Telephone	: +61 2 8784 8555
Project	: 10026439 - task 6	Date Samples Received	: 13-Feb-2019 14:55
Order number	: 10026439- TASK 6	Date Analysis Commenced	: 13-Feb-2019
C-O-C number	: ----	Issue Date	: 18-Feb-2019 17:07
Sampler	: TOM KEATLEY		
Site	: ----		
Quote number	: ----		
No. of samples received	: 101		
No. of samples analysed	: 44		

Accreditation No. 825
Accredited for compliance with
ISO/IEC 17025 - Testing

This report supersedes any previous report(s) with this reference. Results apply to the sample(s) as submitted. This document shall not be reproduced, except in full.

This Certificate of Analysis contains the following information:

- General Comments
- Analytical Results
- Descriptive Results
- Surrogate Control Limits

Additional information pertinent to this report will be found in the following separate attachments: Quality Control Report, QA/QC Compliance Assessment to assist with Quality Review and Sample Receipt Notification.

Signatories

This document has been electronically signed by the authorized signatories below. Electronic signing is carried out in compliance with procedures specified in 21 CFR Part 11.

Signatories	*Position*	*Accreditation Category*
Alana Smylie	Asbestos Identifier	Newcastle - Asbestos, Mayfield West, NSW
Alex Rossi	Organic Chemist	Sydney Organics, Smithfield, NSW
Edwandy Fadjar	Organic Coordinator	Sydney Organics, Smithfield, NSW
Ivan Taylor	Analyst	Sydney Inorganics, Smithfield, NSW
Sanjeshni Jyoti	Senior Chemist Volatiles	Sydney Organics, Smithfield, NSW

General Comments

The analytical procedures used by the Environmental Division have been developed from established internationally recognized procedures such as those published by the USEPA, APHA, AS and NEPM. In house developed procedures are employed in the absence of documented standards or by client request.

Where moisture determination has been performed, results are reported on a dry weight basis.

Where a reported less than (<) result is higher than the LOR, this may be due to primary sample extract/digestate dilution and/or insufficient sample for analysis.

Where the LOR of a reported result differs from standard LOR, this may be due to high moisture content, insufficient sample (reduced weight employed) or matrix interference.

When sampling time information is not provided by the client, sampling dates are shown without a time component. In these instances, the time component has been assumed by the laboratory for processing purposes.

Where a result is required to meet compliance limits the associated uncertainty must be considered. Refer to the ALS Contact for details.

Key : CAS Number = CAS registry number from database maintained by Chemical Abstracts Services. The Chemical Abstracts Service is a division of the American Chemical Society.
LOR = Limit of reporting
^ = This result is computed from individual analyte detections at or above the level of reporting
ø = ALS is not NATA accredited for these tests.
~ = Indicates an estimated value.

- EA200: Asbestos Identification Samples were analysed by Polarised Light Microscopy including dispersion staining.
- EA200 Legend
- EA200 'Am' Amosite (brown asbestos)
- EA200 'Ch' Chrysotile (white asbestos)
- EA200 'Cr' Crocidolite (blue asbestos)
- EA200: 'UMF' Unknown Mineral Fibres. "-" indicates fibres detected may or may not be asbestos fibres. Confirmation by alternative techniques is recommended.
- EA200: Negative results for vinyl tiles should be confirmed by an independent analytical technique.
- EP080/074: Results for DUP2@2.2 confirmed by re-analysis.
- EP071: Results of samples DUP@2.7 and DUP2@2.2 have been confirmed by re-extraction and re-analysis.
- EP066 : Positive PCB results are confirmed by re-extraction and re-analysis.
- EP080: The trip spike and its control have been analysed for volatile TPH and BTEX only. The trip spike and control were prepared in the lab using reagent grade sand spiked with petrol. The spike was dispatched from the lab and the control retained.
- EP075: Particular samples required dilution prior to extraction due to matrix interferences. LOR values have been adjusted accordingly.
- EP068: Particular samples required dilution due to matrix interferences. LOR values have been adjusted accordingly.
- EP066 : Particular samples required dilution due to sample matrix . LOR values have been adjusted accordingly.
- EP075: 'Sum of PAH' is the sum of the USEPA 16 priority PAHs
- EA200N: Asbestos weights and percentages are not covered under the Scope of NATA Accreditation.
  Weights of Asbestos are based on extracted bulk asbestos, fibre bundles, and/or ACM and do not include respirable fibres (if present)
  The Asbestos (Fines and Fibrous) weight is calculated from the extracted Fibrous Asbestos and Asbestos Fines as an equivalent weight of 100% Asbestos
  Percentages for Asbestos content in ACM are based on the 2013 NEPM default values.
  All calculations of percentage Asbestos under this method are approximate and should be used as a guide only.
- EA200 'Trace' - Asbestos fibres ("Free Fibres") detected by trace analysis per AS4964. The result can be interpreted that the sample contains detectable 'respirable' asbestos fibres
- EA200N: ALS laboratory procedures and methods used for the identification and quantitation of asbestos are consistent with AS4964-2004 and the requirements of the 2013 NEPM for Assessment of Site Contamination

- Benzo(a)pyrene Toxicity Equivalent Quotient (TEQ) is the sum total of the concentration of the eight carcinogenic PAHs multiplied by their Toxicity Equivalence Factor (TEF) relative to Benzo(a)pyrene. TEF values are provided in brackets as follows: Benz(a)anthracene (0.1), Chrysene (0.01), Benzo(b+j) & Benzo(k)fluoranthene (0.1), Benzo(a)pyrene (1.0), Indeno(1.2.3.cd)pyrene (0.1), Dibenz(a.h)anthracene (1.0), Benzo(g.h.i)perylene (0.01). Less than LOR results for 'TEQ Zero' are treated as zero, for 'TEQ 1/2LOR' are treated as half the reported LOR, and for 'TEQ LOR' are treated as being equal to the reported LOR. Note: TEQ 1/2LOR and TEQ LOR will calculate as 0.6mg/Kg and 1.2mg/Kg respectively for samples with non-detects for all of the eight TEQ PAHs.
- EA200: For samples larger than 30g, the <2mm fraction may be sub-sampled prior to trace analysis as outlined in ISO23909:2008(E) Sect 6.3.2-2
- EA200: 'Yes' - Asbestos detected by polarised light microscopy including dispersion staining.
- EA200: 'No*' - No asbestos found, at the reporting limit of 0.1g/kg, by polarised light microscopy including dispersion staining. Asbestos material was detected and positively identified at concentrations estimated to be below 0.1g/kg.
- EA200: 'No' - No asbestos found at the reporting limit 0.1g/kg, by polarised light microscopy including dispersion staining.

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH29@0.4	BH30@0.8	BH30@2.7	BH31@0.2	BH31@2.3
			Client sampling date / time	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00
Compound	CAS Number	LOR	Unit	ES1904527-001	ES1904527-006	ES1904527-009	ES1904527-010	ES1904527-014
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	----	1.0	%	7.8	9.5	17.5	8.3	9.6
EA200: AS 4964 - 2004 Identification of Asbestos in Soils								
Asbestos Detected	1332-21-4	0.1	g/kg	No	No	----	No	----
Asbestos (Trace)	1332-21-4	5	Fibres	No	No	----	No	----
Asbestos Type	1332-21-4	-	--	-	-	----	-	----
Sample weight (dry)	----	0.01	g	39.8	113	----	44.8	----
APPROVED IDENTIFIER:	----	-	--	A. SMYLIE	A. SMYLIE	----	A. SMYLIE	----
EA200N: Asbestos Quantification (non-NATA)								
ø Asbestos (Fines and Fibrous <7mm)	1332-21-4	0.0004	g	<0.0004	<0.0004	----	<0.0004	----
ø Asbestos (Fines and Fibrous FA+AF)	----	0.001	% (w/w)	<0.001	<0.001	----	<0.001	----
ø Asbestos Containing Material	1332-21-4	0.1	g	<0.1	<0.1	----	<0.1	----
ø Asbestos Containing Material (as 15% Asbestos in ACM >7mm)	1332-21-4	0.01	% (w/w)	<0.01	<0.01	----	<0.01	----
ø Weight Used for % Calculation	----	0.0001	kg	0.0398	0.113	----	0.0448	----
ø Fibrous Asbestos >7mm	----	0.0004	g	<0.0004	<0.0004	----	<0.0004	----
EG005T: Total Metals by ICP-AES								
Arsenic	7440-38-2	5	mg/kg	<5	<5	<5	<5	5
Cadmium	7440-43-9	1	mg/kg	<1	<1	<1	<1	<1
Chromium	7440-47-3	2	mg/kg	12	6	<2	<2	<2
Copper	7440-50-8	5	mg/kg	129	8	11	<5	<5
Lead	7439-92-1	5	mg/kg	68	52	142	7	<5
Nickel	7440-02-0	2	mg/kg	13	3	17	<2	<2
Zinc	7440-66-6	5	mg/kg	110	80	769	74	<5
EG035T: Total Recoverable Mercury by FIMS								
Mercury	7439-97-6	0.1	mg/kg	0.1	<0.1	<0.1	<0.1	<0.1
EP066: Polychlorinated Biphenyls (PCB)								
Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
EP068A: Organochlorine Pesticides (OC)								
alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
delta-BHC	319-86-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH29@0.4	BH30@0.8	BH30@2.7	BH31@0.2	BH31@2.3
				Client sampling date / time	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-001	ES1904527-006	ES1904527-009	ES1904527-010	ES1904527-014
					Result	Result	Result	Result	Result
EP068A: Organochlorine Pesticides (OC) - Continued									
Heptachlor	76-44-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Aldrin	309-00-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Heptachlor epoxide	1024-57-3	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
^ Total Chlordane (sum)	----	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
trans-Chlordane	5103-74-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
alpha-Endosulfan	959-98-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
cis-Chlordane	5103-71-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Dieldrin	60-57-1	0.05	mg/kg		**0.39**	<0.05	<0.05	<0.05	<0.05
4.4`-DDE	72-55-9	0.05	mg/kg		**0.19**	<0.05	<0.05	<0.05	<0.05
Endrin	72-20-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
beta-Endosulfan	33213-65-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
^ Endosulfan (sum)	115-29-7	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
4.4`-DDD	72-54-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Endrin aldehyde	7421-93-4	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Endosulfan sulfate	1031-07-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
4.4`-DDT	50-29-3	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Endrin ketone	53494-70-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Methoxychlor	72-43-5	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
^ Sum of Aldrin + Dieldrin	309-00-2/60-57-1	0.05	mg/kg		**0.39**	<0.05	<0.05	<0.05	<0.05
^ Sum of DDD + DDE + DDT	72-54-8/72-55-9/50-29-2	0.05	mg/kg		**0.19**	<0.05	<0.05	<0.05	<0.05
EP068B: Organophosphorus Pesticides (OP)									
Dichlorvos	62-73-7	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Demeton-S-methyl	919-86-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Monocrotophos	6923-22-4	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Dimethoate	60-51-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Diazinon	333-41-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Parathion-methyl	298-00-0	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Malathion	121-75-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Fenthion	55-38-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Chlorpyrifos	2921-88-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Parathion	56-38-2	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Pirimphos-ethyl	23505-41-1	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Chlorfenvinphos	470-90-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH29@0.4	BH30@0.8	BH30@2.7	BH31@0.2	BH31@2.3
				Client sampling date / time	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-001	ES1904527-006	ES1904527-009	ES1904527-010	ES1904527-014
					Result	Result	Result	Result	Result
EP068B: Organophosphorus Pesticides (OP) - Continued									
Bromophos-ethyl	4824-78-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Fenamiphos	22224-92-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Prothiofos	34643-46-4	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Ethion	563-12-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Carbophenothion	786-19-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Azinphos Methyl	86-50-0	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
EP074A: Monocyclic Aromatic Hydrocarbons									
Styrene	100-42-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Isopropylbenzene	98-82-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
n-Propylbenzene	103-65-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
sec-Butylbenzene	135-98-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
tert-Butylbenzene	98-06-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
p-Isopropyltoluene	99-87-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
n-Butylbenzene	104-51-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074B: Oxygenated Compounds									
Vinyl Acetate	108-05-4	5	mg/kg		<5	<5	<5	<5	<5
2-Butanone (MEK)	78-93-3	5	mg/kg		<5	<5	<5	<5	<5
4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg		<5	<5	<5	<5	<5
2-Hexanone (MBK)	591-78-6	5	mg/kg		<5	<5	<5	<5	<5
EP074C: Sulfonated Compounds									
Carbon disulfide	75-15-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074D: Fumigants									
2.2-Dichloropropane	594-20-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichloropropane	78-87-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074E: Halogenated Aliphatic Compounds									
Dichlorodifluoromethane	75-71-8	5	mg/kg		<5	<5	<5	<5	<5
Chloromethane	74-87-3	5	mg/kg		<5	<5	<5	<5	<5
Vinyl chloride	75-01-4	5	mg/kg		<5	<5	<5	<5	<5
Bromomethane	74-83-9	5	mg/kg		<5	<5	<5	<5	<5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH29@0.4	BH30@0.8	BH30@2.7	BH31@0.2	BH31@2.3
				Client sampling date / time	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-001	ES1904527-006	ES1904527-009	ES1904527-010	ES1904527-014
					Result	Result	Result	Result	Result
EP074E: Halogenated Aliphatic Compounds - Continued									
Chloroethane	75-00-3	5	mg/kg		<5	<5	<5	<5	<5
Trichlorofluoromethane	75-69-4	5	mg/kg		<5	<5	<5	<5	<5
1.1-Dichloroethene	75-35-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Iodomethane	74-88-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1-Dichloroethane	75-34-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.1-Trichloroethane	71-55-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1-Dichloropropylene	563-58-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Carbon Tetrachloride	56-23-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichloroethane	107-06-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Trichloroethene	79-01-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dibromomethane	74-95-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.2-Trichloroethane	79-00-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.3-Dichloropropane	142-28-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Tetrachloroethene	127-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.3-Trichloropropane	96-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pentachloroethane	76-01-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074F: Halogenated Aromatic Compounds									
Chlorobenzene	108-90-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bromobenzene	108-86-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Chlorotoluene	95-49-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chlorotoluene	106-43-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074G: Trihalomethanes									
Chloroform	67-66-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bromodichloromethane	75-27-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dibromochloromethane	124-48-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bromoform	75-25-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH29@0.4	BH30@0.8	BH30@2.7	BH31@0.2	BH31@2.3
			Client sampling date / time	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00
Compound	CAS Number	LOR	Unit	ES1904527-001	ES1904527-006	ES1904527-009	ES1904527-010	ES1904527-014
				Result	Result	Result	Result	Result
EP075A: Phenolic Compounds								
Phenol	108-95-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2-Chlorophenol	95-57-8	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2-Methylphenol	95-48-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
3- & 4-Methylphenol	1319-77-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2-Nitrophenol	88-75-5	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.4-Dimethylphenol	105-67-9	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.4-Dichlorophenol	120-83-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.6-Dichlorophenol	87-65-0	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Pentachlorophenol	87-86-5	1	mg/kg	<1	<1	<1	<1	<1
EP075B: Polynuclear Aromatic Hydrocarbons								
Naphthalene	91-20-3	0.5	mg/kg	**1.8**	<0.5	<0.5	<0.5	<0.5
2-Methylnaphthalene	91-57-6	0.5	mg/kg	**1.7**	<0.5	<0.5	<0.5	<0.5
2-Chloronaphthalene	91-58-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Acenaphthylene	208-96-8	0.5	mg/kg	**1.9**	<0.5	<0.5	<0.5	<0.5
Acenaphthene	83-32-9	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Fluorene	86-73-7	0.5	mg/kg	**2.8**	<0.5	<0.5	<0.5	<0.5
Phenanthrene	85-01-8	0.5	mg/kg	**14.0**	<0.5	<0.5	<0.5	<0.5
Anthracene	120-12-7	0.5	mg/kg	**3.3**	<0.5	<0.5	<0.5	<0.5
Fluoranthene	206-44-0	0.5	mg/kg	**14.7**	<0.5	<0.5	<0.5	<0.5
Pyrene	129-00-0	0.5	mg/kg	**14.2**	<0.5	<0.5	<0.5	<0.5
N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Benz(a)anthracene	56-55-3	0.5	mg/kg	**7.3**	<0.5	<0.5	<0.5	<0.5
Chrysene	218-01-9	0.5	mg/kg	**5.5**	<0.5	<0.5	<0.5	<0.5
Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg	**8**	<1	<1	<1	<1
7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Benzo(a)pyrene	50-32-8	0.5	mg/kg	**5.7**	<0.5	<0.5	<0.5	<0.5
3-Methylcholanthrene	56-49-5	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg	**2.0**	<0.5	<0.5	<0.5	<0.5
Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg	**0.6**	<0.5	<0.5	<0.5	<0.5
Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg	**2.3**	<0.5	<0.5	<0.5	<0.5
^ Sum of PAHs	----	0.5	mg/kg	**84.1**	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH29@0.4	BH30@0.8	BH30@2.7	BH31@0.2	BH31@2.3
				Client sampling date / time	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-001	ES1904527-006	ES1904527-009	ES1904527-010	ES1904527-014
					Result	Result	Result	Result	Result
EP075B: Polynuclear Aromatic Hydrocarbons - Continued									
^ **Benzo(a)pyrene TEQ (zero)**	----	0.5	mg/kg		**8.1**	<0.5	<0.5	<0.5	<0.5
^ **Benzo(a)pyrene TEQ (half LOR)**	----	0.5	mg/kg		**8.1**	**0.6**	**0.6**	**0.6**	**0.6**
^ **Benzo(a)pyrene TEQ (LOR)**	----	0.5	mg/kg		**8.1**	**1.2**	**1.2**	**1.2**	**1.2**
EP075C: Phthalate Esters									
Dimethyl phthalate	131-11-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Diethyl phthalate	84-66-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Di-n-butyl phthalate	84-74-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Butyl benzyl phthalate	85-68-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
bis(2-ethylhexyl) phthalate	117-81-7	5.0	mg/kg		<5.0	<5.0	<5.0	<5.0	<5.0
Di-n-octylphthalate	117-84-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075D: Nitrosamines									
N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodiethylamine	55-18-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosopyrrolidine	930-55-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
N-Nitrosomorpholine	59-89-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosopiperidine	100-75-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodibutylamine	924-16-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
Methapyrilene	91-80-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075E: Nitroaromatics and Ketones									
2-Picoline	109-06-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Acetophenone	98-86-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Nitrobenzene	98-95-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Isophorone	78-59-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2.6-Dinitrotoluene	606-20-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
2.4-Dinitrotoluene	121-14-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
1-Naphthylamine	134-32-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
5-Nitro-o-toluidine	99-55-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Azobenzene	103-33-3	1	mg/kg		<1	<1	<1	<1	<1
1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Phenacetin	62-44-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH29@0.4	BH30@0.8	BH30@2.7	BH31@0.2	BH31@2.3
				Client sampling date / time	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-001	ES1904527-006	ES1904527-009	ES1904527-010	ES1904527-014
					Result	Result	Result	Result	Result
EP075E: Nitroaromatics and Ketones - Continued									
4-Aminobiphenyl	92-67-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pentachloronitrobenzene	82-68-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pronamide	23950-58-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dimethylaminoazobenzene	60-11-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Chlorobenzilate	510-15-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075F: Haloethers									
Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075G: Chlorinated Hydrocarbons									
1.3-Dichlorobenzene	541-73-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.4-Dichlorobenzene	106-46-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichlorobenzene	95-50-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachloroethane	67-72-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachloropropylene	1888-71-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorobutadiene	87-68-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg		<2.5	<2.5	<2.5	<2.5	<2.5
Pentachlorobenzene	608-93-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Hexachlorobenzene (HCB)	118-74-1	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
EP075H: Anilines and Benzidines									
Aniline	62-53-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chloroaniline	106-47-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Nitroaniline	88-74-4	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
3-Nitroaniline	99-09-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	<1.0
Dibenzofuran	132-64-9	0.5	mg/kg		**1.7**	<0.5	<0.5	<0.5	<0.5
4-Nitroaniline	100-01-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Carbazole	86-74-8	0.5	mg/kg		**2.0**	<0.5	<0.5	<0.5	<0.5
3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP080/071: Total Petroleum Hydrocarbons									
C6 - C9 Fraction	----	10	mg/kg		<10	<10	<10	<10	<10
C10 - C14 Fraction	----	50	mg/kg		<50	<50	<50	<50	<50
C15 - C28 Fraction	----	100	mg/kg		**280**	<100	<100	<100	<100

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH29@0.4	BH30@0.8	BH30@2.7	BH31@0.2	BH31@2.3
				Client sampling date / time	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-001	ES1904527-006	ES1904527-009	ES1904527-010	ES1904527-014
					Result	Result	Result	Result	Result
EP080/071: Total Petroleum Hydrocarbons - Continued									
C29 - C36 Fraction	----	100	mg/kg		**140**	<100	<100	<100	<100
^ C10 - C36 Fraction (sum)	----	50	mg/kg		**420**	<50	<50	<50	<50
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions									
C6 - C10 Fraction	C6_C10	10	mg/kg		<10	<10	<10	<10	<10
^ C6 - C10 Fraction minus BTEX (F1)	C6_C10-BTEX	10	mg/kg		<10	<10	<10	<10	<10
>C10 - C16 Fraction	----	50	mg/kg		<50	<50	<50	<50	<50
>C16 - C34 Fraction	----	100	mg/kg		**370**	<100	<100	<100	<100
>C34 - C40 Fraction	----	100	mg/kg		<100	<100	<100	<100	<100
^ >C10 - C40 Fraction (sum)	----	50	mg/kg		**370**	<50	<50	<50	<50
^ >C10 - C16 Fraction minus Naphthalene (F2)	----	50	mg/kg		<50	<50	<50	<50	<50
EP080: BTEXN									
Benzene	71-43-2	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Toluene	108-88-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Ethylbenzene	100-41-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
ortho-Xylene	95-47-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
^ Sum of BTEX	----	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
^ Total Xylenes	----	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Naphthalene	91-20-3	1	mg/kg		**2**	<1	<1	<1	<1
EP066S: PCB Surrogate									
Decachlorobiphenyl	2051-24-3	0.1	%		**101**	**87.1**	**72.5**	**83.8**	**73.9**
EP068S: Organochlorine Pesticide Surrogate									
Dibromo-DDE	21655-73-2	0.05	%		**89.4**	**110**	**88.4**	**108**	**91.0**
EP068T: Organophosphorus Pesticide Surrogate									
DEF	78-48-8	0.05	%		**76.0**	**72.8**	**76.2**	**121**	**94.9**
EP074S: VOC Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.5	%		**93.0**	**108**	**94.4**	**91.3**	**88.1**
Toluene-D8	2037-26-5	0.5	%		**112**	**120**	**109**	**103**	**97.3**
4-Bromofluorobenzene	460-00-4	0.5	%		**102**	**113**	**105**	**102**	**96.8**
EP075S: Acid Extractable Surrogates									
2-Fluorophenol	367-12-4	0.5	%		**89.9**	**92.6**	**103**	**98.8**	**104**
Phenol-d6	13127-88-3	0.5	%		**97.7**	**103**	**104**	**102**	**100**

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH29@0.4	BH30@0.8	BH30@2.7	BH31@0.2	BH31@2.3
				Client sampling date / time	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-001	ES1904527-006	ES1904527-009	ES1904527-010	ES1904527-014
					Result	Result	Result	Result	Result
EP075S: Acid Extractable Surrogates - Continued									
2-Chlorophenol-D4	93951-73-6	0.5	%		98.4	104	105	107	112
2.4.6-Tribromophenol	118-79-6	0.5	%		112	76.2	70.9	74.4	71.5
EP075T: Base/Neutral Extractable Surrogates									
Nitrobenzene-D5	4165-60-0	0.5	%		109	106	104	110	109
1.2-Dichlorobenzene-D4	2199-69-1	0.5	%		113	113	102	107	108
2-Fluorobiphenyl	321-60-8	0.5	%		120	117	115	124	121
Anthracene-d10	1719-06-8	0.5	%		104	109	110	111	113
4-Terphenyl-d14	1718-51-0	0.5	%		117	111	114	117	120
EP080S: TPH(V)/BTEX Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.2	%		95.0	111	96.9	93.3	90.1
Toluene-D8	2037-26-5	0.2	%		109	116	106	100	94.8
4-Bromofluorobenzene	460-00-4	0.2	%		107	117	108	105	98.8

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH32@1	BH32@1.9	BH33@0.5	BH33@2.5	BH34@0.3
			Client sampling date / time	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit	ES1904527-016	ES1904527-018	ES1904527-021	ES1904527-024	ES1904527-025
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	----	0.1	%	----	10.4	----	----	----
Moisture Content	----	1.0	%	14.4	----	32.7	18.6	9.2
EA200: AS 4964 - 2004 Identification of Asbestos in Soils								
Asbestos Detected	1332-21-4	0.1	g/kg	No	----	No	----	No
Asbestos (Trace)	1332-21-4	5	Fibres	No	----	No	----	No
Asbestos Type	1332-21-4	-	--	-	----	-	----	-
Sample weight (dry)	----	0.01	g	68.3	----	59.6	----	70.1
APPROVED IDENTIFIER:	----	-	--	A. SMYLIE	----	A. SMYLIE	----	A. SMYLIE
EA200N: Asbestos Quantification (non-NATA)								
ø Asbestos (Fines and Fibrous <7mm)	1332-21-4	0.0004	g	<0.0004	----	<0.0004	----	<0.0004
ø Asbestos (Fines and Fibrous FA+AF)	----	0.001	% (w/w)	<0.001	----	<0.001	----	<0.001
ø Asbestos Containing Material	1332-21-4	0.1	g	<0.1	----	<0.1	----	<0.1
ø Asbestos Containing Material (as 15% Asbestos in ACM >7mm)	1332-21-4	0.01	% (w/w)	<0.01	----	<0.01	----	<0.01
ø Weight Used for % Calculation	----	0.0001	kg	0.0683	----	0.0596	----	0.0701
ø Fibrous Asbestos >7mm	----	0.0004	g	<0.0004	----	<0.0004	----	<0.0004
EG005T: Total Metals by ICP-AES								
Arsenic	7440-38-2	5	mg/kg	<5	----	16	<5	<5
Cadmium	7440-43-9	1	mg/kg	<1	----	<1	<1	<1
Chromium	7440-47-3	2	mg/kg	26	----	8	3	11
Copper	7440-50-8	5	mg/kg	147	----	15	<5	20
Lead	7439-92-1	5	mg/kg	282	----	79	<5	44
Nickel	7440-02-0	2	mg/kg	7	----	6	<2	29
Zinc	7440-66-6	5	mg/kg	230	----	213	<5	249
EG035T: Total Recoverable Mercury by FIMS								
Mercury	7439-97-6	0.1	mg/kg	0.4	----	<0.1	<0.1	<0.1
EP066: Polychlorinated Biphenyls (PCB)								
Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	----	<0.1	<0.1	<0.1
EP068A: Organochlorine Pesticides (OC)								
alpha-BHC	319-84-6	0.05	mg/kg	<0.05	----	<0.05	<0.05	<0.05
Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	----	<0.05	<0.05	<0.05
beta-BHC	319-85-7	0.05	mg/kg	<0.05	----	<0.05	<0.05	<0.05
gamma-BHC	58-89-9	0.05	mg/kg	<0.05	----	<0.05	<0.05	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH32@1	BH32@1.9	BH33@0.5	BH33@2.5	BH34@0.3
				Client sampling date / time	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-016	ES1904527-018	ES1904527-021	ES1904527-024	ES1904527-025
					Result	Result	Result	Result	Result
EP068A: Organochlorine Pesticides (OC) - Continued									
delta-BHC	319-86-8	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Heptachlor	76-44-8	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Aldrin	309-00-2	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Heptachlor epoxide	1024-57-3	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
^ **Total Chlordane (sum)**	----	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
trans-Chlordane	5103-74-2	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
alpha-Endosulfan	959-98-8	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
cis-Chlordane	5103-71-9	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Dieldrin	60-57-1	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
4.4`-DDE	72-55-9	0.05	mg/kg		**0.12**	----	<0.05	<0.05	<0.05
Endrin	72-20-8	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
beta-Endosulfan	33213-65-9	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
^ **Endosulfan (sum)**	115-29-7	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
4.4`-DDD	72-54-8	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Endrin aldehyde	7421-93-4	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Endosulfan sulfate	1031-07-8	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
4.4`-DDT	50-29-3	0.2	mg/kg		<0.2	----	<0.2	<0.2	<0.2
Endrin ketone	53494-70-5	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Methoxychlor	72-43-5	0.2	mg/kg		<0.2	----	<0.2	<0.2	<0.2
^ **Sum of Aldrin + Dieldrin**	309-00-2/60-57-1	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
^ **Sum of DDD + DDE + DDT**	72-54-8/72-55-9/50-29-3	0.05	mg/kg		**0.12**	----	<0.05	<0.05	<0.05
EP068B: Organophosphorus Pesticides (OP)									
Dichlorvos	62-73-7	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Demeton-S-methyl	919-86-8	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Monocrotophos	6923-22-4	0.2	mg/kg		<0.2	----	<0.2	<0.2	<0.2
Dimethoate	60-51-5	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Diazinon	333-41-5	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Parathion-methyl	298-00-0	0.2	mg/kg		<0.2	----	<0.2	<0.2	<0.2
Malathion	121-75-5	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Fenthion	55-38-9	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Chlorpyrifos	2921-88-2	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Parathion	56-38-2	0.2	mg/kg		<0.2	----	<0.2	<0.2	<0.2
Pirimphos-ethyl	23505-41-1	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH32@1	BH32@1.9	BH33@0.5	BH33@2.5	BH34@0.3
				Client sampling date / time	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-016	ES1904527-018	ES1904527-021	ES1904527-024	ES1904527-025
					Result	Result	Result	Result	Result
EP068B: Organophosphorus Pesticides (OP) - Continued									
Chlorfenvinphos	470-90-6	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Bromophos-ethyl	4824-78-6	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Fenamiphos	22224-92-6	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Prothiofos	34643-46-4	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Ethion	563-12-2	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Carbophenothion	786-19-6	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Azinphos Methyl	86-50-0	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
EP074A: Monocyclic Aromatic Hydrocarbons									
Styrene	100-42-5	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
Isopropylbenzene	98-82-8	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
n-Propylbenzene	103-65-1	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
sec-Butylbenzene	135-98-8	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
tert-Butylbenzene	98-06-6	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
p-Isopropyltoluene	99-87-6	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
n-Butylbenzene	104-51-8	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
EP074B: Oxygenated Compounds									
Vinyl Acetate	108-05-4	5	mg/kg		<5	----	<5	<5	<5
2-Butanone (MEK)	78-93-3	5	mg/kg		<5	----	<5	<5	<5
4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg		<5	----	<5	<5	<5
2-Hexanone (MBK)	591-78-6	5	mg/kg		<5	----	<5	<5	<5
EP074C: Sulfonated Compounds									
Carbon disulfide	75-15-0	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
EP074D: Fumigants									
2.2-Dichloropropane	594-20-7	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
1.2-Dichloropropane	78-87-5	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
EP074E: Halogenated Aliphatic Compounds									
Dichlorodifluoromethane	75-71-8	5	mg/kg		<5	----	<5	<5	<5
Chloromethane	74-87-3	5	mg/kg		<5	----	<5	<5	<5
Vinyl chloride	75-01-4	5	mg/kg		<5	----	<5	<5	<5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH32@1	BH32@1.9	BH33@0.5	BH33@2.5	BH34@0.3
				Client sampling date / time	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-016	ES1904527-018	ES1904527-021	ES1904527-024	ES1904527-025
					Result	Result	Result	Result	Result
EP074E: Halogenated Aliphatic Compounds - Continued									
Bromomethane	74-83-9	5	mg/kg		<5	----	<5	<5	<5
Chloroethane	75-00-3	5	mg/kg		<5	----	<5	<5	<5
Trichlorofluoromethane	75-69-4	5	mg/kg		<5	----	<5	<5	<5
1.1-Dichloroethene	75-35-4	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
Iodomethane	74-88-4	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
1.1-Dichloroethane	75-34-3	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
1.1.1-Trichloroethane	71-55-6	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
1.1-Dichloropropylene	563-58-6	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
Carbon Tetrachloride	56-23-5	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
1.2-Dichloroethane	107-06-2	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
Trichloroethene	79-01-6	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
Dibromomethane	74-95-3	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
1.1.2-Trichloroethane	79-00-5	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
1.3-Dichloropropane	142-28-9	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
Tetrachloroethene	127-18-4	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
1.2.3-Trichloropropane	96-18-4	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
Pentachloroethane	76-01-7	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
EP074F: Halogenated Aromatic Compounds									
Chlorobenzene	108-90-7	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
Bromobenzene	108-86-1	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
2-Chlorotoluene	95-49-8	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
4-Chlorotoluene	106-43-4	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
EP074G: Trihalomethanes									
Chloroform	67-66-3	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
Bromodichloromethane	75-27-4	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
Dibromochloromethane	124-48-1	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH32@1	BH32@1.9	BH33@0.5	BH33@2.5	BH34@0.3
				Client sampling date / time	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-016	ES1904527-018	ES1904527-021	ES1904527-024	ES1904527-025
					Result	Result	Result	Result	Result
EP074G: Trihalomethanes - Continued									
Bromoform	75-25-2	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
EP075A: Phenolic Compounds									
Phenol	108-95-2	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
2-Chlorophenol	95-57-8	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
2-Methylphenol	95-48-7	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
3- & 4-Methylphenol	1319-77-3	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
2-Nitrophenol	88-75-5	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
2.4-Dimethylphenol	105-67-9	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
2.4-Dichlorophenol	120-83-2	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
2.6-Dichlorophenol	87-65-0	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
Pentachlorophenol	87-86-5	1	mg/kg		<1	----	<6	<1	<1
EP075B: Polynuclear Aromatic Hydrocarbons									
Naphthalene	91-20-3	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
2-Methylnaphthalene	91-57-6	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
2-Chloronaphthalene	91-58-7	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
Acenaphthylene	208-96-8	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
Acenaphthene	83-32-9	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
Fluorene	86-73-7	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
Phenanthrene	85-01-8	0.5	mg/kg		**2.5**	----	<3.0	<0.5	**2.3**
Anthracene	120-12-7	0.5	mg/kg		**0.7**	----	<3.0	<0.5	**0.6**
Fluoranthene	206-44-0	0.5	mg/kg		**5.3**	----	<3.0	<0.5	**2.6**
Pyrene	129-00-0	0.5	mg/kg		**5.6**	----	<3.0	<0.5	**2.5**
N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
Benz(a)anthracene	56-55-3	0.5	mg/kg		**3.2**	----	<3.0	<0.5	**1.1**
Chrysene	218-01-9	0.5	mg/kg		**2.9**	----	<3.0	<0.5	**0.9**
Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg		**5**	----	<6	<1	**1**
7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
Benzo(a)pyrene	50-32-8	0.5	mg/kg		**3.2**	----	<3.0	<0.5	**0.9**
3-Methylcholanthrene	56-49-5	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg		**1.5**	----	<3.0	<0.5	<0.5
Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH32@1	BH32@1.9	BH33@0.5	BH33@2.5	BH34@0.3
				Client sampling date / time	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-016	ES1904527-018	ES1904527-021	ES1904527-024	ES1904527-025
					Result	Result	Result	Result	Result
EP075B: Polynuclear Aromatic Hydrocarbons - Continued									
Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg		**2.0**	----	<3.0	<0.5	<0.5
^ Sum of PAHs	----	0.5	mg/kg		**31.9**	----	<2.4	<0.5	**11.9**
^ Benzo(a)pyrene TEQ (zero)	----	0.5	mg/kg		**4.2**	----	<2.4	<0.5	**1.1**
^ Benzo(a)pyrene TEQ (half LOR)	----	0.5	mg/kg		**4.5**	----	<2.4	**0.6**	**1.4**
^ Benzo(a)pyrene TEQ (LOR)	----	0.5	mg/kg		**4.7**	----	<2.4	**1.2**	**1.7**
EP075C: Phthalate Esters									
Dimethyl phthalate	131-11-3	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
Diethyl phthalate	84-66-2	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
Di-n-butyl phthalate	84-74-2	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
Butyl benzyl phthalate	85-68-7	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
bis(2-ethylhexyl) phthalate	117-81-7	5.0	mg/kg		<5.0	----	<5.0	<5.0	<5.0
Di-n-octylphthalate	117-84-0	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
EP075D: Nitrosamines									
N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
N-Nitrosodiethylamine	55-18-5	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
N-Nitrosopyrrolidine	930-55-2	1.0	mg/kg		<1.0	----	<3.0	<1.0	<1.0
N-Nitrosomorpholine	59-89-2	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
N-Nitrosopiperidine	100-75-4	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
N-Nitrosodibutylamine	924-16-3	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	1.0	mg/kg		<1.0	----	<6.0	<1.0	<1.0
Methapyrilene	91-80-5	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
EP075E: Nitroaromatics and Ketones									
2-Picoline	109-06-8	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
Acetophenone	98-86-2	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
Nitrobenzene	98-95-3	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
Isophorone	78-59-1	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
2.6-Dinitrotoluene	606-20-2	1.0	mg/kg		<1.0	----	<3.0	<1.0	<1.0
2.4-Dinitrotoluene	121-14-2	1.0	mg/kg		<1.0	----	<3.0	<1.0	<1.0
1-Naphthylamine	134-32-7	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
5-Nitro-o-toluidine	99-55-8	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
Azobenzene	103-33-3	1	mg/kg		<1	----	<3	<1	<1

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH32@1	BH32@1.9	BH33@0.5	BH33@2.5	BH34@0.3
				Client sampling date / time	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-016	ES1904527-018	ES1904527-021	ES1904527-024	ES1904527-025
					Result	Result	Result	Result	Result
EP075E: Nitroaromatics and Ketones - Continued									
1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
Phenacetin	62-44-2	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
4-Aminobiphenyl	92-67-1	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
Pentachloronitrobenzene	82-68-8	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
Pronamide	23950-58-5	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
Dimethylaminoazobenzene	60-11-7	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
Chlorobenzilate	510-15-6	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
EP075F: Haloethers									
Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
EP075G: Chlorinated Hydrocarbons									
1.3-Dichlorobenzene	541-73-1	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
1.4-Dichlorobenzene	106-46-7	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
1.2-Dichlorobenzene	95-50-1	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
Hexachloroethane	67-72-1	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
Hexachloropropylene	1888-71-7	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
Hexachlorobutadiene	87-68-3	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg		<2.5	----	<3.0	<2.5	<2.5
Pentachlorobenzene	608-93-5	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
Hexachlorobenzene (HCB)	118-74-1	1.0	mg/kg		<1.0	----	<3.0	<1.0	<1.0
EP075H: Anilines and Benzidines									
Aniline	62-53-3	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
4-Chloroaniline	106-47-8	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
2-Nitroaniline	88-74-4	1.0	mg/kg		<1.0	----	<3.0	<1.0	<1.0
3-Nitroaniline	99-09-2	1.0	mg/kg		<1.0	----	<3.0	<1.0	<1.0
Dibenzofuran	132-64-9	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
4-Nitroaniline	100-01-8	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
Carbazole	86-74-8	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg		<0.5	----	<3.0	<0.5	<0.5
EP080/071: Total Petroleum Hydrocarbons									
C6 - C9 Fraction	----	10	mg/kg		<10	----	<10	<10	<10

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH32@1	BH32@1.9	BH33@0.5	BH33@2.5	BH34@0.3
				Client sampling date / time	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-016	ES1904527-018	ES1904527-021	ES1904527-024	ES1904527-025
					Result	Result	Result	Result	Result
EP080/071: Total Petroleum Hydrocarbons - Continued									
C10 - C14 Fraction	----	50	mg/kg		<50	----	<50	<50	<50
C15 - C28 Fraction	----	100	mg/kg		**110**	----	<100	<100	**120**
C29 - C36 Fraction	----	100	mg/kg		**110**	----	<100	<100	<100
^ **C10 - C36 Fraction (sum)**	----	50	mg/kg		**220**	----	<50	<50	**120**
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions									
C6 - C10 Fraction	C6_C10	10	mg/kg		<10	----	<10	<10	<10
^ **C6 - C10 Fraction minus BTEX (F1)**	C6_C10-BTEX	10	mg/kg		<10	----	<10	<10	<10
>C10 - C16 Fraction	----	50	mg/kg		<50	----	<50	<50	<50
>C16 - C34 Fraction	----	100	mg/kg		**190**	----	<100	<100	**190**
>C34 - C40 Fraction	----	100	mg/kg		<100	----	<100	<100	<100
^ **>C10 - C40 Fraction (sum)**	----	50	mg/kg		**190**	----	<50	<50	**190**
^ **>C10 - C16 Fraction minus Naphthalene (F2)**	----	50	mg/kg		<50	----	<50	<50	<50
EP080: BTEXN									
Benzene	71-43-2	0.2	mg/kg		<0.2	----	<0.2	<0.2	<0.2
Toluene	108-88-3	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
Ethylbenzene	100-41-4	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
ortho-Xylene	95-47-6	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
^ **Sum of BTEX**	----	0.2	mg/kg		<0.2	----	<0.2	<0.2	<0.2
^ **Total Xylenes**	----	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
Naphthalene	91-20-3	1	mg/kg		<1	----	<1	<1	<1
EP231A: Perfluoroalkyl Sulfonic Acids									
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg		----	<0.0002	----	----	----
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg		----	<0.0002	----	----	----
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg		----	<0.0002	----	----	----
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg		----	<0.0002	----	----	----
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg		----	<0.0002	----	----	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH32@1	BH32@1.9	BH33@0.5	BH33@2.5	BH34@0.3
				Client sampling date / time	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-016	ES1904527-018	ES1904527-021	ES1904527-024	ES1904527-025
					Result	Result	Result	Result	Result
EP231A: Perfluoroalkyl Sulfonic Acids - Continued									
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	----	<0.0002	----	----	----	
EP231B: Perfluoroalkyl Carboxylic Acids									
Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	----	<0.001	----	----	----	
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	----	<0.0002	----	----	----	
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	----	<0.0002	----	----	----	
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	----	<0.0002	----	----	----	
Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	----	<0.0002	----	----	----	
Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	----	<0.0002	----	----	----	
Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	----	<0.0002	----	----	----	
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	----	<0.0002	----	----	----	
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	----	<0.0002	----	----	----	
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg	----	<0.0002	----	----	----	
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	----	<0.0005	----	----	----	
EP231C: Perfluoroalkyl Sulfonamides									
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	----	<0.0002	----	----	----	
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	----	<0.0005	----	----	----	
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	----	<0.0005	----	----	----	
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	----	<0.0005	----	----	----	
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	----	<0.0005	----	----	----	
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	----	<0.0002	----	----	----	
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	----	<0.0002	----	----	----	
EP231D: (n:2) Fluorotelomer Sulfonic Acids									

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH32@1	BH32@1.9	BH33@0.5	BH33@2.5	BH34@0.3
				Client sampling date / time	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-016	ES1904527-018	ES1904527-021	ES1904527-024	ES1904527-025
					Result	Result	Result	Result	Result
EP231D: (n:2) Fluorotelomer Sulfonic Acids - Continued									
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg		----	<0.0005	----	----	----
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg		----	<0.0005	----	----	----
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg		----	<0.0005	----	----	----
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg		----	<0.0005	----	----	----
EP231P: PFAS Sums									
Sum of PFAS	----	0.0002	mg/kg		----	<0.0002	----	----	----
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	mg/kg		----	<0.0002	----	----	----
Sum of PFAS (WA DER List)	----	0.0002	mg/kg		----	<0.0002	----	----	----
EP066S: PCB Surrogate									
Decachlorobiphenyl	2051-24-3	0.1	%		73.6	----	88.7	73.1	86.8
EP068S: Organochlorine Pesticide Surrogate									
Dibromo-DDE	21655-73-2	0.05	%		88.1	----	108	76.3	99.6
EP068T: Organophosphorus Pesticide Surrogate									
DEF	78-48-8	0.05	%		68.9	----	75.6	105	110
EP074S: VOC Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.5	%		95.7	----	84.2	80.3	105
Toluene-D8	2037-26-5	0.5	%		108	----	93.0	92.1	116
4-Bromofluorobenzene	460-00-4	0.5	%		106	----	92.0	87.4	110
EP075S: Acid Extractable Surrogates									
2-Fluorophenol	367-12-4	0.5	%		101	----	95.3	99.5	98.3
Phenol-d6	13127-88-3	0.5	%		102	----	86.7	94.2	106
2-Chlorophenol-D4	93951-73-6	0.5	%		106	----	92.8	97.9	110
2.4.6-Tribromophenol	118-79-6	0.5	%		78.7	----	24.5	63.5	62.3
EP075T: Base/Neutral Extractable Surrogates									
Nitrobenzene-D5	4165-60-0	0.5	%		109	----	86.9	91.2	108
1.2-Dichlorobenzene-D4	2199-69-1	0.5	%		102	----	118	85.2	108
2-Fluorobiphenyl	321-60-8	0.5	%		114	----	109	119	114
Anthracene-d10	1719-06-8	0.5	%		101	----	113	104	105
4-Terphenyl-d14	1718-51-0	0.5	%		118	----	84.7	115	114

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH32@1	BH32@1.9	BH33@0.5	BH33@2.5	BH34@0.3
				Client sampling date / time	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-016	ES1904527-018	ES1904527-021	ES1904527-024	ES1904527-025
					Result	Result	Result	Result	Result
EP080S: TPH(V)/BTEX Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.2	%		**98.4**	**----**	**86.2**	**82.0**	**107**
Toluene-D8	2037-26-5	0.2	%		**105**	**----**	**90.7**	**89.8**	**113**
4-Bromofluorobenzene	460-00-4	0.2	%		**108**	**----**	**94.6**	**90.7**	**114**
EP231S: PFAS Surrogate									
13C4-PFOS	----	0.0002	%		**----**	**72.5**	**----**	**----**	**----**
13C8-PFOA	----	0.0002	%		**----**	**70.5**	**----**	**----**	**----**

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH34@3	BH35@0.7	BH36@1	BH36@1.5	BH36@2.1
			Client sampling date / time	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit	ES1904527-029	ES1904527-031	ES1904527-035	ES1904527-037	ES1904527-038
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	----	0.1	%	----	----	----	24.0	----
Moisture Content	----	1.0	%	25.2	15.3	13.4	----	16.3
EA200: AS 4964 - 2004 Identification of Asbestos in Soils								
Asbestos Detected	1332-21-4	0.1	g/kg	----	No	No	----	----
Asbestos (Trace)	1332-21-4	5	Fibres	----	No	No	----	----
Asbestos Type	1332-21-4	-	--	----	-	-	----	----
Sample weight (dry)	----	0.01	g	----	48.1	67.6	----	----
APPROVED IDENTIFIER:	----	-	--	----	A. SMYLIE	A. SMYLIE	----	----
EA200N: Asbestos Quantification (non-NATA)								
ø Asbestos (Fines and Fibrous <7mm)	1332-21-4	0.0004	g	----	<0.0004	<0.0004	----	----
ø Asbestos (Fines and Fibrous FA+AF)	----	0.001	% (w/w)	----	<0.001	<0.001	----	----
ø Asbestos Containing Material	1332-21-4	0.1	g	----	<0.1	<0.1	----	----
ø Asbestos Containing Material (as 15% Asbestos in ACM >7mm)	1332-21-4	0.01	% (w/w)	----	<0.01	<0.01	----	----
ø Weight Used for % Calculation	----	0.0001	kg	----	0.0481	0.0676	----	----
ø Fibrous Asbestos >7mm	----	0.0004	g	----	<0.0004	<0.0004	----	----
EG005T: Total Metals by ICP-AES								
Arsenic	7440-38-2	5	mg/kg	<5	6	11	----	<5
Cadmium	7440-43-9	1	mg/kg	<1	<1	1	----	<1
Chromium	7440-47-3	2	mg/kg	3	4	177	----	<2
Copper	7440-50-8	5	mg/kg	<5	33	360	----	<5
Lead	7439-92-1	5	mg/kg	<5	35	39	----	<5
Nickel	7440-02-0	2	mg/kg	2	18	335	----	<2
Zinc	7440-66-6	5	mg/kg	5	340	72	----	<5
EG035T: Total Recoverable Mercury by FIMS								
Mercury	7439-97-6	0.1	mg/kg	<0.1	<0.1	<0.1	----	<0.1
EP066: Polychlorinated Biphenyls (PCB)								
Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	<0.1	<0.1	----	<0.1
EP068A: Organochlorine Pesticides (OC)								
alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	<0.05	----	<0.05
Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	<0.05	----	<0.05
beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	<0.05	----	<0.05
gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	<0.05	----	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH34@3	BH35@0.7	BH36@1	BH36@1.5	BH36@2.1
				Client sampling date / time	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-029	ES1904527-031	ES1904527-035	ES1904527-037	ES1904527-038
					Result	Result	Result	Result	Result
EP068A: Organochlorine Pesticides (OC) - Continued									
delta-BHC	319-86-8	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Heptachlor	76-44-8	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Aldrin	309-00-2	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Heptachlor epoxide	1024-57-3	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
^ Total Chlordane (sum)	----	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
trans-Chlordane	5103-74-2	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
alpha-Endosulfan	959-98-8	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
cis-Chlordane	5103-71-9	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Dieldrin	60-57-1	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
4.4`-DDE	72-55-9	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Endrin	72-20-8	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
beta-Endosulfan	33213-65-9	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
^ Endosulfan (sum)	115-29-7	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
4.4`-DDD	72-54-8	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Endrin aldehyde	7421-93-4	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Endosulfan sulfate	1031-07-8	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
4.4`-DDT	50-29-3	0.2	mg/kg		<0.2	<0.2	<0.2	----	<0.2
Endrin ketone	53494-70-5	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Methoxychlor	72-43-5	0.2	mg/kg		<0.2	<0.2	<0.2	----	<0.2
^ Sum of Aldrin + Dieldrin	309-00-2/60-57-1	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
^ Sum of DDD + DDE + DDT	72-54-8/72-55-9/50-29-3	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
EP068B: Organophosphorus Pesticides (OP)									
Dichlorvos	62-73-7	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Demeton-S-methyl	919-86-8	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Monocrotophos	6923-22-4	0.2	mg/kg		<0.2	<0.2	<0.2	----	<0.2
Dimethoate	60-51-5	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Diazinon	333-41-5	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Parathion-methyl	298-00-0	0.2	mg/kg		<0.2	<0.2	<0.2	----	<0.2
Malathion	121-75-5	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Fenthion	55-38-9	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Chlorpyrifos	2921-88-2	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Parathion	56-38-2	0.2	mg/kg		<0.2	<0.2	<0.2	----	<0.2
Pirimphos-ethyl	23505-41-1	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH34@3	BH35@0.7	BH36@1	BH36@1.5	BH36@2.1
				Client sampling date / time	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-029	ES1904527-031	ES1904527-035	ES1904527-037	ES1904527-038
					Result	Result	Result	Result	Result
EP068B: Organophosphorus Pesticides (OP) - Continued									
Chlorfenvinphos	470-90-6	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Bromophos-ethyl	4824-78-6	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Fenamiphos	22224-92-6	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Prothiofos	34643-46-4	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Ethion	563-12-2	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Carbophenothion	786-19-6	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
Azinphos Methyl	86-50-0	0.05	mg/kg		<0.05	<0.05	<0.05	----	<0.05
EP074A: Monocyclic Aromatic Hydrocarbons									
Styrene	100-42-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Isopropylbenzene	98-82-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
n-Propylbenzene	103-65-1	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
sec-Butylbenzene	135-98-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
tert-Butylbenzene	98-06-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
p-Isopropyltoluene	99-87-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
n-Butylbenzene	104-51-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
EP074B: Oxygenated Compounds									
Vinyl Acetate	108-05-4	5	mg/kg		<5	<5	<5	----	<5
2-Butanone (MEK)	78-93-3	5	mg/kg		<5	<5	<5	----	<5
4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg		<5	<5	<5	----	<5
2-Hexanone (MBK)	591-78-6	5	mg/kg		<5	<5	<5	----	<5
EP074C: Sulfonated Compounds									
Carbon disulfide	75-15-0	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
EP074D: Fumigants									
2.2-Dichloropropane	594-20-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.2-Dichloropropane	78-87-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
EP074E: Halogenated Aliphatic Compounds									
Dichlorodifluoromethane	75-71-8	5	mg/kg		<5	<5	<5	----	<5
Chloromethane	74-87-3	5	mg/kg		<5	<5	<5	----	<5
Vinyl chloride	75-01-4	5	mg/kg		<5	<5	<5	----	<5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH34@3	BH35@0.7	BH36@1	BH36@1.5	BH36@2.1
				Client sampling date / time	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-029	ES1904527-031	ES1904527-035	ES1904527-037	ES1904527-038
					Result	Result	Result	Result	Result
EP074E: Halogenated Aliphatic Compounds - Continued									
Bromomethane	74-83-9	5	mg/kg		<5	<5	<5	----	<5
Chloroethane	75-00-3	5	mg/kg		<5	<5	<5	----	<5
Trichlorofluoromethane	75-69-4	5	mg/kg		<5	<5	<5	----	<5
1.1-Dichloroethene	75-35-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Iodomethane	74-88-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.1-Dichloroethane	75-34-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.1.1-Trichloroethane	71-55-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.1-Dichloropropylene	563-58-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Carbon Tetrachloride	56-23-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.2-Dichloroethane	107-06-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Trichloroethene	79-01-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Dibromomethane	74-95-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.1.2-Trichloroethane	79-00-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.3-Dichloropropane	142-28-9	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Tetrachloroethene	127-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.2.3-Trichloropropane	96-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Pentachloroethane	76-01-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
EP074F: Halogenated Aromatic Compounds									
Chlorobenzene	108-90-7	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Bromobenzene	108-86-1	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
2-Chlorotoluene	95-49-8	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
4-Chlorotoluene	106-43-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
EP074G: Trihalomethanes									
Chloroform	67-66-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Bromodichloromethane	75-27-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Dibromochloromethane	124-48-1	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH34@3	BH35@0.7	BH36@1	BH36@1.5	BH36@2.1
				Client sampling date / time	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-029	ES1904527-031	ES1904527-035	ES1904527-037	ES1904527-038
					Result	Result	Result	Result	Result
EP074G: Trihalomethanes - Continued									
Bromoform	75-25-2	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
EP075A: Phenolic Compounds									
Phenol	108-95-2	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
2-Chlorophenol	95-57-8	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
2-Methylphenol	95-48-7	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
3- & 4-Methylphenol	1319-77-3	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
2-Nitrophenol	88-75-5	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
2.4-Dimethylphenol	105-67-9	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
2.4-Dichlorophenol	120-83-2	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
2.6-Dichlorophenol	87-65-0	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Pentachlorophenol	87-86-5	1	mg/kg		<6	<1	<1	----	<6
EP075B: Polynuclear Aromatic Hydrocarbons									
Naphthalene	91-20-3	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
2-Methylnaphthalene	91-57-6	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
2-Chloronaphthalene	91-58-7	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Acenaphthylene	208-96-8	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Acenaphthene	83-32-9	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Fluorene	86-73-7	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Phenanthrene	85-01-8	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Anthracene	120-12-7	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Fluoranthene	206-44-0	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Pyrene	129-00-0	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Benz(a)anthracene	56-55-3	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Chrysene	218-01-9	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg		<6	<1	<1	----	<6
7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Benzo(a)pyrene	50-32-8	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
3-Methylcholanthrene	56-49-5	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH34@3	BH35@0.7	BH36@1	BH36@1.5	BH36@2.1
				Client sampling date / time	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-029	ES1904527-031	ES1904527-035	ES1904527-037	ES1904527-038
					Result	Result	Result	Result	Result
EP075B: Polynuclear Aromatic Hydrocarbons - Continued									
Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
^ Sum of PAHs	----	0.5	mg/kg		<2.4	<0.5	<0.5	----	<2.4
^ Benzo(a)pyrene TEQ (zero)	----	0.5	mg/kg		<2.4	<0.5	<0.5	----	<2.4
^ Benzo(a)pyrene TEQ (half LOR)	----	0.5	mg/kg		<2.4	**0.6**	**0.6**	----	<2.4
^ Benzo(a)pyrene TEQ (LOR)	----	0.5	mg/kg		<2.4	**1.2**	**1.2**	----	<2.4
EP075C: Phthalate Esters									
Dimethyl phthalate	131-11-3	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Diethyl phthalate	84-66-2	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Di-n-butyl phthalate	84-74-2	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Butyl benzyl phthalate	85-68-7	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
bis(2-ethylhexyl) phthalate	117-81-7	5.0	mg/kg		<5.0	<5.0	<5.0	----	<5.0
Di-n-octylphthalate	117-84-0	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
EP075D: Nitrosamines									
N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
N-Nitrosodiethylamine	55-18-5	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
N-Nitrosopyrrolidine	930-55-2	1.0	mg/kg		<3.0	<1.0	<1.0	----	<3.0
N-Nitrosomorpholine	59-89-2	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
N-Nitrosopiperidine	100-75-4	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
N-Nitrosodibutylamine	924-16-3	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	1.0	mg/kg		<6.0	<1.0	<1.0	----	<6.0
Methapyrilene	91-80-5	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
EP075E: Nitroaromatics and Ketones									
2-Picoline	109-06-8	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Acetophenone	98-86-2	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Nitrobenzene	98-95-3	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Isophorone	78-59-1	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
2.6-Dinitrotoluene	606-20-2	1.0	mg/kg		<3.0	<1.0	<1.0	----	<3.0
2.4-Dinitrotoluene	121-14-2	1.0	mg/kg		<3.0	<1.0	<1.0	----	<3.0
1-Naphthylamine	134-32-7	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
5-Nitro-o-toluidine	99-55-8	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Azobenzene	103-33-3	1	mg/kg		<3	<1	<1	----	<3

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH34@3	BH35@0.7	BH36@1	BH36@1.5	BH36@2.1
				Client sampling date / time	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-029	ES1904527-031	ES1904527-035	ES1904527-037	ES1904527-038
					Result	Result	Result	Result	Result
EP075E: Nitroaromatics and Ketones - Continued									
1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Phenacetin	62-44-2	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
4-Aminobiphenyl	92-67-1	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Pentachloronitrobenzene	82-68-8	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Pronamide	23950-58-5	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Dimethylaminoazobenzene	60-11-7	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Chlorobenzilate	510-15-6	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
EP075F: Haloethers									
Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
EP075G: Chlorinated Hydrocarbons									
1.3-Dichlorobenzene	541-73-1	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
1.4-Dichlorobenzene	106-46-7	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
1.2-Dichlorobenzene	95-50-1	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Hexachloroethane	67-72-1	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Hexachloropropylene	1888-71-7	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Hexachlorobutadiene	87-68-3	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg		<3.0	<2.5	<2.5	----	<3.0
Pentachlorobenzene	608-93-5	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Hexachlorobenzene (HCB)	118-74-1	1.0	mg/kg		<3.0	<1.0	<1.0	----	<3.0
EP075H: Anilines and Benzidines									
Aniline	62-53-3	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
4-Chloroaniline	106-47-8	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
2-Nitroaniline	88-74-4	1.0	mg/kg		<3.0	<1.0	<1.0	----	<3.0
3-Nitroaniline	99-09-2	1.0	mg/kg		<3.0	<1.0	<1.0	----	<3.0
Dibenzofuran	132-64-9	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
4-Nitroaniline	100-01-8	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
Carbazole	86-74-8	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg		<3.0	<0.5	<0.5	----	<3.0
EP080/071: Total Petroleum Hydrocarbons									
C6 - C9 Fraction	----	10	mg/kg		<10	<10	<10	----	<10

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH34@3	BH35@0.7	BH36@1	BH36@1.5	BH36@2.1
				Client sampling date / time	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-029	ES1904527-031	ES1904527-035	ES1904527-037	ES1904527-038
					Result	Result	Result	Result	Result
EP080/071: Total Petroleum Hydrocarbons - Continued									
C10 - C14 Fraction	----	50	mg/kg		<50	<50	<50	----	<50
C15 - C28 Fraction	----	100	mg/kg		<100	<100	<100	----	<100
C29 - C36 Fraction	----	100	mg/kg		<100	<100	<100	----	<100
^ C10 - C36 Fraction (sum)	----	50	mg/kg		<50	<50	<50	----	<50
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions									
C6 - C10 Fraction	C6_C10	10	mg/kg		<10	<10	<10	----	<10
^ C6 - C10 Fraction minus BTEX (F1)	C6_C10-BTEX	10	mg/kg		<10	<10	<10	----	<10
>C10 - C16 Fraction	----	50	mg/kg		<50	<50	<50	----	<50
>C16 - C34 Fraction	----	100	mg/kg		<100	<100	<100	----	<100
>C34 - C40 Fraction	----	100	mg/kg		<100	<100	<100	----	<100
^ >C10 - C40 Fraction (sum)	----	50	mg/kg		<50	<50	<50	----	<50
^ >C10 - C16 Fraction minus Naphthalene (F2)	----	50	mg/kg		<50	<50	<50	----	<50
EP080: BTEXN									
Benzene	71-43-2	0.2	mg/kg		<0.2	<0.2	<0.2	----	<0.2
Toluene	108-88-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Ethylbenzene	100-41-4	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
ortho-Xylene	95-47-6	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
^ Sum of BTEX	----	0.2	mg/kg		<0.2	<0.2	<0.2	----	<0.2
^ Total Xylenes	----	0.5	mg/kg		<0.5	<0.5	<0.5	----	<0.5
Naphthalene	91-20-3	1	mg/kg		<1	<1	<1	----	<1
EP231A: Perfluoroalkyl Sulfonic Acids									
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg		----	----	----	<0.0002	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH34@3	BH35@0.7	BH36@1	BH36@1.5	BH36@2.1
				Client sampling date / time	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-029	ES1904527-031	ES1904527-035	ES1904527-037	ES1904527-038
					Result	Result	Result	Result	Result
EP231A: Perfluoroalkyl Sulfonic Acids - Continued									
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg		----	----	----	<0.0002	----
EP231B: Perfluoroalkyl Carboxylic Acids									
Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg		----	----	----	<0.001	----
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg		----	----	----	<0.0002	----
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg		----	----	----	<0.0005	----
EP231C: Perfluoroalkyl Sulfonamides									
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg		----	----	----	<0.0002	----
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg		----	----	----	<0.0005	----
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg		----	----	----	<0.0005	----
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg		----	----	----	<0.0005	----
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg		----	----	----	<0.0005	----
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg		----	----	----	<0.0002	----
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg		----	----	----	<0.0002	----
EP231D: (n:2) Fluorotelomer Sulfonic Acids									

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH34@3	BH35@0.7	BH36@1	BH36@1.5	BH36@2.1
				Client sampling date / time	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-029	ES1904527-031	ES1904527-035	ES1904527-037	ES1904527-038
					Result	Result	Result	Result	Result
EP231D: (n:2) Fluorotelomer Sulfonic Acids - Continued									
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg		----	----	----	<0.0005	----
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg		----	----	----	<0.0005	----
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg		----	----	----	<0.0005	----
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg		----	----	----	<0.0005	----
EP231P: PFAS Sums									
Sum of PFAS	----	0.0002	mg/kg		----	----	----	<0.0002	----
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	mg/kg		----	----	----	<0.0002	----
Sum of PFAS (WA DER List)	----	0.0002	mg/kg		----	----	----	<0.0002	----
EP066S: PCB Surrogate									
Decachlorobiphenyl	2051-24-3	0.1	%		92.0	84.3	118	----	78.6
EP068S: Organochlorine Pesticide Surrogate									
Dibromo-DDE	21655-73-2	0.05	%		93.0	93.4	122	----	90.3
EP068T: Organophosphorus Pesticide Surrogate									
DEF	78-48-8	0.05	%		68.7	77.6	131	----	66.1
EP074S: VOC Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.5	%		82.3	85.4	83.5	----	90.3
Toluene-D8	2037-26-5	0.5	%		92.6	95.6	106	----	99.0
4-Bromofluorobenzene	460-00-4	0.5	%		87.8	92.6	97.6	----	97.8
EP075S: Acid Extractable Surrogates									
2-Fluorophenol	367-12-4	0.5	%		98.0	94.0	94.4	----	93.8
Phenol-d6	13127-88-3	0.5	%		85.1	103	92.0	----	82.8
2-Chlorophenol-D4	93951-73-6	0.5	%		96.9	111	108	----	94.8
2.4.6-Tribromophenol	118-79-6	0.5	%		27.9	42.5	118	----	20.7
EP075T: Base/Neutral Extractable Surrogates									
Nitrobenzene-D5	4165-60-0	0.5	%		94.0	108	110	----	86.2
1.2-Dichlorobenzene-D4	2199-69-1	0.5	%		115	102	111	----	113
2-Fluorobiphenyl	321-60-8	0.5	%		102	112	125	----	99.8
Anthracene-d10	1719-06-8	0.5	%		110	95.6	114	----	112
4-Terphenyl-d14	1718-51-0	0.5	%		88.0	111	121	----	83.8

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH34@3	BH35@0.7	BH36@1	BH36@1.5	BH36@2.1
				Client sampling date / time	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-029	ES1904527-031	ES1904527-035	ES1904527-037	ES1904527-038
					Result	Result	Result	Result	Result
EP080S: TPH(V)/BTEX Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.2	%		**83.8**	**87.2**	**87.6**	**----**	**92.3**
Toluene-D8	2037-26-5	0.2	%		**90.1**	**93.1**	**103**	**----**	**96.5**
4-Bromofluorobenzene	460-00-4	0.2	%		**89.7**	**95.5**	**104**	**----**	**100**
EP231S: PFAS Surrogate									
13C4-PFOS	----	0.0002	%		**----**	**----**	**----**	**70.0**	**----**
13C8-PFOA	----	0.0002	%		**----**	**----**	**----**	**71.5**	**----**

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH37@1.1	BH37@1.5	BH37@2.7	BH38@0.3	BH38@1.6
			Client sampling date / time	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit	ES1904527-040	ES1904527-041	ES1904527-043	ES1904527-044	ES1904527-046
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	----	0.1	%	**----**	**36.9**	**----**	**----**	**----**
Moisture Content	----	1.0	%	**25.5**	**----**	**25.9**	**8.7**	**21.2**
EA200: AS 4964 - 2004 Identification of Asbestos in Soils								
Asbestos Detected	1332-21-4	0.1	g/kg	**No**	**----**	**----**	**No**	**No**
Asbestos (Trace)	1332-21-4	5	Fibres	**No**	**----**	**----**	**No**	**No**
Asbestos Type	1332-21-4	-	--	**-**	**----**	**----**	**-**	**-**
Sample weight (dry)	----	0.01	g	**20.9**	**----**	**----**	**78.6**	**31.2**
APPROVED IDENTIFIER:	----	-	--	**A. SMYLIE**	**----**	**----**	**A. SMYLIE**	**A. SMYLIE**
Synthetic Mineral Fibre	----	0.1	g/kg	**----**	**----**	**----**	**----**	**No**
Organic Fibre	----	0.1	g/kg	**----**	**----**	**----**	**----**	**No**
EA200N: Asbestos Quantification (non-NATA)								
ø Asbestos (Fines and Fibrous <7mm)	1332-21-4	0.0004	g	<0.0004	**----**	**----**	<0.0004	**----**
ø Asbestos (Fines and Fibrous FA+AF)	----	0.001	% (w/w)	<0.001	**----**	**----**	<0.001	**----**
ø Asbestos Containing Material	1332-21-4	0.1	g	<0.1	**----**	**----**	<0.1	**----**
ø Asbestos Containing Material (as 15% Asbestos in ACM >7mm)	1332-21-4	0.01	% (w/w)	<0.01	**----**	**----**	<0.01	**----**
ø Weight Used for % Calculation	----	0.0001	kg	**0.0209**	**----**	**----**	**0.0786**	**----**
ø Fibrous Asbestos >7mm	----	0.0004	g	<0.0004	**----**	**----**	<0.0004	**----**
EG005T: Total Metals by ICP-AES								
Arsenic	7440-38-2	5	mg/kg	<5	**----**	**15**	<5	<5
Cadmium	7440-43-9	1	mg/kg	<1	**----**	<1	<1	<1
Chromium	7440-47-3	2	mg/kg	<2	**----**	**34**	**8**	**2**
Copper	7440-50-8	5	mg/kg	**9**	**----**	**1200**	**16**	<5
Lead	7439-92-1	5	mg/kg	**34**	**----**	**692**	**15**	<5
Nickel	7440-02-0	2	mg/kg	**9**	**----**	**309**	**5**	<2
Zinc	7440-66-6	5	mg/kg	**10**	**----**	**410**	**12**	<5
EG035T: Total Recoverable Mercury by FIMS								
Mercury	7439-97-6	0.1	mg/kg	<0.1	**----**	<0.1	<0.1	<0.1
EP066: Polychlorinated Biphenyls (PCB)								
Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	**----**	<0.1	<0.1	<0.1
EP068A: Organochlorine Pesticides (OC)								
alpha-BHC	319-84-6	0.05	mg/kg	<0.05	**----**	<0.05	<0.05	<0.05
Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	**----**	<0.05	<0.05	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH37@1.1	BH37@1.5	BH37@2.7	BH38@0.3	BH38@1.6
				Client sampling date / time	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-040	ES1904527-041	ES1904527-043	ES1904527-044	ES1904527-046
					Result	Result	Result	Result	Result
EP068A: Organochlorine Pesticides (OC) - Continued									
beta-BHC	319-85-7	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
gamma-BHC	58-89-9	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
delta-BHC	319-86-8	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Heptachlor	76-44-8	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Aldrin	309-00-2	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Heptachlor epoxide	1024-57-3	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
^ Total Chlordane (sum)	----	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
trans-Chlordane	5103-74-2	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
alpha-Endosulfan	959-98-8	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
cis-Chlordane	5103-71-9	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Dieldrin	60-57-1	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
4.4`-DDE	72-55-9	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Endrin	72-20-8	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
beta-Endosulfan	33213-65-9	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
^ Endosulfan (sum)	115-29-7	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
4.4`-DDD	72-54-8	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Endrin aldehyde	7421-93-4	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Endosulfan sulfate	1031-07-8	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
4.4`-DDT	50-29-3	0.2	mg/kg		<0.2	----	<0.2	<0.2	<0.2
Endrin ketone	53494-70-5	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Methoxychlor	72-43-5	0.2	mg/kg		<0.2	----	<0.2	<0.2	<0.2
^ Sum of Aldrin + Dieldrin	309-00-2/60-57-1	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
^ Sum of DDD + DDE + DDT	72-54-8/72-55-9/50-2	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
EP068B: Organophosphorus Pesticides (OP)									
Dichlorvos	62-73-7	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Demeton-S-methyl	919-86-8	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Monocrotophos	6923-22-4	0.2	mg/kg		<0.2	----	<0.2	<0.2	<0.2
Dimethoate	60-51-5	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Diazinon	333-41-5	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Parathion-methyl	298-00-0	0.2	mg/kg		<0.2	----	<0.2	<0.2	<0.2
Malathion	121-75-5	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Fenthion	55-38-9	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Chlorpyrifos	2921-88-2	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH37@1.1	BH37@1.5	BH37@2.7	BH38@0.3	BH38@1.6
				Client sampling date / time	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-040	ES1904527-041	ES1904527-043	ES1904527-044	ES1904527-046
					Result	Result	Result	Result	Result
EP068B: Organophosphorus Pesticides (OP) - Continued									
Parathion	56-38-2	0.2	mg/kg		<0.2	----	<0.2	<0.2	<0.2
Pirimphos-ethyl	23505-41-1	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Chlorfenvinphos	470-90-6	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Bromophos-ethyl	4824-78-6	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Fenamiphos	22224-92-6	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Prothiofos	34643-46-4	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Ethion	563-12-2	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Carbophenothion	786-19-6	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
Azinphos Methyl	86-50-0	0.05	mg/kg		<0.05	----	<0.05	<0.05	<0.05
EP074A: Monocyclic Aromatic Hydrocarbons									
Styrene	100-42-5	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
Isopropylbenzene	98-82-8	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
n-Propylbenzene	103-65-1	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
sec-Butylbenzene	135-98-8	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
tert-Butylbenzene	98-06-6	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
p-Isopropyltoluene	99-87-6	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
n-Butylbenzene	104-51-8	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
EP074B: Oxygenated Compounds									
Vinyl Acetate	108-05-4	5	mg/kg		<5	----	<5	<5	<5
2-Butanone (MEK)	78-93-3	5	mg/kg		<5	----	<5	<5	<5
4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg		<5	----	<5	<5	<5
2-Hexanone (MBK)	591-78-6	5	mg/kg		<5	----	<5	<5	<5
EP074C: Sulfonated Compounds									
Carbon disulfide	75-15-0	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
EP074D: Fumigants									
2.2-Dichloropropane	594-20-7	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
1.2-Dichloropropane	78-87-5	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
EP074E: Halogenated Aliphatic Compounds									
Dichlorodifluoromethane	75-71-8	5	mg/kg		<5	----	<5	<5	<5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH37@1.1	BH37@1.5	BH37@2.7	BH38@0.3	BH38@1.6
				Client sampling date / time	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-040	ES1904527-041	ES1904527-043	ES1904527-044	ES1904527-046
					Result	Result	Result	Result	Result
EP074E: Halogenated Aliphatic Compounds - Continued									
Chloromethane	74-87-3	5	mg/kg		<5	----	<5	<5	<5
Vinyl chloride	75-01-4	5	mg/kg		<5	----	<5	<5	<5
Bromomethane	74-83-9	5	mg/kg		<5	----	<5	<5	<5
Chloroethane	75-00-3	5	mg/kg		<5	----	<5	<5	<5
Trichlorofluoromethane	75-69-4	5	mg/kg		<5	----	<5	<5	<5
1.1-Dichloroethene	75-35-4	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
Iodomethane	74-88-4	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
1.1-Dichloroethane	75-34-3	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
1.1.1-Trichloroethane	71-55-6	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
1.1-Dichloropropylene	563-58-6	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
Carbon Tetrachloride	56-23-5	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
1.2-Dichloroethane	107-06-2	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
Trichloroethene	79-01-6	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
Dibromomethane	74-95-3	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
1.1.2-Trichloroethane	79-00-5	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
1.3-Dichloropropane	142-28-9	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
Tetrachloroethene	127-18-4	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
1.2.3-Trichloropropane	96-18-4	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
Pentachloroethane	76-01-7	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
EP074F: Halogenated Aromatic Compounds									
Chlorobenzene	108-90-7	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
Bromobenzene	108-86-1	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
2-Chlorotoluene	95-49-8	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
4-Chlorotoluene	106-43-4	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
EP074G: Trihalomethanes									
Chloroform	67-66-3	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH37@1.1	BH37@1.5	BH37@2.7	BH38@0.3	BH38@1.6
				Client sampling date / time	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-040	ES1904527-041	ES1904527-043	ES1904527-044	ES1904527-046
					Result	Result	Result	Result	Result
EP074G: Trihalomethanes - Continued									
Bromodichloromethane	75-27-4	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
Dibromochloromethane	124-48-1	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
Bromoform	75-25-2	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
EP075A: Phenolic Compounds									
Phenol	108-95-2	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
2-Chlorophenol	95-57-8	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
2-Methylphenol	95-48-7	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
3- & 4-Methylphenol	1319-77-3	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
2-Nitrophenol	88-75-5	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
2.4-Dimethylphenol	105-67-9	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
2.4-Dichlorophenol	120-83-2	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
2.6-Dichlorophenol	87-65-0	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
Pentachlorophenol	87-86-5	1	mg/kg		<6	----	<6	<1	<6
EP075B: Polynuclear Aromatic Hydrocarbons									
Naphthalene	91-20-3	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
2-Methylnaphthalene	91-57-6	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
2-Chloronaphthalene	91-58-7	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
Acenaphthylene	208-96-8	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
Acenaphthene	83-32-9	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
Fluorene	86-73-7	0.5	mg/kg		<3.0	----	**3.2**	<0.5	<3.0
Phenanthrene	85-01-8	0.5	mg/kg		<3.0	----	**9.0**	<0.5	<3.0
Anthracene	120-12-7	0.5	mg/kg		<3.0	----	**4.4**	<0.5	<3.0
Fluoranthene	206-44-0	0.5	mg/kg		<3.0	----	**7.6**	<0.5	<3.0
Pyrene	129-00-0	0.5	mg/kg		<3.0	----	**6.6**	<0.5	<3.0
N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
Benz(a)anthracene	56-55-3	0.5	mg/kg		<3.0	----	**4.2**	<0.5	<3.0
Chrysene	218-01-9	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg		<6	----	<6	<1	<6
7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
Benzo(a)pyrene	50-32-8	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
3-Methylcholanthrene	56-49-5	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH37@1.1	BH37@1.5	BH37@2.7	BH38@0.3	BH38@1.6
			Client sampling date / time	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit	ES1904527-040	ES1904527-041	ES1904527-043	ES1904527-044	ES1904527-046
				Result	Result	Result	Result	Result
EP075B: Polynuclear Aromatic Hydrocarbons - Continued								
Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg	<3.0	----	<3.0	<0.5	<3.0
Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg	<3.0	----	<3.0	<0.5	<3.0
Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg	<3.0	----	<3.0	<0.5	<3.0
^ Sum of PAHs	----	0.5	mg/kg	<2.4	----	**35.0**	<0.5	<2.4
^ Benzo(a)pyrene TEQ (zero)	----	0.5	mg/kg	<2.4	----	<2.4	<0.5	<2.4
^ Benzo(a)pyrene TEQ (half LOR)	----	0.5	mg/kg	<2.4	----	<2.4	**0.6**	<2.4
^ Benzo(a)pyrene TEQ (LOR)	----	0.5	mg/kg	<2.4	----	<2.4	**1.2**	<2.4
EP075C: Phthalate Esters								
Dimethyl phthalate	131-11-3	0.5	mg/kg	<3.0	----	<3.0	<0.5	<3.0
Diethyl phthalate	84-66-2	0.5	mg/kg	<3.0	----	<3.0	<0.5	<3.0
Di-n-butyl phthalate	84-74-2	0.5	mg/kg	<3.0	----	<3.0	<0.5	<3.0
Butyl benzyl phthalate	85-68-7	0.5	mg/kg	<3.0	----	<3.0	<0.5	<3.0
bis(2-ethylhexyl) phthalate	117-81-7	5.0	mg/kg	<5.0	----	<5.0	<5.0	<5.0
Di-n-octylphthalate	117-84-0	0.5	mg/kg	<3.0	----	<3.0	<0.5	<3.0
EP075D: Nitrosamines								
N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg	<3.0	----	<3.0	<0.5	<3.0
N-Nitrosodiethylamine	55-18-5	0.5	mg/kg	<3.0	----	<3.0	<0.5	<3.0
N-Nitrosopyrrolidine	930-55-2	1.0	mg/kg	<3.0	----	<3.0	<1.0	<3.0
N-Nitrosomorpholine	59-89-2	0.5	mg/kg	<3.0	----	<3.0	<0.5	<3.0
N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg	<3.0	----	<3.0	<0.5	<3.0
N-Nitrosopiperidine	100-75-4	0.5	mg/kg	<3.0	----	<3.0	<0.5	<3.0
N-Nitrosodibutylamine	924-16-3	0.5	mg/kg	<3.0	----	<3.0	<0.5	<3.0
N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	1.0	mg/kg	<6.0	----	<6.0	<1.0	<6.0
Methapyrilene	91-80-5	0.5	mg/kg	<3.0	----	<3.0	<0.5	<3.0
EP075E: Nitroaromatics and Ketones								
2-Picoline	109-06-8	0.5	mg/kg	<3.0	----	<3.0	<0.5	<3.0
Acetophenone	98-86-2	0.5	mg/kg	<3.0	----	<3.0	<0.5	<3.0
Nitrobenzene	98-95-3	0.5	mg/kg	<3.0	----	<3.0	<0.5	<3.0
Isophorone	78-59-1	0.5	mg/kg	<3.0	----	<3.0	<0.5	<3.0
2.6-Dinitrotoluene	606-20-2	1.0	mg/kg	<3.0	----	<3.0	<1.0	<3.0
2.4-Dinitrotoluene	121-14-2	1.0	mg/kg	<3.0	----	<3.0	<1.0	<3.0
1-Naphthylamine	134-32-7	0.5	mg/kg	<3.0	----	<3.0	<0.5	<3.0
4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg	<3.0	----	<3.0	<0.5	<3.0

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH37@1.1	BH37@1.5	BH37@2.7	BH38@0.3	BH38@1.6
				Client sampling date / time	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-040	ES1904527-041	ES1904527-043	ES1904527-044	ES1904527-046
					Result	Result	Result	Result	Result
EP075E: Nitroaromatics and Ketones - Continued									
5-Nitro-o-toluidine	99-55-8	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
Azobenzene	103-33-3	1	mg/kg		<3	----	<3	<1	<3
1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
Phenacetin	62-44-2	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
4-Aminobiphenyl	92-67-1	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
Pentachloronitrobenzene	82-68-8	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
Pronamide	23950-58-5	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
Dimethylaminoazobenzene	60-11-7	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
Chlorobenzilate	510-15-6	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
EP075F: Haloethers									
Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
EP075G: Chlorinated Hydrocarbons									
1.3-Dichlorobenzene	541-73-1	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
1.4-Dichlorobenzene	106-46-7	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
1.2-Dichlorobenzene	95-50-1	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
Hexachloroethane	67-72-1	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
Hexachloropropylene	1888-71-7	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
Hexachlorobutadiene	87-68-3	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg		<3.0	----	<3.0	<2.5	<3.0
Pentachlorobenzene	608-93-5	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
Hexachlorobenzene (HCB)	118-74-1	1.0	mg/kg		<3.0	----	<3.0	<1.0	<3.0
EP075H: Anilines and Benzidines									
Aniline	62-53-3	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
4-Chloroaniline	106-47-8	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
2-Nitroaniline	88-74-4	1.0	mg/kg		<3.0	----	<3.0	<1.0	<3.0
3-Nitroaniline	99-09-2	1.0	mg/kg		<3.0	----	<3.0	<1.0	<3.0
Dibenzofuran	132-64-9	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
4-Nitroaniline	100-01-8	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
Carbazole	86-74-8	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0
3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg		<3.0	----	<3.0	<0.5	<3.0

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH37@1.1	BH37@1.5	BH37@2.7	BH38@0.3	BH38@1.6
				Client sampling date / time	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-040	ES1904527-041	ES1904527-043	ES1904527-044	ES1904527-046
					Result	Result	Result	Result	Result
EP080/071: Total Petroleum Hydrocarbons									
C6 - C9 Fraction	----	10	mg/kg		<10	----	<10	<10	<10
C10 - C14 Fraction	----	50	mg/kg		<50	----	<50	<50	<50
C15 - C28 Fraction	----	100	mg/kg		**790**	----	**1990**	<100	<100
C29 - C36 Fraction	----	100	mg/kg		**1470**	----	**1170**	<100	<100
^ C10 - C36 Fraction (sum)	----	50	mg/kg		**2260**	----	**3160**	<50	<50
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions									
C6 - C10 Fraction	C6_C10	10	mg/kg		<10	----	<10	<10	<10
^ C6 - C10 Fraction minus BTEX (F1)	C6_C10-BTEX	10	mg/kg		<10	----	<10	<10	<10
>C10 - C16 Fraction	----	50	mg/kg		<50	----	**120**	<50	<50
>C16 - C34 Fraction	----	100	mg/kg		**1930**	----	**2820**	<100	<100
>C34 - C40 Fraction	----	100	mg/kg		**930**	----	**700**	<100	<100
^ >C10 - C40 Fraction (sum)	----	50	mg/kg		**2860**	----	**3640**	<50	<50
^ >C10 - C16 Fraction minus Naphthalene (F2)	----	50	mg/kg		<50	----	**120**	<50	<50
EP080: BTEXN									
Benzene	71-43-2	0.2	mg/kg		<0.2	----	<0.2	<0.2	<0.2
Toluene	108-88-3	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
Ethylbenzene	100-41-4	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
ortho-Xylene	95-47-6	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
^ Sum of BTEX	----	0.2	mg/kg		<0.2	----	<0.2	<0.2	<0.2
^ Total Xylenes	----	0.5	mg/kg		<0.5	----	<0.5	<0.5	<0.5
Naphthalene	91-20-3	1	mg/kg		<1	----	<1	<1	<1
EP231A: Perfluoroalkyl Sulfonic Acids									
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg		----	<0.0002	----	----	<0.0002
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg		----	<0.0002	----	----	<0.0002
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg		----	<0.0002	----	----	<0.0002
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg		----	<0.0002	----	----	<0.0002
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg		----	<0.0002	----	----	<0.0002

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH37@1.1	BH37@1.5	BH37@2.7	BH38@0.3	BH38@1.6
				Client sampling date / time	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-040	ES1904527-041	ES1904527-043	ES1904527-044	ES1904527-046
					Result	Result	Result	Result	Result
EP231A: Perfluoroalkyl Sulfonic Acids - Continued									
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	----	<0.0002	----	----	<0.0002	
EP231B: Perfluoroalkyl Carboxylic Acids									
Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	----	<0.001	----	----	<0.001	
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	----	<0.0002	----	----	<0.0002	
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	----	<0.0002	----	----	<0.0002	
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	----	<0.0002	----	----	<0.0002	
Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	----	<0.0002	----	----	<0.0002	
Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	----	<0.0002	----	----	<0.0002	
Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	----	<0.0002	----	----	<0.0002	
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	----	<0.0002	----	----	<0.0002	
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	----	<0.0002	----	----	<0.0002	
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg	----	<0.0002	----	----	<0.0002	
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	----	<0.0005	----	----	<0.0005	
EP231C: Perfluoroalkyl Sulfonamides									
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	----	<0.0002	----	----	<0.0002	
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	----	<0.0005	----	----	<0.0005	
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	----	<0.0005	----	----	<0.0005	
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	----	<0.0005	----	----	<0.0005	
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	----	<0.0005	----	----	<0.0005	
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	----	<0.0002	----	----	<0.0002	
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	----	<0.0002	----	----	<0.0002	
EP231D: (n:2) Fluorotelomer Sulfonic Acids									

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH37@1.1	BH37@1.5	BH37@2.7	BH38@0.3	BH38@1.6
				Client sampling date / time	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-040	ES1904527-041	ES1904527-043	ES1904527-044	ES1904527-046
					Result	Result	Result	Result	Result
EP231D: (n:2) Fluorotelomer Sulfonic Acids - Continued									
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg		----	<0.0005	----	----	<0.0005
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg		----	<0.0005	----	----	<0.0005
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg		----	<0.0005	----	----	<0.0005
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg		----	<0.0005	----	----	<0.0005
EP231P: PFAS Sums									
Sum of PFAS	----	0.0002	mg/kg		----	<0.0002	----	----	<0.0002
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	mg/kg		----	<0.0002	----	----	<0.0002
Sum of PFAS (WA DER List)	----	0.0002	mg/kg		----	<0.0002	----	----	<0.0002
EP066S: PCB Surrogate									
Decachlorobiphenyl	2051-24-3	0.1	%		71.6	----	79.8	115	70.7
EP068S: Organochlorine Pesticide Surrogate									
Dibromo-DDE	21655-73-2	0.05	%		65.5	----	70.7	109	83.9
EP068T: Organophosphorus Pesticide Surrogate									
DEF	78-48-8	0.05	%		63.3	----	65.4	73.2	66.9
EP074S: VOC Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.5	%		78.8	----	87.5	91.8	85.1
Toluene-D8	2037-26-5	0.5	%		85.2	----	86.9	102	96.9
4-Bromofluorobenzene	460-00-4	0.5	%		75.1	----	75.4	99.9	93.8
EP075S: Acid Extractable Surrogates									
2-Fluorophenol	367-12-4	0.5	%		83.1	----	94.2	95.1	92.3
Phenol-d6	13127-88-3	0.5	%		72.6	----	77.5	102	84.0
2-Chlorophenol-D4	93951-73-6	0.5	%		83.2	----	94.9	108	94.3
2.4.6-Tribromophenol	118-79-6	0.5	%		30.5	----	45.2	33.4	25.1
EP075T: Base/Neutral Extractable Surrogates									
Nitrobenzene-D5	4165-60-0	0.5	%		85.6	----	94.4	108	93.6
1.2-Dichlorobenzene-D4	2199-69-1	0.5	%		111	----	119	110	122
2-Fluorobiphenyl	321-60-8	0.5	%		91.8	----	99.8	113	102
Anthracene-d10	1719-06-8	0.5	%		91.0	----	96.9	106	107
4-Terphenyl-d14	1718-51-0	0.5	%		74.7	----	88.8	108	86.3

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH37@1.1	BH37@1.5	BH37@2.7	BH38@0.3	BH38@1.6
				Client sampling date / time	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-040	ES1904527-041	ES1904527-043	ES1904527-044	ES1904527-046
					Result	Result	Result	Result	Result
EP080S: TPH(V)/BTEX Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.2	%		**80.8**	**----**	**89.5**	**94.2**	**87.5**
Toluene-D8	2037-26-5	0.2	%		**83.1**	**----**	**84.5**	**100**	**94.3**
4-Bromofluorobenzene	460-00-4	0.2	%		**78.0**	**----**	**77.7**	**102**	**95.4**
EP231S: PFAS Surrogate									
13C4-PFOS	----	0.0002	%		**----**	**87.5**	**----**	**----**	**92.0**
13C8-PFOA	----	0.0002	%		**----**	**67.5**	**----**	**----**	**69.5**

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH39@0.3	BH39@2.5	BH40@0.3	BH41@2	BH41@2.4
			Client sampling date / time	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit	ES1904527-048	ES1904527-051	ES1904527-052	ES1904527-055	ES1904527-056
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	----	1.0	%	11.8	13.5	9.4	26.1	15.4
EA200: AS 4964 - 2004 Identification of Asbestos in Soils								
Asbestos Detected	1332-21-4	0.1	g/kg	No	----	No	No	----
Asbestos (Trace)	1332-21-4	5	Fibres	No	----	No	No	----
Asbestos Type	1332-21-4	-	--	-	----	-	-	----
Sample weight (dry)	----	0.01	g	128	----	88.8	45.2	----
APPROVED IDENTIFIER:	----	-	--	A. SMYLIE	----	A. SMYLIE	A. SMYLIE	----
EA200N: Asbestos Quantification (non-NATA)								
ø Asbestos (Fines and Fibrous <7mm)	1332-21-4	0.0004	g	<0.0004	----	<0.0004	<0.0004	----
ø Asbestos (Fines and Fibrous FA+AF)	----	0.001	% (w/w)	<0.001	----	<0.001	<0.001	----
ø Asbestos Containing Material	1332-21-4	0.1	g	<0.1	----	<0.1	<0.1	----
ø Asbestos Containing Material (as 15% Asbestos in ACM >7mm)	1332-21-4	0.01	% (w/w)	<0.01	----	<0.01	<0.01	----
ø Weight Used for % Calculation	----	0.0001	kg	0.128	----	0.0888	0.0452	----
ø Fibrous Asbestos >7mm	----	0.0004	g	<0.0004	----	<0.0004	<0.0004	----
EG005T: Total Metals by ICP-AES								
Arsenic	7440-38-2	5	mg/kg	<5	<5	8	47	6
Cadmium	7440-43-9	1	mg/kg	<1	<1	<1	2	<1
Chromium	7440-47-3	2	mg/kg	48	<2	26	42	<2
Copper	7440-50-8	5	mg/kg	104	<5	46	285	<5
Lead	7439-92-1	5	mg/kg	235	<5	80	72	<5
Nickel	7440-02-0	2	mg/kg	26	<2	28	225	<2
Zinc	7440-66-6	5	mg/kg	195	15	127	451	<5
EG035T: Total Recoverable Mercury by FIMS								
Mercury	7439-97-6	0.1	mg/kg	0.1	<0.1	<0.1	0.1	<0.1
EP066: Polychlorinated Biphenyls (PCB)								
Total Polychlorinated biphenyls	----	0.1	mg/kg	0.7	<0.1	0.3	<0.1	<0.1
EP068A: Organochlorine Pesticides (OC)								
alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
delta-BHC	319-86-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH39@0.3	BH39@2.5	BH40@0.3	BH41@2	BH41@2.4
				Client sampling date / time	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-048	ES1904527-051	ES1904527-052	ES1904527-055	ES1904527-056
					Result	Result	Result	Result	Result
EP068A: Organochlorine Pesticides (OC) - Continued									
Heptachlor	76-44-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Aldrin	309-00-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Heptachlor epoxide	1024-57-3	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
^ Total Chlordane (sum)	----	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
trans-Chlordane	5103-74-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
alpha-Endosulfan	959-98-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
cis-Chlordane	5103-71-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Dieldrin	60-57-1	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
4.4`-DDE	72-55-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Endrin	72-20-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
beta-Endosulfan	33213-65-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
^ Endosulfan (sum)	115-29-7	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
4.4`-DDD	72-54-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Endrin aldehyde	7421-93-4	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Endosulfan sulfate	1031-07-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
4.4`-DDT	50-29-3	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Endrin ketone	53494-70-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Methoxychlor	72-43-5	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
^ Sum of Aldrin + Dieldrin	309-00-2/60-57-1	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
^ Sum of DDD + DDE + DDT	72-54-8/72-55-9/50-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
EP068B: Organophosphorus Pesticides (OP)									
Dichlorvos	62-73-7	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Demeton-S-methyl	919-86-8	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Monocrotophos	6923-22-4	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Dimethoate	60-51-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Diazinon	333-41-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Parathion-methyl	298-00-0	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Malathion	121-75-5	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Fenthion	55-38-9	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Chlorpyrifos	2921-88-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Parathion	56-38-2	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Pirimphos-ethyl	23505-41-1	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Chlorfenvinphos	470-90-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH39@0.3	BH39@2.5	BH40@0.3	BH41@2	BH41@2.4
				Client sampling date / time	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-048	ES1904527-051	ES1904527-052	ES1904527-055	ES1904527-056
					Result	Result	Result	Result	Result
EP068B: Organophosphorus Pesticides (OP) - Continued									
Bromophos-ethyl	4824-78-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Fenamiphos	22224-92-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Prothiofos	34643-46-4	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Ethion	563-12-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Carbophenothion	786-19-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
Azinphos Methyl	86-50-0	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	<0.05
EP074A: Monocyclic Aromatic Hydrocarbons									
Styrene	100-42-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Isopropylbenzene	98-82-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
n-Propylbenzene	103-65-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
sec-Butylbenzene	135-98-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
tert-Butylbenzene	98-06-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
p-Isopropyltoluene	99-87-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
n-Butylbenzene	104-51-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074B: Oxygenated Compounds									
Vinyl Acetate	108-05-4	5	mg/kg		<5	<5	<5	<5	<5
2-Butanone (MEK)	78-93-3	5	mg/kg		<5	<5	<5	<5	<5
4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg		<5	<5	<5	<5	<5
2-Hexanone (MBK)	591-78-6	5	mg/kg		<5	<5	<5	<5	<5
EP074C: Sulfonated Compounds									
Carbon disulfide	75-15-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074D: Fumigants									
2.2-Dichloropropane	594-20-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichloropropane	78-87-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074E: Halogenated Aliphatic Compounds									
Dichlorodifluoromethane	75-71-8	5	mg/kg		<5	<5	<5	<5	<5
Chloromethane	74-87-3	5	mg/kg		<5	<5	<5	<5	<5
Vinyl chloride	75-01-4	5	mg/kg		<5	<5	<5	<5	<5
Bromomethane	74-83-9	5	mg/kg		<5	<5	<5	<5	<5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH39@0.3	BH39@2.5	BH40@0.3	BH41@2	BH41@2.4
				Client sampling date / time	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-048	ES1904527-051	ES1904527-052	ES1904527-055	ES1904527-056
					Result	Result	Result	Result	Result
EP074E: Halogenated Aliphatic Compounds - Continued									
Chloroethane	75-00-3	5	mg/kg		<5	<5	<5	<5	<5
Trichlorofluoromethane	75-69-4	5	mg/kg		<5	<5	<5	<5	<5
1.1-Dichloroethene	75-35-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Iodomethane	74-88-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1-Dichloroethane	75-34-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.1-Trichloroethane	71-55-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1-Dichloropropylene	563-58-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Carbon Tetrachloride	56-23-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichloroethane	107-06-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Trichloroethene	79-01-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dibromomethane	74-95-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.2-Trichloroethane	79-00-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.3-Dichloropropane	142-28-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Tetrachloroethene	127-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.3-Trichloropropane	96-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pentachloroethane	76-01-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074F: Halogenated Aromatic Compounds									
Chlorobenzene	108-90-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bromobenzene	108-86-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Chlorotoluene	95-49-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chlorotoluene	106-43-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074G: Trihalomethanes									
Chloroform	67-66-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bromodichloromethane	75-27-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dibromochloromethane	124-48-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bromoform	75-25-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH39@0.3	BH39@2.5	BH40@0.3	BH41@2	BH41@2.4
				Client sampling date / time	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-048	ES1904527-051	ES1904527-052	ES1904527-055	ES1904527-056
					Result	Result	Result	Result	Result
EP075A: Phenolic Compounds									
Phenol	108-95-2	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
2-Chlorophenol	95-57-8	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
2-Methylphenol	95-48-7	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
3- & 4-Methylphenol	1319-77-3	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
2-Nitrophenol	88-75-5	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
2.4-Dimethylphenol	105-67-9	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
2.4-Dichlorophenol	120-83-2	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
2.6-Dichlorophenol	87-65-0	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Pentachlorophenol	87-86-5	1	mg/kg		<1	<1	<1	<6	<1
EP075B: Polynuclear Aromatic Hydrocarbons									
Naphthalene	91-20-3	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
2-Methylnaphthalene	91-57-6	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
2-Chloronaphthalene	91-58-7	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Acenaphthylene	208-96-8	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Acenaphthene	83-32-9	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Fluorene	86-73-7	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Phenanthrene	85-01-8	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Anthracene	120-12-7	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Fluoranthene	206-44-0	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Pyrene	129-00-0	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Benz(a)anthracene	56-55-3	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Chrysene	218-01-9	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg		<1	<1	<1	<6	<1
7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Benzo(a)pyrene	50-32-8	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
3-Methylcholanthrene	56-49-5	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
^ Sum of PAHs	----	0.5	mg/kg		<0.5	<0.5	<0.5	<2.4	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH39@0.3	BH39@2.5	BH40@0.3	BH41@2	BH41@2.4
				Client sampling date / time	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-048	ES1904527-051	ES1904527-052	ES1904527-055	ES1904527-056
					Result	Result	Result	Result	Result
EP075B: Polynuclear Aromatic Hydrocarbons - Continued									
^ Benzo(a)pyrene TEQ (zero)	----	0.5	mg/kg		<0.5	<0.5	<0.5	<2.4	<0.5
^ Benzo(a)pyrene TEQ (half LOR)	----	0.5	mg/kg		**0.6**	**0.6**	**0.6**	<2.4	**0.6**
^ Benzo(a)pyrene TEQ (LOR)	----	0.5	mg/kg		**1.2**	**1.2**	**1.2**	<2.4	**1.2**
EP075C: Phthalate Esters									
Dimethyl phthalate	131-11-3	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Diethyl phthalate	84-66-2	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Di-n-butyl phthalate	84-74-2	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Butyl benzyl phthalate	85-68-7	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
bis(2-ethylhexyl) phthalate	117-81-7	5.0	mg/kg		<5.0	<5.0	<5.0	<5.0	<5.0
Di-n-octylphthalate	117-84-0	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
EP075D: Nitrosamines									
N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
N-Nitrosodiethylamine	55-18-5	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
N-Nitrosopyrrolidine	930-55-2	1.0	mg/kg		<1.0	<1.0	<1.0	<3.0	<1.0
N-Nitrosomorpholine	59-89-2	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
N-Nitrosopiperidine	100-75-4	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
N-Nitrosodibutylamine	924-16-3	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	1.0	mg/kg		<1.0	<1.0	<1.0	<6.0	<1.0
Methapyrilene	91-80-5	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
EP075E: Nitroaromatics and Ketones									
2-Picoline	109-06-8	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Acetophenone	98-86-2	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Nitrobenzene	98-95-3	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Isophorone	78-59-1	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
2.6-Dinitrotoluene	606-20-2	1.0	mg/kg		<1.0	<1.0	<1.0	<3.0	<1.0
2.4-Dinitrotoluene	121-14-2	1.0	mg/kg		<1.0	<1.0	<1.0	<3.0	<1.0
1-Naphthylamine	134-32-7	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
5-Nitro-o-toluidine	99-55-8	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Azobenzene	103-33-3	1	mg/kg		<1	<1	<1	<3	<1
1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Phenacetin	62-44-2	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH39@0.3	BH39@2.5	BH40@0.3	BH41@2	BH41@2.4
				Client sampling date / time	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-048	ES1904527-051	ES1904527-052	ES1904527-055	ES1904527-056
					Result	Result	Result	Result	Result
EP075E: Nitroaromatics and Ketones - Continued									
4-Aminobiphenyl	92-67-1	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Pentachloronitrobenzene	82-68-8	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Pronamide	23950-58-5	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Dimethylaminoazobenzene	60-11-7	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Chlorobenzilate	510-15-6	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
EP075F: Haloethers									
Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
EP075G: Chlorinated Hydrocarbons									
1.3-Dichlorobenzene	541-73-1	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
1.4-Dichlorobenzene	106-46-7	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
1.2-Dichlorobenzene	95-50-1	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Hexachloroethane	67-72-1	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Hexachloropropylene	1888-71-7	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Hexachlorobutadiene	87-68-3	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg		<2.5	<2.5	<2.5	<3.0	<2.5
Pentachlorobenzene	608-93-5	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Hexachlorobenzene (HCB)	118-74-1	1.0	mg/kg		<1.0	<1.0	<1.0	<3.0	<1.0
EP075H: Anilines and Benzidines									
Aniline	62-53-3	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
4-Chloroaniline	106-47-8	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
2-Nitroaniline	88-74-4	1.0	mg/kg		<1.0	<1.0	<1.0	<3.0	<1.0
3-Nitroaniline	99-09-2	1.0	mg/kg		<1.0	<1.0	<1.0	<3.0	<1.0
Dibenzofuran	132-64-9	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
4-Nitroaniline	100-01-8	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Carbazole	86-74-8	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
EP080/071: Total Petroleum Hydrocarbons									
C6 - C9 Fraction	----	10	mg/kg		<10	<10	<10	<10	<10
C10 - C14 Fraction	----	50	mg/kg		<50	<50	<50	<50	<50
C15 - C28 Fraction	----	100	mg/kg		<100	<100	**180**	<100	<100

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH39@0.3	BH39@2.5	BH40@0.3	BH41@2	BH41@2.4
				Client sampling date / time	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-048	ES1904527-051	ES1904527-052	ES1904527-055	ES1904527-056
					Result	Result	Result	Result	Result
EP080/071: Total Petroleum Hydrocarbons - Continued									
C29 - C36 Fraction	----	100	mg/kg		<100	<100	<100	<100	<100
^ C10 - C36 Fraction (sum)	----	50	mg/kg		<50	<50	180	<50	<50
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions									
C6 - C10 Fraction	C6_C10	10	mg/kg		<10	<10	<10	<10	<10
^ C6 - C10 Fraction minus BTEX (F1)	C6_C10-BTEX	10	mg/kg		<10	<10	<10	<10	<10
>C10 - C16 Fraction	----	50	mg/kg		<50	<50	<50	<50	<50
>C16 - C34 Fraction	----	100	mg/kg		<100	<100	220	<100	<100
>C34 - C40 Fraction	----	100	mg/kg		<100	<100	<100	<100	<100
^ >C10 - C40 Fraction (sum)	----	50	mg/kg		<50	<50	220	<50	<50
^ >C10 - C16 Fraction minus Naphthalene (F2)	----	50	mg/kg		<50	<50	<50	<50	<50
EP080: BTEXN									
Benzene	71-43-2	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
Toluene	108-88-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Ethylbenzene	100-41-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
ortho-Xylene	95-47-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
^ Sum of BTEX	----	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	<0.2
^ Total Xylenes	----	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Naphthalene	91-20-3	1	mg/kg		<1	<1	<1	<1	<1
EP066S: PCB Surrogate									
Decachlorobiphenyl	2051-24-3	0.1	%		92.2	91.1	89.2	70.7	92.6
EP068S: Organochlorine Pesticide Surrogate									
Dibromo-DDE	21655-73-2	0.05	%		100	105	91.4	87.1	74.2
EP068T: Organophosphorus Pesticide Surrogate									
DEF	78-48-8	0.05	%		83.5	89.2	91.3	98.7	73.2
EP074S: VOC Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.5	%		93.0	93.5	100	89.1	84.2
Toluene-D8	2037-26-5	0.5	%		107	105	113	100	104
4-Bromofluorobenzene	460-00-4	0.5	%		102	97.3	107	92.6	102
EP075S: Acid Extractable Surrogates									
2-Fluorophenol	367-12-4	0.5	%		101	71.6	99.5	84.8	95.6
Phenol-d6	13127-88-3	0.5	%		106	114	104	73.0	106

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH39@0.3	BH39@2.5	BH40@0.3	BH41@2	BH41@2.4
				Client sampling date / time	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-048	ES1904527-051	ES1904527-052	ES1904527-055	ES1904527-056
					Result	Result	Result	Result	Result
EP075S: Acid Extractable Surrogates - Continued									
2-Chlorophenol-D4	93951-73-6	0.5	%		110	120	108	92.0	109
2.4.6-Tribromophenol	118-79-6	0.5	%		40.4	40.6	49.2	25.6	97.7
EP075T: Base/Neutral Extractable Surrogates									
Nitrobenzene-D5	4165-60-0	0.5	%		111	109	106	90.0	117
1.2-Dichlorobenzene-D4	2199-69-1	0.5	%		108	102	105	118	119
2-Fluorobiphenyl	321-60-8	0.5	%		112	120	120	97.2	118
Anthracene-d10	1719-06-8	0.5	%		109	102	101	90.6	107
4-Terphenyl-d14	1718-51-0	0.5	%		113	105	112	73.4	121
EP080S: TPH(V)/BTEX Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.2	%		95.6	95.5	102	91.1	88.8
Toluene-D8	2037-26-5	0.2	%		105	102	110	97.3	100
4-Bromofluorobenzene	460-00-4	0.2	%		105	101	109	94.0	105

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH42@1.5	BH44@0.3	BH44@1	BH44@1.3	BH45@0.7 BH45@1.7
			Client sampling date / time	12-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00
Compound	CAS Number	LOR	Unit	ES1904527-058	ES1904527-061	ES1904527-062	ES1904527-064	ES1904527-066
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	----	0.1	%	----	----	8.0	----	----
Moisture Content	----	1.0	%	24.5	12.0	----	10.8	9.7
EA200: AS 4964 - 2004 Identification of Asbestos in Soils								
Asbestos Detected	1332-21-4	0.1	g/kg	No	No	----	----	No
Asbestos (Trace)	1332-21-4	5	Fibres	No	No	----	----	No
Asbestos Type	1332-21-4	-	--	-	-	----	----	-
Sample weight (dry)	----	0.01	g	50.8	67.3	----	----	96.4
APPROVED IDENTIFIER:	----	-	--	A. SMYLIE	A. SMYLIE	----	----	A. SMYLIE
EA200N: Asbestos Quantification (non-NATA)								
ø Asbestos (Fines and Fibrous <7mm)	1332-21-4	0.0004	g	<0.0004	<0.0004	----	----	<0.0004
ø Asbestos (Fines and Fibrous FA+AF)	----	0.001	% (w/w)	<0.001	<0.001	----	----	<0.001
ø Asbestos Containing Material	1332-21-4	0.1	g	<0.1	<0.1	----	----	<0.1
ø Asbestos Containing Material (as 15% Asbestos in ACM >7mm)	1332-21-4	0.01	% (w/w)	<0.01	<0.01	----	----	<0.01
ø Weight Used for % Calculation	----	0.0001	kg	0.0508	0.0673	----	----	0.0964
ø Fibrous Asbestos >7mm	----	0.0004	g	<0.0004	<0.0004	----	----	<0.0004
EG005T: Total Metals by ICP-AES								
Arsenic	7440-38-2	5	mg/kg	40	<5	----	<5	6
Cadmium	7440-43-9	1	mg/kg	<1	<1	----	<1	<1
Chromium	7440-47-3	2	mg/kg	19	9	----	10	7
Copper	7440-50-8	5	mg/kg	154	160	----	35	124
Lead	7439-92-1	5	mg/kg	98	116	----	42	215
Nickel	7440-02-0	2	mg/kg	54	6	----	9	5
Zinc	7440-66-6	5	mg/kg	241	195	----	80	472
EG035T: Total Recoverable Mercury by FIMS								
Mercury	7439-97-6	0.1	mg/kg	0.1	<0.1	----	<0.1	0.1
EP066: Polychlorinated Biphenyls (PCB)								
Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	<0.1	----	<0.1	<0.1
EP068A: Organochlorine Pesticides (OC)								
alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	----	<0.05	<0.05
Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	----	<0.05	<0.05
beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	----	<0.05	<0.05
gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	----	<0.05	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH42@1.5	BH44@0.3	BH44@1	BH44@1.3	BH45@0.7 BH45@1.7
				Client sampling date / time	12-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-058	ES1904527-061	ES1904527-062	ES1904527-064	ES1904527-066
					Result	Result	Result	Result	Result
EP068A: Organochlorine Pesticides (OC) - Continued									
delta-BHC	319-86-8	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
Heptachlor	76-44-8	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
Aldrin	309-00-2	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
Heptachlor epoxide	1024-57-3	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
^ **Total Chlordane (sum)**	----	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
trans-Chlordane	5103-74-2	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
alpha-Endosulfan	959-98-8	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
cis-Chlordane	5103-71-9	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
Dieldrin	60-57-1	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
4.4`-DDE	72-55-9	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
Endrin	72-20-8	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
beta-Endosulfan	33213-65-9	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
^ **Endosulfan (sum)**	115-29-7	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
4.4`-DDD	72-54-8	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
Endrin aldehyde	7421-93-4	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
Endosulfan sulfate	1031-07-8	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
4.4`-DDT	50-29-3	0.2	mg/kg		<0.2	<0.2	----	<0.2	<0.2
Endrin ketone	53494-70-5	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
Methoxychlor	72-43-5	0.2	mg/kg		<0.2	<0.2	----	<0.2	<0.2
^ **Sum of Aldrin + Dieldrin**	309-00-2/60-57-1	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
^ **Sum of DDD + DDE + DDT**	72-54-8/72-55-9/50-2	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
EP068B: Organophosphorus Pesticides (OP)									
Dichlorvos	62-73-7	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
Demeton-S-methyl	919-86-8	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
Monocrotophos	6923-22-4	0.2	mg/kg		<0.2	<0.2	----	<0.2	<0.2
Dimethoate	60-51-5	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
Diazinon	333-41-5	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
Parathion-methyl	298-00-0	0.2	mg/kg		<0.2	<0.2	----	<0.2	<0.2
Malathion	121-75-5	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
Fenthion	55-38-9	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
Chlorpyrifos	2921-88-2	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
Parathion	56-38-2	0.2	mg/kg		<0.2	<0.2	----	<0.2	<0.2

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH42@1.5	BH44@0.3	BH44@1	BH44@1.3	BH45@0.7 BH45@1.7
				Client sampling date / time	12-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-058	ES1904527-061	ES1904527-062	ES1904527-064	ES1904527-066
					Result	Result	Result	Result	Result
EP068B: Organophosphorus Pesticides (OP) - Continued									
Pirimphos-ethyl	23505-41-1	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
Chlorfenvinphos	470-90-6	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
Bromophos-ethyl	4824-78-6	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
Fenamiphos	22224-92-6	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
Prothiofos	34643-46-4	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
Ethion	563-12-2	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
Carbophenothion	786-19-6	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
Azinphos Methyl	86-50-0	0.05	mg/kg		<0.05	<0.05	----	<0.05	<0.05
EP074A: Monocyclic Aromatic Hydrocarbons									
Styrene	100-42-5	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
Isopropylbenzene	98-82-8	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
n-Propylbenzene	103-65-1	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
sec-Butylbenzene	135-98-8	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
tert-Butylbenzene	98-06-6	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
p-Isopropyltoluene	99-87-6	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
n-Butylbenzene	104-51-8	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
EP074B: Oxygenated Compounds									
Vinyl Acetate	108-05-4	5	mg/kg		<5	<5	----	<5	<5
2-Butanone (MEK)	78-93-3	5	mg/kg		<5	<5	----	<5	<5
4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg		<5	<5	----	<5	<5
2-Hexanone (MBK)	591-78-6	5	mg/kg		<5	<5	----	<5	<5
EP074C: Sulfonated Compounds									
Carbon disulfide	75-15-0	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
EP074D: Fumigants									
2.2-Dichloropropane	594-20-7	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
1.2-Dichloropropane	78-87-5	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
EP074E: Halogenated Aliphatic Compounds									
Dichlorodifluoromethane	75-71-8	5	mg/kg		<5	<5	----	<5	<5
Chloromethane	74-87-3	5	mg/kg		<5	<5	----	<5	<5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH42@1.5	BH44@0.3	BH44@1	BH44@1.3	BH45@0.7 BH45@1.7
				Client sampling date / time	12-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-058	ES1904527-061	ES1904527-062	ES1904527-064	ES1904527-066
					Result	Result	Result	Result	Result
EP074E: Halogenated Aliphatic Compounds - Continued									
Vinyl chloride	75-01-4	5	mg/kg		<5	<5	----	<5	<5
Bromomethane	74-83-9	5	mg/kg		<5	<5	----	<5	<5
Chloroethane	75-00-3	5	mg/kg		<5	<5	----	<5	<5
Trichlorofluoromethane	75-69-4	5	mg/kg		<5	<5	----	<5	<5
1.1-Dichloroethene	75-35-4	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
Iodomethane	74-88-4	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
1.1-Dichloroethane	75-34-3	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
1.1.1-Trichloroethane	71-55-6	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
1.1-Dichloropropylene	563-58-6	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
Carbon Tetrachloride	56-23-5	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
1.2-Dichloroethane	107-06-2	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
Trichloroethene	79-01-6	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
Dibromomethane	74-95-3	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
1.1.2-Trichloroethane	79-00-5	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
1.3-Dichloropropane	142-28-9	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
Tetrachloroethene	127-18-4	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
1.2.3-Trichloropropane	96-18-4	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
Pentachloroethane	76-01-7	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
EP074F: Halogenated Aromatic Compounds									
Chlorobenzene	108-90-7	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
Bromobenzene	108-86-1	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
2-Chlorotoluene	95-49-8	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
4-Chlorotoluene	106-43-4	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
EP074G: Trihalomethanes									
Chloroform	67-66-3	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
Bromodichloromethane	75-27-4	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH42@1.5	BH44@0.3	BH44@1	BH44@1.3	BH45@0.7 BH45@1.7
			Client sampling date / time	12-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00
Compound	CAS Number	LOR	Unit	ES1904527-058	ES1904527-061	ES1904527-062	ES1904527-064	ES1904527-066
				Result	Result	Result	Result	Result
EP074G: Trihalomethanes - Continued								
Dibromochloromethane	124-48-1	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
Bromoform	75-25-2	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
EP075A: Phenolic Compounds								
Phenol	108-95-2	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
2-Chlorophenol	95-57-8	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
2-Methylphenol	95-48-7	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
3- & 4-Methylphenol	1319-77-3	0.5	mg/kg	<0.5	<0.5	----	0.9	<0.5
2-Nitrophenol	88-75-5	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
2.4-Dimethylphenol	105-67-9	0.5	mg/kg	<0.5	<0.5	----	0.7	<0.5
2.4-Dichlorophenol	120-83-2	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
2.6-Dichlorophenol	87-65-0	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
Pentachlorophenol	87-86-5	1	mg/kg	<1	<1	----	<1	<1
EP075B: Polynuclear Aromatic Hydrocarbons								
Naphthalene	91-20-3	0.5	mg/kg	<0.5	1.0	----	3.6	<0.5
2-Methylnaphthalene	91-57-6	0.5	mg/kg	<0.5	0.5	----	2.3	<0.5
2-Chloronaphthalene	91-58-7	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
Acenaphthylene	208-96-8	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
Acenaphthene	83-32-9	0.5	mg/kg	<0.5	0.8	----	4.0	<0.5
Fluorene	86-73-7	0.5	mg/kg	<0.5	0.8	----	3.6	<0.5
Phenanthrene	85-01-8	0.5	mg/kg	<0.5	9.2	----	44.5	4.1
Anthracene	120-12-7	0.5	mg/kg	<0.5	1.4	----	6.5	1.0
Fluoranthene	206-44-0	0.5	mg/kg	<0.5	9.7	----	35.9	7.5
Pyrene	129-00-0	0.5	mg/kg	<0.5	10.6	----	37.5	7.0
N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
Benz(a)anthracene	56-55-3	0.5	mg/kg	<0.5	4.5	----	13.9	4.1
Chrysene	218-01-9	0.5	mg/kg	<0.5	5.2	----	13.3	3.0
Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg	<1	6	----	17	5
7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
Benzo(a)pyrene	50-32-8	0.5	mg/kg	<0.5	3.8	----	9.6	3.3
3-Methylcholanthrene	56-49-5	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH42@1.5	BH44@0.3	BH44@1	BH44@1.3	BH45@0.7 BH45@1.7
				Client sampling date / time	12-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-058	ES1904527-061	ES1904527-062	ES1904527-064	ES1904527-066
					Result	Result	Result	Result	Result
EP075B: Polynuclear Aromatic Hydrocarbons - Continued									
Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg		<0.5	**1.2**	----	**2.8**	**1.4**
Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg		<0.5	<0.5	----	**0.7**	<0.5
Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg		<0.5	**2.1**	----	**3.8**	**1.7**
^ Sum of PAHs	----	0.5	mg/kg		<0.5	**56.3**	----	**197**	**38.1**
^ Benzo(a)pyrene TEQ (zero)	----	0.5	mg/kg		<0.5	**5.0**	----	**13.8**	**4.4**
^ Benzo(a)pyrene TEQ (half LOR)	----	0.5	mg/kg		**0.6**	**5.3**	----	**13.8**	**4.6**
^ Benzo(a)pyrene TEQ (LOR)	----	0.5	mg/kg		**1.2**	**5.5**	----	**13.8**	**4.9**
EP075C: Phthalate Esters									
Dimethyl phthalate	131-11-3	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
Diethyl phthalate	84-66-2	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
Di-n-butyl phthalate	84-74-2	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
Butyl benzyl phthalate	85-68-7	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
bis(2-ethylhexyl) phthalate	117-81-7	5.0	mg/kg		<5.0	<5.0	----	<5.0	<5.0
Di-n-octylphthalate	117-84-0	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
EP075D: Nitrosamines									
N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
N-Nitrosodiethylamine	55-18-5	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
N-Nitrosopyrrolidine	930-55-2	1.0	mg/kg		<1.0	<1.0	----	<1.0	<1.0
N-Nitrosomorpholine	59-89-2	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
N-Nitrosopiperidine	100-75-4	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
N-Nitrosodibutylamine	924-16-3	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	1.0	mg/kg		<1.0	<1.0	----	<1.0	<1.0
Methapyrilene	91-80-5	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
EP075E: Nitroaromatics and Ketones									
2-Picoline	109-06-8	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
Acetophenone	98-86-2	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
Nitrobenzene	98-95-3	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
Isophorone	78-59-1	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
2.6-Dinitrotoluene	606-20-2	1.0	mg/kg		<1.0	<1.0	----	<1.0	<1.0
2.4-Dinitrotoluene	121-14-2	1.0	mg/kg		<1.0	<1.0	----	<1.0	<1.0
1-Naphthylamine	134-32-7	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH42@1.5	BH44@0.3	BH44@1	BH44@1.3	BH45@0.7 BH45@1.7
			Client sampling date / time	12-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00
Compound	CAS Number	LOR	Unit	ES1904527-058	ES1904527-061	ES1904527-062	ES1904527-064	ES1904527-066
				Result	Result	Result	Result	Result
EP075E: Nitroaromatics and Ketones - Continued								
5-Nitro-o-toluidine	99-55-8	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
Azobenzene	103-33-3	1	mg/kg	<1	<1	----	<1	<1
1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
Phenacetin	62-44-2	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
4-Aminobiphenyl	92-67-1	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
Pentachloronitrobenzene	82-68-8	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
Pronamide	23950-58-5	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
Dimethylaminoazobenzene	60-11-7	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
Chlorobenzilate	510-15-6	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
EP075F: Haloethers								
Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
EP075G: Chlorinated Hydrocarbons								
1.3-Dichlorobenzene	541-73-1	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
1.4-Dichlorobenzene	106-46-7	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
1.2-Dichlorobenzene	95-50-1	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
Hexachloroethane	67-72-1	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
Hexachloropropylene	1888-71-7	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
Hexachlorobutadiene	87-68-3	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg	<2.5	<2.5	----	<2.5	<2.5
Pentachlorobenzene	608-93-5	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
Hexachlorobenzene (HCB)	118-74-1	1.0	mg/kg	<1.0	<1.0	----	<1.0	<1.0
EP075H: Anilines and Benzidines								
Aniline	62-53-3	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
4-Chloroaniline	106-47-8	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
2-Nitroaniline	88-74-4	1.0	mg/kg	<1.0	<1.0	----	<1.0	<1.0
3-Nitroaniline	99-09-2	1.0	mg/kg	<1.0	<1.0	----	<1.0	<1.0
Dibenzofuran	132-64-9	0.5	mg/kg	<0.5	<0.5	----	**2.8**	<0.5
4-Nitroaniline	100-01-8	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5
Carbazole	86-74-8	0.5	mg/kg	<0.5	**1.2**	----	**5.6**	**0.9**
3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg	<0.5	<0.5	----	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH42@1.5	BH44@0.3	BH44@1	BH44@1.3	BH45@0.7 BH45@1.7
				Client sampling date / time	12-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-058	ES1904527-061	ES1904527-062	ES1904527-064	ES1904527-066
					Result	Result	Result	Result	Result
EP080/071: Total Petroleum Hydrocarbons									
C6 - C9 Fraction	----	10	mg/kg		<10	<10	----	<10	<10
C10 - C14 Fraction	----	50	mg/kg		<50	<50	----	<50	<50
C15 - C28 Fraction	----	100	mg/kg		<100	**320**	----	**970**	**130**
C29 - C36 Fraction	----	100	mg/kg		<100	**180**	----	**440**	<100
^ **C10 - C36 Fraction (sum)**	----	50	mg/kg		<50	**500**	----	**1410**	**130**
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions									
C6 - C10 Fraction	C6_C10	10	mg/kg		<10	<10	----	<10	<10
^ **C6 - C10 Fraction minus BTEX (F1)**	C6_C10-BTEX	10	mg/kg		<10	<10	----	<10	<10
>C10 - C16 Fraction	----	50	mg/kg		<50	<50	----	<50	<50
>C16 - C34 Fraction	----	100	mg/kg		<100	**440**	----	**1300**	**200**
>C34 - C40 Fraction	----	100	mg/kg		<100	**100**	----	**210**	<100
^ **>C10 - C40 Fraction (sum)**	----	50	mg/kg		<50	**540**	----	**1510**	**200**
^ **>C10 - C16 Fraction minus Naphthalene (F2)**	----	50	mg/kg		<50	<50	----	<50	<50
EP080: BTEXN									
Benzene	71-43-2	0.2	mg/kg		<0.2	<0.2	----	<0.2	<0.2
Toluene	108-88-3	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
Ethylbenzene	100-41-4	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
ortho-Xylene	95-47-6	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
^ **Sum of BTEX**	----	0.2	mg/kg		<0.2	<0.2	----	<0.2	<0.2
^ **Total Xylenes**	----	0.5	mg/kg		<0.5	<0.5	----	<0.5	<0.5
Naphthalene	91-20-3	1	mg/kg		<1	<1	----	<1	<1
EP231A: Perfluoroalkyl Sulfonic Acids									
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg		----	----	<0.0002	----	----
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg		----	----	<0.0002	----	----
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg		----	----	<0.0002	----	----
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg		----	----	<0.0002	----	----
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg		----	----	<0.0002	----	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH42@1.5	BH44@0.3	BH44@1	BH44@1.3	BH45@0.7 BH45@1.7
				Client sampling date / time	12-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-058	ES1904527-061	ES1904527-062	ES1904527-064	ES1904527-066
					Result	Result	Result	Result	Result
EP231A: Perfluoroalkyl Sulfonic Acids - Continued									
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg		----	----	<0.0002	----	----
EP231B: Perfluoroalkyl Carboxylic Acids									
Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg		----	----	<0.001	----	----
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg		----	----	<0.0002	----	----
Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg		----	----	<0.0002	----	----
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg		----	----	<0.0002	----	----
Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg		----	----	<0.0002	----	----
Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg		----	----	<0.0002	----	----
Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg		----	----	<0.0002	----	----
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg		----	----	<0.0002	----	----
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg		----	----	<0.0002	----	----
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg		----	----	<0.0002	----	----
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg		----	----	<0.0005	----	----
EP231C: Perfluoroalkyl Sulfonamides									
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg		----	----	<0.0002	----	----
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg		----	----	<0.0005	----	----
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg		----	----	<0.0005	----	----
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg		----	----	<0.0005	----	----
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg		----	----	<0.0005	----	----
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg		----	----	<0.0002	----	----
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg		----	----	<0.0002	----	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH42@1.5	BH44@0.3	BH44@1	BH44@1.3	BH45@0.7 BH45@1.7
				Client sampling date / time	12-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-058	ES1904527-061	ES1904527-062	ES1904527-064	ES1904527-066
					Result	Result	Result	Result	Result
EP231D: (n:2) Fluorotelomer Sulfonic Acids									
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg		----	----	<0.0005	----	----
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg		----	----	<0.0005	----	----
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg		----	----	<0.0005	----	----
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg		----	----	<0.0005	----	----
EP231P: PFAS Sums									
Sum of PFAS	----	0.0002	mg/kg		----	----	<0.0002	----	----
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.0002	mg/kg		----	----	<0.0002	----	----
Sum of PFAS (WA DER List)	----	0.0002	mg/kg		----	----	<0.0002	----	----
EP066S: PCB Surrogate									
Decachlorobiphenyl	2051-24-3	0.1	%		**93.1**	**90.1**	----	**74.2**	**102**
EP068S: Organochlorine Pesticide Surrogate									
Dibromo-DDE	21655-73-2	0.05	%		**95.7**	**83.3**	----	**62.8**	**92.0**
EP068T: Organophosphorus Pesticide Surrogate									
DEF	78-48-8	0.05	%		**83.2**	**98.4**	----	**65.9**	**99.7**
EP074S: VOC Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.5	%		**86.7**	**95.2**	----	**102**	**93.0**
Toluene-D8	2037-26-5	0.5	%		**81.8**	**119**	----	**124**	**111**
4-Bromofluorobenzene	460-00-4	0.5	%		**67.0**	**113**	----	**114**	**106**
EP075S: Acid Extractable Surrogates									
2-Fluorophenol	367-12-4	0.5	%		**105**	**83.5**	----	**104**	**77.4**
Phenol-d6	13127-88-3	0.5	%		**106**	**91.9**	----	**110**	**101**
2-Chlorophenol-D4	93951-73-6	0.5	%		**114**	**110**	----	**113**	**116**
2.4.6-Tribromophenol	118-79-6	0.5	%		**98.4**	**118**	----	**73.5**	**119**
EP075T: Base/Neutral Extractable Surrogates									
Nitrobenzene-D5	4165-60-0	0.5	%		**112**	**108**	----	**112**	**119**
1.2-Dichlorobenzene-D4	2199-69-1	0.5	%		**109**	**107**	----	**111**	**117**
2-Fluorobiphenyl	321-60-8	0.5	%		**117**	**120**	----	**115**	**113**
Anthracene-d10	1719-06-8	0.5	%		**54.0**	**101**	----	**93.9**	**107**
4-Terphenyl-d14	1718-51-0	0.5	%		**71.9**	**116**	----	**103**	**123**

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH42@1.5	BH44@0.3	BH44@1	BH44@1.3	BH45@0.7 BH45@1.7
				Client sampling date / time	12-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-058	ES1904527-061	ES1904527-062	ES1904527-064	ES1904527-066
					Result	Result	Result	Result	Result
EP080S: TPH(V)/BTEX Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.2	%		91.8	100	----	108	98.0
Toluene-D8	2037-26-5	0.2	%		81.8	115	----	120	108
4-Bromofluorobenzene	460-00-4	0.2	%		72.6	117	----	119	109
EP231S: PFAS Surrogate									
13C4-PFOS	----	0.0002	%		----	----	99.0	----	----
13C8-PFOA	----	0.0002	%		----	----	84.5	----	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH45@2.2	BH46@0.3	BH47@1.3	BH47@2.4	BH48@0.1 BH48@1.0
			Client sampling date / time	11-Feb-2019 00:00	12-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit	ES1904527-069	ES1904527-071	ES1904527-076	ES1904527-079	ES1904527-080
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	----	1.0	%	5.7	6.0	16.5	10.1	15.7
EA200: AS 4964 - 2004 Identification of Asbestos in Soils								
Asbestos Detected	1332-21-4	0.1	g/kg	----	No	No	----	No
Asbestos (Trace)	1332-21-4	5	Fibres	----	No	No	----	No
Asbestos Type	1332-21-4	-	--	----	-	-	----	-
Sample weight (dry)	----	0.01	g	----	68.0	25.0	----	17.6
APPROVED IDENTIFIER:	----	-	--	----	A. SMYLIE	A. SMYLIE	----	A. SMYLIE
Synthetic Mineral Fibre	----	0.1	g/kg	----	----	No	----	----
Organic Fibre	----	0.1	g/kg	----	----	No	----	----
EA200N: Asbestos Quantification (non-NATA)								
ø Asbestos (Fines and Fibrous <7mm)	1332-21-4	0.0004	g	----	<0.0004	----	----	<0.0004
ø Asbestos (Fines and Fibrous FA+AF)	----	0.001	% (w/w)	----	<0.001	----	----	<0.001
ø Asbestos Containing Material	1332-21-4	0.1	g	----	<0.1	----	----	<0.1
ø Asbestos Containing Material (as 15% Asbestos in ACM >7mm)	1332-21-4	0.01	% (w/w)	----	<0.01	----	----	<0.01
ø Weight Used for % Calculation	----	0.0001	kg	----	0.0680	----	----	0.0176
ø Fibrous Asbestos >7mm	----	0.0004	g	----	<0.0004	----	----	<0.0004
EG005T: Total Metals by ICP-AES								
Arsenic	7440-38-2	5	mg/kg	<5	<5	11	<5	<5
Cadmium	7440-43-9	1	mg/kg	<1	<1	<1	<1	<1
Chromium	7440-47-3	2	mg/kg	<2	4	6	<2	20
Copper	7440-50-8	5	mg/kg	<5	<5	7	<5	136
Lead	7439-92-1	5	mg/kg	<5	13	31	<5	72
Nickel	7440-02-0	2	mg/kg	<2	<2	2	<2	14
Zinc	7440-66-6	5	mg/kg	<5	8	49	<5	271
EG035T: Total Recoverable Mercury by FIMS								
Mercury	7439-97-6	0.1	mg/kg	<0.1	<0.1	<0.1	<0.1	0.5
EP066: Polychlorinated Biphenyls (PCB)								
Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	<0.1	<0.1	<0.2	<0.1
EP068A: Organochlorine Pesticides (OC)								
alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH45@2.2	BH46@0.3	BH47@1.3	BH47@2.4	BH48@0.1 BH48@1.0
			Client sampling date / time	11-Feb-2019 00:00	12-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit	ES1904527-069	ES1904527-071	ES1904527-076	ES1904527-079	ES1904527-080
				Result	Result	Result	Result	Result
EP068A: Organochlorine Pesticides (OC) - Continued								
gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
delta-BHC	319-86-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
Heptachlor	76-44-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
Aldrin	309-00-2	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
Heptachlor epoxide	1024-57-3	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
^ Total Chlordane (sum)	----	0.05	mg/kg	<0.05	<0.05	<0.05	<0.08	<0.05
trans-Chlordane	5103-74-2	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
alpha-Endosulfan	959-98-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
cis-Chlordane	5103-71-9	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
Dieldrin	60-57-1	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
4.4`-DDE	72-55-9	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
Endrin	72-20-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
beta-Endosulfan	33213-65-9	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
^ Endosulfan (sum)	115-29-7	0.05	mg/kg	<0.05	<0.05	<0.05	<0.15	<0.05
4.4`-DDD	72-54-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
Endrin aldehyde	7421-93-4	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
Endosulfan sulfate	1031-07-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
4.4`-DDT	50-29-3	0.2	mg/kg	<0.2	<0.2	<0.2	<1.0	<0.2
Endrin ketone	53494-70-5	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
Methoxychlor	72-43-5	0.2	mg/kg	<0.2	<0.2	<0.2	<1.0	<0.2
^ Sum of Aldrin + Dieldrin	309-00-2/60-57-1	0.05	mg/kg	<0.05	<0.05	<0.05	<0.08	<0.05
^ Sum of DDD + DDE + DDT	72-54-8/72-55-9/50-2	0.05	mg/kg	<0.05	<0.05	<0.05	<0.08	<0.05
EP068B: Organophosphorus Pesticides (OP)								
Dichlorvos	62-73-7	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
Demeton-S-methyl	919-86-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
Monocrotophos	6923-22-4	0.2	mg/kg	<0.2	<0.2	<0.2	<1.0	<0.2
Dimethoate	60-51-5	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
Diazinon	333-41-5	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
Parathion-methyl	298-00-0	0.2	mg/kg	<0.2	<0.2	<0.2	<1.0	<0.2
Malathion	121-75-5	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
Fenthion	55-38-9	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
Chlorpyrifos	2921-88-2	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH45@2.2	BH46@0.3	BH47@1.3	BH47@2.4	BH48@0.1 BH48@1.0
			Client sampling date / time	11-Feb-2019 00:00	12-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit	ES1904527-069	ES1904527-071	ES1904527-076	ES1904527-079	ES1904527-080
				Result	Result	Result	Result	Result
EP068B: Organophosphorus Pesticides (OP) - Continued								
Parathion	56-38-2	0.2	mg/kg	<0.2	<0.2	<0.2	<1.0	<0.2
Pirimphos-ethyl	23505-41-1	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
Chlorfenvinphos	470-90-6	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
Bromophos-ethyl	4824-78-6	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
Fenamiphos	22224-92-6	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
Prothiofos	34643-46-4	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
Ethion	563-12-2	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
Carbophenothion	786-19-6	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
Azinphos Methyl	86-50-0	0.05	mg/kg	<0.05	<0.05	<0.05	<0.25	<0.05
EP074A: Monocyclic Aromatic Hydrocarbons								
Styrene	100-42-5	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
Isopropylbenzene	98-82-8	0.5	mg/kg	<0.5	<0.5	<0.5	**11.6**	<0.5
n-Propylbenzene	103-65-1	0.5	mg/kg	<0.5	<0.5	<0.5	**40.0**	<0.5
1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg	<0.5	<0.5	<0.5	**43.6**	<0.5
sec-Butylbenzene	135-98-8	0.5	mg/kg	<0.5	<0.5	<0.5	**12.3**	<0.5
1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg	<0.5	<0.5	<0.5	**146**	<0.5
tert-Butylbenzene	98-06-6	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
p-Isopropyltoluene	99-87-6	0.5	mg/kg	<0.5	<0.5	<0.5	**6.5**	<0.5
n-Butylbenzene	104-51-8	0.5	mg/kg	<0.5	<0.5	<0.5	**22.0**	<0.5
EP074B: Oxygenated Compounds								
Vinyl Acetate	108-05-4	5	mg/kg	<5	<5	<5	<5	<5
2-Butanone (MEK)	78-93-3	5	mg/kg	<5	<5	<5	<5	<5
4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg	<5	<5	<5	<5	<5
2-Hexanone (MBK)	591-78-6	5	mg/kg	<5	<5	<5	<5	<5
EP074C: Sulfonated Compounds								
Carbon disulfide	75-15-0	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
EP074D: Fumigants								
2.2-Dichloropropane	594-20-7	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichloropropane	78-87-5	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg	<0.5	<0.5	<0.5	<0.5	<0.5
EP074E: Halogenated Aliphatic Compounds								
Dichlorodifluoromethane	75-71-8	5	mg/kg	<5	<5	<5	<5	<5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH45@2.2	BH46@0.3	BH47@1.3	BH47@2.4	BH48@0.1 BH48@1.0
				Client sampling date / time	11-Feb-2019 00:00	12-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-069	ES1904527-071	ES1904527-076	ES1904527-079	ES1904527-080
					Result	Result	Result	Result	Result
EP074E: Halogenated Aliphatic Compounds - Continued									
Chloromethane	74-87-3	5	mg/kg		<5	<5	<5	<5	<5
Vinyl chloride	75-01-4	5	mg/kg		<5	<5	<5	<5	<5
Bromomethane	74-83-9	5	mg/kg		<5	<5	<5	<5	<5
Chloroethane	75-00-3	5	mg/kg		<5	<5	<5	<5	<5
Trichlorofluoromethane	75-69-4	5	mg/kg		<5	<5	<5	<5	<5
1.1-Dichloroethene	75-35-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Iodomethane	74-88-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1-Dichloroethane	75-34-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.1-Trichloroethane	71-55-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1-Dichloropropylene	563-58-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Carbon Tetrachloride	56-23-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dichloroethane	107-06-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Trichloroethene	79-01-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dibromomethane	74-95-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.2-Trichloroethane	79-00-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.3-Dichloropropane	142-28-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Tetrachloroethene	127-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.3-Trichloropropane	96-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Pentachloroethane	76-01-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074F: Halogenated Aromatic Compounds									
Chlorobenzene	108-90-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bromobenzene	108-86-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
2-Chlorotoluene	95-49-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
4-Chlorotoluene	106-43-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP074G: Trihalomethanes									
Chloroform	67-66-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH45@2.2	BH46@0.3	BH47@1.3	BH47@2.4	BH48@0.1 BH48@1.0
				Client sampling date / time	11-Feb-2019 00:00	12-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-069	ES1904527-071	ES1904527-076	ES1904527-079	ES1904527-080
					Result	Result	Result	Result	Result
EP074G: Trihalomethanes - Continued									
Bromodichloromethane	75-27-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Dibromochloromethane	124-48-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
Bromoform	75-25-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	<0.5
EP075A: Phenolic Compounds									
Phenol	108-95-2	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
2-Chlorophenol	95-57-8	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
2-Methylphenol	95-48-7	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
3- & 4-Methylphenol	1319-77-3	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
2-Nitrophenol	88-75-5	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
2.4-Dimethylphenol	105-67-9	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
2.4-Dichlorophenol	120-83-2	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
2.6-Dichlorophenol	87-65-0	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Pentachlorophenol	87-86-5	1	mg/kg		<1	<1	<1	<6	<1
EP075B: Polynuclear Aromatic Hydrocarbons									
Naphthalene	91-20-3	0.5	mg/kg		<0.5	<0.5	<0.5	**15.1**	<0.5
2-Methylnaphthalene	91-57-6	0.5	mg/kg		**0.5**	<0.5	<0.5	**19.2**	<0.5
2-Chloronaphthalene	91-58-7	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Acenaphthylene	208-96-8	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Acenaphthene	83-32-9	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Fluorene	86-73-7	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Phenanthrene	85-01-8	0.5	mg/kg		<0.5	<0.5	**0.7**	<3.0	<0.5
Anthracene	120-12-7	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Fluoranthene	206-44-0	0.5	mg/kg		<0.5	<0.5	**1.2**	<3.0	<0.5
Pyrene	129-00-0	0.5	mg/kg		<0.5	<0.5	**1.1**	<3.0	<0.5
N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Benz(a)anthracene	56-55-3	0.5	mg/kg		<0.5	<0.5	**0.6**	<3.0	<0.5
Chrysene	218-01-9	0.5	mg/kg		<0.5	<0.5	**0.5**	<3.0	<0.5
Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg		<1	<1	<1	<6	<1
7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Benzo(a)pyrene	50-32-8	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH45@2.2	BH46@0.3	BH47@1.3	BH47@2.4	BH48@0.1 BH48@1.0
				Client sampling date / time	11-Feb-2019 00:00	12-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-069	ES1904527-071	ES1904527-076	ES1904527-079	ES1904527-080
					Result	Result	Result	Result	Result
EP075B: Polynuclear Aromatic Hydrocarbons - Continued									
3-Methylcholanthrene	56-49-5	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
^ Sum of PAHs	----	0.5	mg/kg		<0.5	<0.5	**4.1**	**15.1**	<0.5
^ Benzo(a)pyrene TEQ (zero)	----	0.5	mg/kg		<0.5	<0.5	<0.5	<2.4	<0.5
^ Benzo(a)pyrene TEQ (half LOR)	----	0.5	mg/kg		**0.6**	**0.6**	**0.6**	<2.4	**0.6**
^ Benzo(a)pyrene TEQ (LOR)	----	0.5	mg/kg		**1.2**	**1.2**	**1.2**	<2.4	**1.2**
EP075C: Phthalate Esters									
Dimethyl phthalate	131-11-3	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Diethyl phthalate	84-66-2	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Di-n-butyl phthalate	84-74-2	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Butyl benzyl phthalate	85-68-7	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
bis(2-ethylhexyl) phthalate	117-81-7	5.0	mg/kg		<5.0	<5.0	<5.0	<5.0	<5.0
Di-n-octylphthalate	117-84-0	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
EP075D: Nitrosamines									
N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
N-Nitrosodiethylamine	55-18-5	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
N-Nitrosopyrrolidine	930-55-2	1.0	mg/kg		<1.0	<1.0	<1.0	<3.0	<1.0
N-Nitrosomorpholine	59-89-2	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
N-Nitrosopiperidine	100-75-4	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
N-Nitrosodibutylamine	924-16-3	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	1.0	mg/kg		<1.0	<1.0	<1.0	<6.0	<1.0
Methapyrilene	91-80-5	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
EP075E: Nitroaromatics and Ketones									
2-Picoline	109-06-8	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Acetophenone	98-86-2	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Nitrobenzene	98-95-3	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
Isophorone	78-59-1	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
2.6-Dinitrotoluene	606-20-2	1.0	mg/kg		<1.0	<1.0	<1.0	<3.0	<1.0
2.4-Dinitrotoluene	121-14-2	1.0	mg/kg		<1.0	<1.0	<1.0	<3.0	<1.0
1-Naphthylamine	134-32-7	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH45@2.2	BH46@0.3	BH47@1.3	BH47@2.4	BH48@0.1 BH48@1.0
			Client sampling date / time	11-Feb-2019 00:00	12-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit	ES1904527-069	ES1904527-071	ES1904527-076	ES1904527-079	ES1904527-080
				Result	Result	Result	Result	Result
EP075E: Nitroaromatics and Ketones - Continued								
4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg	<0.5	<0.5	<0.5	<3.0	<0.5
5-Nitro-o-toluidine	99-55-8	0.5	mg/kg	<0.5	<0.5	<0.5	<3.0	<0.5
Azobenzene	103-33-3	1	mg/kg	<1	<1	<1	<3	<1
1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg	<0.5	<0.5	<0.5	<3.0	<0.5
Phenacetin	62-44-2	0.5	mg/kg	<0.5	<0.5	<0.5	<3.0	<0.5
4-Aminobiphenyl	92-67-1	0.5	mg/kg	<0.5	<0.5	<0.5	<3.0	<0.5
Pentachloronitrobenzene	82-68-8	0.5	mg/kg	<0.5	<0.5	<0.5	<3.0	<0.5
Pronamide	23950-58-5	0.5	mg/kg	<0.5	<0.5	<0.5	<3.0	<0.5
Dimethylaminoazobenzene	60-11-7	0.5	mg/kg	<0.5	<0.5	<0.5	<3.0	<0.5
Chlorobenzilate	510-15-6	0.5	mg/kg	<0.5	<0.5	<0.5	<3.0	<0.5
EP075F: Haloethers								
Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg	<0.5	<0.5	<0.5	<3.0	<0.5
Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg	<0.5	<0.5	<0.5	<3.0	<0.5
4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg	<0.5	<0.5	<0.5	<3.0	<0.5
4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg	<0.5	<0.5	<0.5	<3.0	<0.5
EP075G: Chlorinated Hydrocarbons								
1.3-Dichlorobenzene	541-73-1	0.5	mg/kg	<0.5	<0.5	<0.5	<3.0	<0.5
1.4-Dichlorobenzene	106-46-7	0.5	mg/kg	<0.5	<0.5	<0.5	<3.0	<0.5
1.2-Dichlorobenzene	95-50-1	0.5	mg/kg	<0.5	<0.5	<0.5	<3.0	<0.5
Hexachloroethane	67-72-1	0.5	mg/kg	<0.5	<0.5	<0.5	<3.0	<0.5
1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg	<0.5	<0.5	<0.5	<3.0	<0.5
Hexachloropropylene	1888-71-7	0.5	mg/kg	<0.5	<0.5	<0.5	<3.0	<0.5
Hexachlorobutadiene	87-68-3	0.5	mg/kg	<0.5	<0.5	<0.5	<3.0	<0.5
Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg	<2.5	<2.5	<2.5	<3.0	<2.5
Pentachlorobenzene	608-93-5	0.5	mg/kg	<0.5	<0.5	<0.5	<3.0	<0.5
Hexachlorobenzene (HCB)	118-74-1	1.0	mg/kg	<1.0	<1.0	<1.0	<3.0	<1.0
EP075H: Anilines and Benzidines								
Aniline	62-53-3	0.5	mg/kg	<0.5	<0.5	<0.5	<3.0	<0.5
4-Chloroaniline	106-47-8	0.5	mg/kg	<0.5	<0.5	<0.5	<3.0	<0.5
2-Nitroaniline	88-74-4	1.0	mg/kg	<1.0	<1.0	<1.0	<3.0	<1.0
3-Nitroaniline	99-09-2	1.0	mg/kg	<1.0	<1.0	<1.0	<3.0	<1.0
Dibenzofuran	132-64-9	0.5	mg/kg	<0.5	<0.5	<0.5	<3.0	<0.5
4-Nitroaniline	100-01-8	0.5	mg/kg	<0.5	<0.5	<0.5	<3.0	<0.5
Carbazole	86-74-8	0.5	mg/kg	<0.5	<0.5	<0.5	<3.0	<0.5

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH45@2.2	BH46@0.3	BH47@1.3	BH47@2.4	BH48@0.1 BH48@1.0
				Client sampling date / time	11-Feb-2019 00:00	12-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-069	ES1904527-071	ES1904527-076	ES1904527-079	ES1904527-080
					Result	Result	Result	Result	Result
EP075H: Anilines and Benzidines - Continued									
3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg		<0.5	<0.5	<0.5	<3.0	<0.5
EP080/071: Total Petroleum Hydrocarbons									
C6 - C9 Fraction	----	10	mg/kg		<10	<10	14	1770	<10
C10 - C14 Fraction	----	50	mg/kg		240	<50	<50	7130	<50
C15 - C28 Fraction	----	100	mg/kg		720	<100	<100	15100	<100
C29 - C36 Fraction	----	100	mg/kg		<100	<100	<100	<100	<100
^ C10 - C36 Fraction (sum)	----	50	mg/kg		960	<50	<50	22200	<50
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions									
C6 - C10 Fraction	C6_C10	10	mg/kg		<10	<10	16	2560	<10
^ C6 - C10 Fraction minus BTEX (F1)	C6_C10-BTEX	10	mg/kg		<10	<10	16	2440	<10
>C10 - C16 Fraction	----	50	mg/kg		450	<50	<50	11800	<50
>C16 - C34 Fraction	----	100	mg/kg		490	<100	<100	9900	<100
>C34 - C40 Fraction	----	100	mg/kg		<100	<100	<100	<100	<100
^ >C10 - C40 Fraction (sum)	----	50	mg/kg		940	<50	<50	21700	<50
^ >C10 - C16 Fraction minus Naphthalene (F2)	----	50	mg/kg		450	<50	<50	11800	<50
EP080: BTEXN									
Benzene	71-43-2	0.2	mg/kg		<0.2	<0.2	<0.2	3.4	<0.2
Toluene	108-88-3	0.5	mg/kg		<0.5	<0.5	<0.5	1.8	<0.5
Ethylbenzene	100-41-4	0.5	mg/kg		<0.5	<0.5	<0.5	30.9	<0.5
meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg		<0.5	<0.5	<0.5	77.9	<0.5
ortho-Xylene	95-47-6	0.5	mg/kg		<0.5	<0.5	<0.5	1.8	<0.5
^ Sum of BTEX	----	0.2	mg/kg		<0.2	<0.2	<0.2	116	<0.2
^ Total Xylenes	----	0.5	mg/kg		<0.5	<0.5	<0.5	79.7	<0.5
Naphthalene	91-20-3	1	mg/kg		<1	<1	<1	14	<1
EP066S: PCB Surrogate									
Decachlorobiphenyl	2051-24-3	0.1	%		118	93.5	114	107	91.5
EP068S: Organochlorine Pesticide Surrogate									
Dibromo-DDE	21655-73-2	0.05	%		127	90.6	113	101	89.6
EP068T: Organophosphorus Pesticide Surrogate									
DEF	78-48-8	0.05	%		61.2	70.6	93.4	64.0	68.4
EP074S: VOC Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.5	%		92.1	90.1	85.6	98.3	83.9

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH45@2.2	BH46@0.3	BH47@1.3	BH47@2.4	BH48@0.1 BH48@1.0
				Client sampling date / time	11-Feb-2019 00:00	12-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	12-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-069	ES1904527-071	ES1904527-076	ES1904527-079	ES1904527-080
					Result	Result	Result	Result	Result
EP074S: VOC Surrogates - Continued									
Toluene-D8	2037-26-5	0.5	%		111	111	104	122	106
4-Bromofluorobenzene	460-00-4	0.5	%		107	108	100	119	104
EP075S: Acid Extractable Surrogates									
2-Fluorophenol	367-12-4	0.5	%		102	83.6	98.9	64.1	106
Phenol-d6	13127-88-3	0.5	%		100	86.1	92.2	51.5	98.5
2-Chlorophenol-D4	93951-73-6	0.5	%		110	106	106	78.3	111
2.4.6-Tribromophenol	118-79-6	0.5	%		35.4	76.3	90.6	23.6	103
EP075T: Base/Neutral Extractable Surrogates									
Nitrobenzene-D5	4165-60-0	0.5	%		112	105	112	110	109
1.2-Dichlorobenzene-D4	2199-69-1	0.5	%		116	112	110	98.9	110
2-Fluorobiphenyl	321-60-8	0.5	%		120	122	112	105	118
Anthracene-d10	1719-06-8	0.5	%		106	107	99.7	108	103
4-Terphenyl-d14	1718-51-0	0.5	%		111	120	116	96.1	118
EP080S: TPH(V)/BTEX Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.2	%		96.2	94.3	89.8	101	87.5
Toluene-D8	2037-26-5	0.2	%		107	108	100	125	103
4-Bromofluorobenzene	460-00-4	0.2	%		109	111	104	127	109

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH49@0.9 BH49@0.7	BH49@2.5	DUP@2.7	DUP2@2.2	TS
			Client sampling date / time	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00
Compound	CAS Number	LOR	Unit	ES1904527-085	ES1904527-088	ES1904527-089	ES1904527-090	ES1904527-095
				Result	Result	Result	Result	Result
EA055: Moisture Content (Dried @ 105-110°C)								
Moisture Content	----	1.0	%	7.5	18.2	8.6	6.7	----
EA200: AS 4964 - 2004 Identification of Asbestos in Soils								
Asbestos Detected	1332-21-4	0.1	g/kg	No	----	----	----	----
Asbestos (Trace)	1332-21-4	5	Fibres	No	----	----	----	----
Asbestos Type	1332-21-4	-	--	-	----	----	----	----
Sample weight (dry)	----	0.01	g	23.0	----	----	----	----
APPROVED IDENTIFIER:	----	-	--	A. SMYLIE	----	----	----	----
EA200N: Asbestos Quantification (non-NATA)								
ø Asbestos (Fines and Fibrous <7mm)	1332-21-4	0.0004	g	<0.0004	----	----	----	----
ø Asbestos (Fines and Fibrous FA+AF)	----	0.001	% (w/w)	<0.001	----	----	----	----
ø Asbestos Containing Material	1332-21-4	0.1	g	<0.1	----	----	----	----
ø Asbestos Containing Material (as 15% Asbestos in ACM >7mm)	1332-21-4	0.01	% (w/w)	<0.01	----	----	----	----
ø Weight Used for % Calculation	----	0.0001	kg	0.0230	----	----	----	----
ø Fibrous Asbestos >7mm	----	0.0004	g	<0.0004	----	----	----	----
EG005T: Total Metals by ICP-AES								
Arsenic	7440-38-2	5	mg/kg	<5	<5	<5	5	----
Cadmium	7440-43-9	1	mg/kg	<1	<1	<1	<1	----
Chromium	7440-47-3	2	mg/kg	6	<2	<2	<2	----
Copper	7440-50-8	5	mg/kg	9	<5	<5	<5	----
Lead	7439-92-1	5	mg/kg	64	<5	17	<5	----
Nickel	7440-02-0	2	mg/kg	11	<2	<2	<2	----
Zinc	7440-66-6	5	mg/kg	78	<5	39	<5	----
EG035T: Total Recoverable Mercury by FIMS								
Mercury	7439-97-6	0.1	mg/kg	<0.1	<0.1	<0.1	<0.1	----
EP066: Polychlorinated Biphenyls (PCB)								
Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	<0.1	<0.1	<0.1	----
EP068A: Organochlorine Pesticides (OC)								
alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----
Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----
beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----
gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----
delta-BHC	319-86-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	BH49@0.9 BH49@0.7	BH49@2.5	DUP@2.7	DUP2@2.2	TS
			Client sampling date / time	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00
Compound	CAS Number	LOR	Unit	ES1904527-085	ES1904527-088	ES1904527-089	ES1904527-090	ES1904527-095
				Result	Result	Result	Result	Result
EP068A: Organochlorine Pesticides (OC) - Continued								
Heptachlor	76-44-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----
Aldrin	309-00-2	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----
Heptachlor epoxide	1024-57-3	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----
^ Total Chlordane (sum)	----	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----
trans-Chlordane	5103-74-2	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----
alpha-Endosulfan	959-98-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----
cis-Chlordane	5103-71-9	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----
Dieldrin	60-57-1	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----
4.4`-DDE	72-55-9	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----
Endrin	72-20-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----
beta-Endosulfan	33213-65-9	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----
^ Endosulfan (sum)	115-29-7	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----
4.4`-DDD	72-54-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----
Endrin aldehyde	7421-93-4	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----
Endosulfan sulfate	1031-07-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----
4.4`-DDT	50-29-3	0.2	mg/kg	<0.2	<0.2	<0.2	<0.2	----
Endrin ketone	53494-70-5	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----
Methoxychlor	72-43-5	0.2	mg/kg	<0.2	<0.2	<0.2	<0.2	----
^ Sum of Aldrin + Dieldrin	309-00-2/60-57-1	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----
^ Sum of DDD + DDE + DDT	72-54-8/72-55-9/50-2	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----
EP068B: Organophosphorus Pesticides (OP)								
Dichlorvos	62-73-7	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----
Demeton-S-methyl	919-86-8	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----
Monocrotophos	6923-22-4	0.2	mg/kg	<0.2	<0.2	<0.2	<0.2	----
Dimethoate	60-51-5	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----
Diazinon	333-41-5	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----
Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----
Parathion-methyl	298-00-0	0.2	mg/kg	<0.2	<0.2	<0.2	<0.2	----
Malathion	121-75-5	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----
Fenthion	55-38-9	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----
Chlorpyrifos	2921-88-2	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----
Parathion	56-38-2	0.2	mg/kg	<0.2	<0.2	<0.2	<0.2	----
Pirimphos-ethyl	23505-41-1	0.05	mg/kg	<0.05	<0.05	<0.05	<0.05	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH49@0.9 BH49@0.7	BH49@2.5	DUP@2.7	DUP2@2.2	TS
				Client sampling date / time	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-085	ES1904527-088	ES1904527-089	ES1904527-090	ES1904527-095
					Result	Result	Result	Result	Result
EP068B: Organophosphorus Pesticides (OP) - Continued									
Chlorfenvinphos	470-90-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	----
Bromophos-ethyl	4824-78-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	----
Fenamiphos	22224-92-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	----
Prothiofos	34643-46-4	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	----
Ethion	563-12-2	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	----
Carbophenothion	786-19-6	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	----
Azinphos Methyl	86-50-0	0.05	mg/kg		<0.05	<0.05	<0.05	<0.05	----
EP074A: Monocyclic Aromatic Hydrocarbons									
Styrene	100-42-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Isopropylbenzene	98-82-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
n-Propylbenzene	103-65-1	0.5	mg/kg		<0.5	<0.5	<0.5	**1.0**	----
1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg		<0.5	<0.5	<0.5	**2.0**	----
sec-Butylbenzene	135-98-8	0.5	mg/kg		<0.5	<0.5	<0.5	**0.8**	----
1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg		<0.5	<0.5	<0.5	**6.5**	----
tert-Butylbenzene	98-06-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
p-Isopropyltoluene	99-87-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
n-Butylbenzene	104-51-8	0.5	mg/kg		<0.5	<0.5	<0.5	**1.1**	----
EP074B: Oxygenated Compounds									
Vinyl Acetate	108-05-4	5	mg/kg		<5	<5	<5	<5	----
2-Butanone (MEK)	78-93-3	5	mg/kg		<5	<5	<5	<5	----
4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg		<5	<5	<5	<5	----
2-Hexanone (MBK)	591-78-6	5	mg/kg		<5	<5	<5	<5	----
EP074C: Sulfonated Compounds									
Carbon disulfide	75-15-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
EP074D: Fumigants									
2.2-Dichloropropane	594-20-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
1.2-Dichloropropane	78-87-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
EP074E: Halogenated Aliphatic Compounds									
Dichlorodifluoromethane	75-71-8	5	mg/kg		<5	<5	<5	<5	----
Chloromethane	74-87-3	5	mg/kg		<5	<5	<5	<5	----
Vinyl chloride	75-01-4	5	mg/kg		<5	<5	<5	<5	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH49@0.9 BH49@0.7	BH49@2.5	DUP@2.7	DUP2@2.2	TS
				Client sampling date / time	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-085	ES1904527-088	ES1904527-089	ES1904527-090	ES1904527-095
					Result	Result	Result	Result	Result
EP074E: Halogenated Aliphatic Compounds - Continued									
Bromomethane	74-83-9	5	mg/kg		<5	<5	<5	<5	----
Chloroethane	75-00-3	5	mg/kg		<5	<5	<5	<5	----
Trichlorofluoromethane	75-69-4	5	mg/kg		<5	<5	<5	<5	----
1.1-Dichloroethene	75-35-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Iodomethane	74-88-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
1.1-Dichloroethane	75-34-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
1.1.1-Trichloroethane	71-55-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
1.1-Dichloropropylene	563-58-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Carbon Tetrachloride	56-23-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
1.2-Dichloroethane	107-06-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Trichloroethene	79-01-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Dibromomethane	74-95-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
1.1.2-Trichloroethane	79-00-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
1.3-Dichloropropane	142-28-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Tetrachloroethene	127-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
1.2.3-Trichloropropane	96-18-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Pentachloroethane	76-01-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
EP074F: Halogenated Aromatic Compounds									
Chlorobenzene	108-90-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Bromobenzene	108-86-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
2-Chlorotoluene	95-49-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
4-Chlorotoluene	106-43-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
EP074G: Trihalomethanes									
Chloroform	67-66-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Bromodichloromethane	75-27-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Dibromochloromethane	124-48-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH49@0.9 BH49@0.7	BH49@2.5	DUP@2.7	DUP2@2.2	TS
				Client sampling date / time	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-085	ES1904527-088	ES1904527-089	ES1904527-090	ES1904527-095
					Result	Result	Result	Result	Result
EP074G: Trihalomethanes - Continued									
Bromoform	75-25-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
EP075A: Phenolic Compounds									
Phenol	108-95-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
2-Chlorophenol	95-57-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
2-Methylphenol	95-48-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
3- & 4-Methylphenol	1319-77-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
2-Nitrophenol	88-75-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
2.4-Dimethylphenol	105-67-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
2.4-Dichlorophenol	120-83-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
2.6-Dichlorophenol	87-65-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Pentachlorophenol	87-86-5	1	mg/kg		<1	<1	<1	<1	----
EP075B: Polynuclear Aromatic Hydrocarbons									
Naphthalene	91-20-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
2-Methylnaphthalene	91-57-6	0.5	mg/kg		<0.5	<0.5	<0.5	**0.8**	----
2-Chloronaphthalene	91-58-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Acenaphthylene	208-96-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Acenaphthene	83-32-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Fluorene	86-73-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Phenanthrene	85-01-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Anthracene	120-12-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Fluoranthene	206-44-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Pyrene	129-00-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Benz(a)anthracene	56-55-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Chrysene	218-01-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg		<1	<1	<1	<1	----
7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Benzo(a)pyrene	50-32-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
3-Methylcholanthrene	56-49-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH49@0.9 BH49@0.7	BH49@2.5	DUP@2.7	DUP2@2.2	TS
				Client sampling date / time	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-085	ES1904527-088	ES1904527-089	ES1904527-090	ES1904527-095
					Result	Result	Result	Result	Result
EP075B: Polynuclear Aromatic Hydrocarbons - Continued									
Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
^ Sum of PAHs	----	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
^ Benzo(a)pyrene TEQ (zero)	----	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
^ Benzo(a)pyrene TEQ (half LOR)	----	0.5	mg/kg		**0.6**	**0.6**	**0.6**	**0.6**	----
^ Benzo(a)pyrene TEQ (LOR)	----	0.5	mg/kg		**1.2**	**1.2**	**1.2**	**1.2**	----
EP075C: Phthalate Esters									
Dimethyl phthalate	131-11-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Diethyl phthalate	84-66-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Di-n-butyl phthalate	84-74-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Butyl benzyl phthalate	85-68-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
bis(2-ethylhexyl) phthalate	117-81-7	5.0	mg/kg		<5.0	<5.0	<5.0	<5.0	----
Di-n-octylphthalate	117-84-0	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
EP075D: Nitrosamines									
N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
N-Nitrosodiethylamine	55-18-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
N-Nitrosopyrrolidine	930-55-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	----
N-Nitrosomorpholine	59-89-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
N-Nitrosopiperidine	100-75-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
N-Nitrosodibutylamine	924-16-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	----
Methapyrilene	91-80-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
EP075E: Nitroaromatics and Ketones									
2-Picoline	109-06-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Acetophenone	98-86-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Nitrobenzene	98-95-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Isophorone	78-59-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
2.6-Dinitrotoluene	606-20-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	----
2.4-Dinitrotoluene	121-14-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	----
1-Naphthylamine	134-32-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
5-Nitro-o-toluidine	99-55-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH49@0.9 BH49@0.7	BH49@2.5	DUP@2.7	DUP2@2.2	TS
				Client sampling date / time	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-085	ES1904527-088	ES1904527-089	ES1904527-090	ES1904527-095
					Result	Result	Result	Result	Result
EP075E: Nitroaromatics and Ketones - Continued									
Azobenzene	103-33-3	1	mg/kg		<1	<1	<1	<1	----
1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Phenacetin	62-44-2	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
4-Aminobiphenyl	92-67-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Pentachloronitrobenzene	82-68-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Pronamide	23950-58-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Dimethylaminoazobenzene	60-11-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Chlorobenzilate	510-15-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
EP075F: Haloethers									
Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
EP075G: Chlorinated Hydrocarbons									
1.3-Dichlorobenzene	541-73-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
1.4-Dichlorobenzene	106-46-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
1.2-Dichlorobenzene	95-50-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Hexachloroethane	67-72-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Hexachloropropylene	1888-71-7	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Hexachlorobutadiene	87-68-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg		<2.5	<2.5	<2.5	<2.5	----
Pentachlorobenzene	608-93-5	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Hexachlorobenzene (HCB)	118-74-1	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	----
EP075H: Anilines and Benzidines									
Aniline	62-53-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
4-Chloroaniline	106-47-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
2-Nitroaniline	88-74-4	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	----
3-Nitroaniline	99-09-2	1.0	mg/kg		<1.0	<1.0	<1.0	<1.0	----
Dibenzofuran	132-64-9	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
4-Nitroaniline	100-01-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
Carbazole	86-74-8	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	----
EP080/071: Total Petroleum Hydrocarbons									

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH49@0.9 BH49@0.7	BH49@2.5	DUP@2.7	DUP2@2.2	TS
				Client sampling date / time	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-085	ES1904527-088	ES1904527-089	ES1904527-090	ES1904527-095
					Result	Result	Result	Result	Result
EP080/071: Total Petroleum Hydrocarbons - Continued									
C6 - C9 Fraction	----	10	mg/kg		<10	<10	<10	35	----
C10 - C14 Fraction	----	50	mg/kg		<50	<50	<50	360	----
C15 - C28 Fraction	----	100	mg/kg		<100	<100	140	940	----
C29 - C36 Fraction	----	100	mg/kg		<100	<100	<100	<100	----
^ C10 - C36 Fraction (sum)	----	50	mg/kg		<50	<50	140	1300	----
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions									
C6 - C10 Fraction	C6_C10	10	mg/kg		<10	<10	<10	82	----
^ C6 - C10 Fraction minus BTEX (F1)	C6_C10-BTEX	10	mg/kg		<10	<10	<10	81	----
>C10 - C16 Fraction	----	50	mg/kg		<50	<50	70	620	----
>C16 - C34 Fraction	----	100	mg/kg		<100	<100	<100	630	----
>C34 - C40 Fraction	----	100	mg/kg		<100	<100	<100	<100	----
^ >C10 - C40 Fraction (sum)	----	50	mg/kg		<50	<50	70	1250	----
^ >C10 - C16 Fraction minus Naphthalene (F2)	----	50	mg/kg		<50	<50	70	620	----
EP080: BTEXN									
Benzene	71-43-2	0.2	mg/kg		<0.2	<0.2	<0.2	<0.2	0.3
Toluene	108-88-3	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	12.7
Ethylbenzene	100-41-4	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	1.6
meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg		<0.5	<0.5	<0.5	1.1	8.2
ortho-Xylene	95-47-6	0.5	mg/kg		<0.5	<0.5	<0.5	<0.5	3.1
^ Sum of BTEX	----	0.2	mg/kg		<0.2	<0.2	<0.2	1.1	25.9
^ Total Xylenes	----	0.5	mg/kg		<0.5	<0.5	<0.5	1.1	11.3
Naphthalene	91-20-3	1	mg/kg		<1	<1	<1	<1	<1
EP066S: PCB Surrogate									
Decachlorobiphenyl	2051-24-3	0.1	%		127	115	104	102	----
EP068S: Organochlorine Pesticide Surrogate									
Dibromo-DDE	21655-73-2	0.05	%		120	103	92.7	100	----
EP068T: Organophosphorus Pesticide Surrogate									
DEF	78-48-8	0.05	%		86.7	74.1	67.8	60.3	----
EP074S: VOC Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.5	%		82.4	80.1	90.1	87.4	----
Toluene-D8	2037-26-5	0.5	%		98.1	99.5	110	113	----
4-Bromofluorobenzene	460-00-4	0.5	%		94.8	97.8	106	112	----

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)				Client sample ID	BH49@0.9 BH49@0.7	BH49@2.5	DUP@2.7	DUP2@2.2	TS
				Client sampling date / time	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00	11-Feb-2019 00:00
Compound	CAS Number	LOR	Unit		ES1904527-085	ES1904527-088	ES1904527-089	ES1904527-090	ES1904527-095
					Result	Result	Result	Result	Result
EP075S: Acid Extractable Surrogates									
2-Fluorophenol	367-12-4	0.5	%		95.7	96.2	88.4	95.0	----
Phenol-d6	13127-88-3	0.5	%		104	92.2	100	95.0	----
2-Chlorophenol-D4	93951-73-6	0.5	%		112	103	111	112	----
2.4.6-Tribromophenol	118-79-6	0.5	%		87.0	90.7	80.9	34.9	----
EP075T: Base/Neutral Extractable Surrogates									
Nitrobenzene-D5	4165-60-0	0.5	%		116	97.2	108	113	----
1.2-Dichlorobenzene-D4	2199-69-1	0.5	%		118	101	104	111	----
2-Fluorobiphenyl	321-60-8	0.5	%		123	117	118	118	----
Anthracene-d10	1719-06-8	0.5	%		106	102	105	104	----
4-Terphenyl-d14	1718-51-0	0.5	%		124	116	122	106	----
EP080S: TPH(V)/BTEX Surrogates									
1.2-Dichloroethane-D4	17060-07-0	0.2	%		86.8	84.8	95.0	91.6	82.5
Toluene-D8	2037-26-5	0.2	%		95.0	95.9	106	109	93.8
4-Bromofluorobenzene	460-00-4	0.2	%		99.6	103	110	114	93.7

Analytical Results

Sub-Matrix: SOIL (Matrix: SOIL)			Client sample ID	TB	TSC	----	----	----
			Client sampling date / time	11-Feb-2019 00:00	11-Feb-2019 00:00	----	----	----
Compound	CAS Number	LOR	Unit	ES1904527-096	ES1904527-097	--------	--------	--------
				Result	Result	----	----	----
EP080: BTEXN								
Benzene	71-43-2	0.2	mg/kg	<0.2	**0.4**	----	----	----
Toluene	108-88-3	0.5	mg/kg	<0.5	**18.7**	----	----	----
Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	**2.4**	----	----	----
meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	**12.4**	----	----	----
ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	**4.6**	----	----	----
^ **Sum of BTEX**	----	0.2	mg/kg	<0.2	**38.5**	----	----	----
^ **Total Xylenes**	----	0.5	mg/kg	<0.5	**17.0**	----	----	----
Naphthalene	91-20-3	1	mg/kg	<1	<1	----	----	----
EP080S: TPH(V)/BTEX Surrogates								
1.2-Dichloroethane-D4	17060-07-0	0.2	%	**89.8**	**82.3**	----	----	----
Toluene-D8	2037-26-5	0.2	%	**107**	**93.8**	----	----	----
4-Bromofluorobenzene	460-00-4	0.2	%	**112**	**97.0**	----	----	----

Analytical Results

Sub-Matrix: **SOLID** (Matrix: **SOLID**)				Client sample ID	**Near BH48 - ACM**	**BH44 - PACM**	**----**	**----**	**----**
				Client sampling date / time	12-Feb-2019 00:00	11-Feb-2019 00:00	----	----	----
Compound	*CAS Number*	*LOR*	*Unit*		**ES1904527-098**	**ES1904527-099**	**--------**	**--------**	**--------**
					Result	Result	----	----	----
EA200: AS 4964 - 2004 Identification of Asbestos in bulk samples									
Asbestos Detected	1332-21-4	0.1	g/kg		**Yes**	**Yes**	**----**	**----**	**----**
Asbestos Type	1332-21-4	-	--		**Ch + Am + Cr**	**Ch + Am + Cr**	**----**	**----**	**----**
Sample weight (dry)	----	0.01	g		**46.1**	**4.29**	**----**	**----**	**----**
APPROVED IDENTIFIER:	----	-	--		**A. SMYLIE**	**A. SMYLIE**	**----**	**----**	**----**
Synthetic Mineral Fibre	----	0.1	g/kg		**No**	**No**	**----**	**----**	**----**
Organic Fibre	----	0.1	g/kg		**No**	**No**	**----**	**----**	**----**

Analytical Results

Descriptive Results

Sub-Matrix: **SOIL**

Method: Compound	Client sample ID - Client sampling date / time	Analytical Results
EA200: AS 4964 - 2004 Identification of Asbestos in Soils		
EA200: Description	BH29@0.4 - 11-Feb-2019 00:00	Mid brown soil.
EA200: Description	BH30@0.8 - 11-Feb-2019 00:00	Mid brown soil.
EA200: Description	BH31@0.2 - 11-Feb-2019 00:00	Mid brown soil.
EA200: Description	BH32@1 - 11-Feb-2019 00:00	Mid brown soil.
EA200: Description	BH33@0.5 - 11-Feb-2019 00:00	Mid brown soil.
EA200: Description	BH34@0.3 - 12-Feb-2019 00:00	Mid brown soil.
EA200: Description	BH35@0.7 - 12-Feb-2019 00:00	Mid brown soil.
EA200: Description	BH36@1 - 12-Feb-2019 00:00	Mid brown soil.
EA200: Description	BH37@1.1 - 12-Feb-2019 00:00	Mid brown soil.
EA200: Description	BH38@0.3 - 12-Feb-2019 00:00	Mid brown soil.
EA200: Description	BH38@1.6 - 12-Feb-2019 00:00	Dark brown sandy soil.
EA200: Description	BH39@0.3 - 12-Feb-2019 00:00	Mid brown soil.
EA200: Description	BH40@0.3 - 12-Feb-2019 00:00	Mid brown soil.
EA200: Description	BH41@2 - 12-Feb-2019 00:00	Mid brown soil.
EA200: Description	BH42@1.5 - 12-Feb-2019 00:00	Mid brown soil.
EA200: Description	BH44@0.3 - 11-Feb-2019 00:00	Mid brown soil.
EA200: Description	BH45@0.7BH45@1.7 - 11-Feb-2019 00:00	Mid brown soil.
EA200: Description	BH46@0.3 - 12-Feb-2019 00:00	Mid brown soil.
EA200: Description	BH47@1.3 - 11-Feb-2019 00:00	Dark brown sandy soil.
EA200: Description	BH48@0.1BH48@1.0 - 12-Feb-2019 00:00	Mid brown soil.
EA200: Description	BH49@0.9BH49@0.7 - 11-Feb-2019 00:00	Mid brown soil.

Sub-Matrix: **SOLID**

Method: Compound	Client sample ID - Client sampling date / time	Analytical Results
EA200: AS 4964 - 2004 Identification of Asbestos in bulk samples		
EA200: Description	Near BH48 - ACM - 12-Feb-2019 00:00	One piece of asbestos cement sheeting approximately 130x40x10mm.
EA200: Description	BH44 - PACM - 11-Feb-2019 00:00	One piece of asbestos cement sheeting approximately 35x20x5mm.

Surrogate Control Limits

Sub-Matrix: **SOIL**

Compound	CAS Number	Recovery Limits (%) Low	High
EP066S: PCB Surrogate			
Decachlorobiphenyl	2051-24-3	39	149
EP068S: Organochlorine Pesticide Surrogate			
Dibromo-DDE	21655-73-2	49	147
EP068T: Organophosphorus Pesticide Surrogate			
DEF	78-48-8	35	143
EP074S: VOC Surrogates			
1.2-Dichloroethane-D4	17060-07-0	64	130
Toluene-D8	2037-26-5	66	136
4-Bromofluorobenzene	460-00-4	60	122
EP075S: Acid Extractable Surrogates			
2-Fluorophenol	367-12-4	29	149
Phenol-d6	13127-88-3	32	128
2-Chlorophenol-D4	93951-73-6	32	128
2.4.6-Tribromophenol	118-79-6	13	121
EP075T: Base/Neutral Extractable Surrogates			
Nitrobenzene-D5	4165-60-0	33	125
1.2-Dichlorobenzene-D4	2199-69-1	34	108
2-Fluorobiphenyl	321-60-8	35	121
Anthracene-d10	1719-06-8	35	123
4-Terphenyl-d14	1718-51-0	33	125
EP080S: TPH(V)/BTEX Surrogates			
1.2-Dichloroethane-D4	17060-07-0	73	133
Toluene-D8	2037-26-5	74	132
4-Bromofluorobenzene	460-00-4	72	130
EP231S: PFAS Surrogate			
13C4-PFOS	----	60	120
13C8-PFOA	----	60	120

ALS Environmental

QUALITY CONTROL REPORT

Work Order	: **ES1904527**	Page	: 1 of 51
Client	: **ARCADIS AUSTRALIA PACIFIC PTY LTD**	Laboratory	: Environmental Division Sydney
Contact	: CAITLAIN REGENA	Contact	: Loren Schiavon
Address	: L16, 480 GEORGE STREET SYDNEY NSW 2000	Address	: 277-289 Woodpark Road Smithfield NSW Australia 2164
Telephone	: +61 02 8907 9000	Telephone	: +61 2 8784 8555
Project	: 10026439 - task 6	Date Samples Received	: 13-Feb-2019
Order number	: 10026439- TASK 6	Date Analysis Commenced	: 13-Feb-2019
C-O-C number	: ----	Issue Date	: 18-Feb-2019
Sampler	: TOM KEATLEY		
Site	: ----		
Quote number	: ----		
No. of samples received	: 101		
No. of samples analysed	: 44		

Accreditation No. 825
Accredited for compliance with
ISO/IEC 17025 - Testing

This report supersedes any previous report(s) with this reference. Results apply to the sample(s) as submitted. This document shall not be reproduced, except in full.

This Quality Control Report contains the following information:

- Laboratory Duplicate (DUP) Report; Relative Percentage Difference (RPD) and Acceptance Limits
- Method Blank (MB) and Laboratory Control Spike (LCS) Report; Recovery and Acceptance Limits
- Matrix Spike (MS) Report; Recovery and Acceptance Limits

Signatories

This document has been electronically signed by the authorized signatories below. Electronic signing is carried out in compliance with procedures specified in 21 CFR Part 11.

Signatories	*Position*	*Accreditation Category*
Alana Smylie	Asbestos Identifier	Newcastle - Asbestos, Mayfield West, NSW
Alex Rossi	Organic Chemist	Sydney Organics, Smithfield, NSW
Edwandy Fadjar	Organic Coordinator	Sydney Organics, Smithfield, NSW
Ivan Taylor	Analyst	Sydney Inorganics, Smithfield, NSW
Sanjeshni Jyoti	Senior Chemist Volatiles	Sydney Organics, Smithfield, NSW

General Comments

The analytical procedures used by the Environmental Division have been developed from established internationally recognized procedures such as those published by the USEPA, APHA, AS and NEPM. In house developed procedures are employed in the absence of documented standards or by client request.

Where moisture determination has been performed, results are reported on a dry weight basis.

Where a reported less than (<) result is higher than the LOR, this may be due to primary sample extract/digestate dilution and/or insufficient sample for analysis. Where the LOR of a reported result differs from standard LOR, this may be due to high

Key : Anonymous = Refers to samples which are not specifically part of this work order but formed part of the QC process lot
CAS Number = CAS registry number from database maintained by Chemical Abstracts Services. The Chemical Abstracts Service is a division of the American Chemical Society.
LOR = Limit of reporting
RPD = Relative Percentage Difference
# = Indicates failed QC

Laboratory Duplicate (DUP) Report

The quality control term Laboratory Duplicate refers to a randomly selected intralaboratory split. Laboratory duplicates provide information regarding method precision and sample heterogeneity. The permitted ranges for the Relative Percent Deviation (RPD) of Laboratory Duplicates are specified in ALS Method QWI-EN/38 and are dependent on the magnitude of results in comparison to the level of reporting: Result < 10 times LOR: No Limit; Result between 10 and 20 times LOR: 0% - 50%; Result > 20 times LOR: 0% - 20%.

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EA055: Moisture Content (Dried @ 105-110°C) (QC Lot: 2185628)									
ES1904279-018	Anonymous	EA055: Moisture Content	----	0.1	%	5.5	6.0	8.02	0% - 20%
ES1904527-006	BH30@0.8	EA055: Moisture Content	----	0.1	%	9.5	9.4	1.71	No Limit
EA055: Moisture Content (Dried @ 105-110°C) (QC Lot: 2185629)									
ES1904527-029	BH34@3	EA055: Moisture Content	----	0.1	%	25.2	25.3	0.00	0% - 20%
ES1904527-051	BH39@2.5	EA055: Moisture Content	----	0.1	%	13.5	14.4	6.43	0% - 50%
EA055: Moisture Content (Dried @ 105-110°C) (QC Lot: 2185630)									
ES1904527-069	BH45@2.2	EA055: Moisture Content	----	0.1	%	5.7	5.6	0.00	No Limit
ES1904537-009	Anonymous	EA055: Moisture Content	----	0.1	%	23.7	25.6	7.83	0% - 20%
EG005T: Total Metals by ICP-AES (QC Lot: 2184945)									
ES1904242-006	Anonymous	EG005T: Cadmium	7440-43-9	1	mg/kg	<1	<1	0.00	No Limit
		EG005T: Chromium	7440-47-3	2	mg/kg	8	8	0.00	No Limit
		EG005T: Nickel	7440-02-0	2	mg/kg	6	4	30.9	No Limit
		EG005T: Arsenic	7440-38-2	5	mg/kg	<5	12	81.1	No Limit
		EG005T: Copper	7440-50-8	5	mg/kg	15	13	9.06	No Limit
		EG005T: Lead	7439-92-1	5	mg/kg	32	35	9.48	No Limit
		EG005T: Zinc	7440-66-6	5	mg/kg	76	73	4.30	0% - 50%
ES1904251-001	Anonymous	EG005T: Cadmium	7440-43-9	1	mg/kg	3	1	90.3	No Limit
		EG005T: Chromium	7440-47-3	2	mg/kg	25	16	46.8	0% - 50%
		EG005T: Nickel	7440-02-0	2	mg/kg	6	7	22.3	No Limit
		EG005T: Arsenic	7440-38-2	5	mg/kg	<5	<5	0.00	No Limit
		EG005T: Copper	7440-50-8	5	mg/kg	30	26	15.1	No Limit
		EG005T: Lead	7439-92-1	5	mg/kg	23	19	21.8	No Limit
		EG005T: Zinc	7440-66-6	5	mg/kg	28	27	0.00	No Limit
EG005T: Total Metals by ICP-AES (QC Lot: 2185046)									

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EG005T: Total Metals by ICP-AES (QC Lot: 2185046) - continued									
ES1904527-025	BH34@0.3	EG005T: Zinc	7440-66-6	5	mg/kg	249	262	5.11	0% - 20%
ES1904527-025	BH34@0.3	EG005T: Cadmium	7440-43-9	1	mg/kg	<1	<1	0.00	No Limit
		EG005T: Chromium	7440-47-3	2	mg/kg	11	10	12.4	No Limit
		EG005T: Nickel	7440-02-0	2	mg/kg	29	18	49.4	0% - 50%
		EG005T: Arsenic	7440-38-2	5	mg/kg	<5	<5	0.00	No Limit
		EG005T: Copper	7440-50-8	5	mg/kg	20	18	5.38	No Limit
		EG005T: Lead	7439-92-1	5	mg/kg	44	43	0.00	No Limit
ES1904527-052	BH40@0.3	EG005T: Cadmium	7440-43-9	1	mg/kg	<1	<1	0.00	No Limit
		EG005T: Chromium	7440-47-3	2	mg/kg	26	29	10.6	0% - 50%
		EG005T: Nickel	7440-02-0	2	mg/kg	28	33	15.9	0% - 50%
		EG005T: Arsenic	7440-38-2	5	mg/kg	8	<5	51.5	No Limit
		EG005T: Copper	7440-50-8	5	mg/kg	46	45	2.38	No Limit
		EG005T: Lead	7439-92-1	5	mg/kg	80	68	15.8	0% - 50%
		EG005T: Zinc	7440-66-6	5	mg/kg	127	107	16.7	0% - 20%
EG005T: Total Metals by ICP-AES (QC Lot: 2185048)									
ES1904527-079	BH47@2.4	EG005T: Cadmium	7440-43-9	1	mg/kg	<1	<1	0.00	No Limit
		EG005T: Chromium	7440-47-3	2	mg/kg	<2	<2	0.00	No Limit
		EG005T: Nickel	7440-02-0	2	mg/kg	<2	<2	0.00	No Limit
		EG005T: Arsenic	7440-38-2	5	mg/kg	<5	<5	0.00	No Limit
		EG005T: Copper	7440-50-8	5	mg/kg	<5	<5	0.00	No Limit
		EG005T: Lead	7439-92-1	5	mg/kg	<5	<5	0.00	No Limit
		EG005T: Zinc	7440-66-6	5	mg/kg	<5	<5	0.00	No Limit
EG005T: Total Metals by ICP-AES (QC Lot: 2187356)									
ES1904553-008	Anonymous	EG005T: Cadmium	7440-43-9	1	mg/kg	<1	<1	0.00	No Limit
		EG005T: Chromium	7440-47-3	2	mg/kg	8	8	0.00	No Limit
		EG005T: Nickel	7440-02-0	2	mg/kg	<2	<2	0.00	No Limit
		EG005T: Arsenic	7440-38-2	5	mg/kg	14	<5	94.8	No Limit
		EG005T: Copper	7440-50-8	5	mg/kg	29	30	0.00	No Limit
		EG005T: Lead	7439-92-1	5	mg/kg	39	45	13.7	No Limit
		EG005T: Zinc	7440-66-6	5	mg/kg	27	21	22.0	No Limit
EG035T: Total Recoverable Mercury by FIMS (QC Lot: 2184946)									
ES1904242-006	Anonymous	EG035T: Mercury	7439-97-6	0.1	mg/kg	0.1	0.2	0.00	No Limit
ES1904251-001	Anonymous	EG035T: Mercury	7439-97-6	0.1	mg/kg	<0.1	<0.1	0.00	No Limit
EG035T: Total Recoverable Mercury by FIMS (QC Lot: 2185047)									
ES1904527-025	BH34@0.3	EG035T: Mercury	7439-97-6	0.1	mg/kg	<0.1	<0.1	0.00	No Limit
ES1904527-052	BH40@0.3	EG035T: Mercury	7439-97-6	0.1	mg/kg	<0.1	<0.1	0.00	No Limit
EG035T: Total Recoverable Mercury by FIMS (QC Lot: 2185049)									
ES1904527-079	BH47@2.4	EG035T: Mercury	7439-97-6	0.1	mg/kg	<0.1	<0.1	0.00	No Limit
EG035T: Total Recoverable Mercury by FIMS (QC Lot: 2187357)									

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EG035T: Total Recoverable Mercury by FIMS (QC Lot: 2187357) - continued									
ES1904383-001	Anonymous	EG035T: Mercury	7439-97-6	0.1	mg/kg	<0.1	<0.1	0.00	No Limit
ES1904553-008	Anonymous	EG035T: Mercury	7439-97-6	0.1	mg/kg	<0.1	<0.1	0.00	No Limit
EP066: Polychlorinated Biphenyls (PCB) (QC Lot: 2184392)									
ES1904527-001	BH29@0.4	EP066: Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	<0.1	0.00	No Limit
ES1904527-031	BH35@0.7	EP066: Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	<0.1	0.00	No Limit
EP066: Polychlorinated Biphenyls (PCB) (QC Lot: 2185546)									
ES1904527-056	BH41@2.4	EP066: Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	<0.1	0.00	No Limit
ES1904527-085	BH49@0.9 BH49@0.7	EP066: Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	<0.1	0.00	No Limit
EP068A: Organochlorine Pesticides (OC) (QC Lot: 2184389)									
ES1904527-001	BH29@0.4	EP068: alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: delta-BHC	319-86-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Heptachlor	76-44-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Aldrin	309-00-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Heptachlor epoxide	1024-57-3	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: trans-Chlordane	5103-74-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: alpha-Endosulfan	959-98-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: cis-Chlordane	5103-71-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Dieldrin	60-57-1	0.05	mg/kg	0.39	0.34	12.3	No Limit
		EP068: 4.4`-DDE	72-55-9	0.05	mg/kg	0.19	0.19	0.00	No Limit
		EP068: Endrin	72-20-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: beta-Endosulfan	33213-65-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDD	72-54-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin aldehyde	7421-93-4	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endosulfan sulfate	1031-07-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin ketone	53494-70-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDT	50-29-3	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Methoxychlor	72-43-5	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
ES1904527-031	BH35@0.7	EP068: alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: delta-BHC	319-86-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Heptachlor	76-44-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Aldrin	309-00-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Heptachlor epoxide	1024-57-3	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: trans-Chlordane	5103-74-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: alpha-Endosulfan	959-98-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP068A: Organochlorine Pesticides (OC) (QC Lot: 2184389) - continued									
ES1904527-031	BH35@0.7	EP068: cis-Chlordane	5103-71-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Dieldrin	60-57-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDE	72-55-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin	72-20-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: beta-Endosulfan	33213-65-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDD	72-54-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin aldehyde	7421-93-4	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endosulfan sulfate	1031-07-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin ketone	53494-70-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDT	50-29-3	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Methoxychlor	72-43-5	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
EP068A: Organochlorine Pesticides (OC) (QC Lot: 2185543)									
ES1904527-056	BH41@2.4	EP068: alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: delta-BHC	319-86-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Heptachlor	76-44-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Aldrin	309-00-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Heptachlor epoxide	1024-57-3	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: trans-Chlordane	5103-74-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: alpha-Endosulfan	959-98-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: cis-Chlordane	5103-71-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Dieldrin	60-57-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDE	72-55-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin	72-20-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: beta-Endosulfan	33213-65-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDD	72-54-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin aldehyde	7421-93-4	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endosulfan sulfate	1031-07-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin ketone	53494-70-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDT	50-29-3	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Methoxychlor	72-43-5	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
ES1904527-085	BH49@0.9 BH49@0.7	EP068: alpha-BHC	319-84-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: beta-BHC	319-85-7	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: gamma-BHC	58-89-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: delta-BHC	319-86-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Heptachlor	76-44-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Aldrin	309-00-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP068A: Organochlorine Pesticides (OC) (QC Lot: 2185543) - continued									
ES1904527-085	BH49@0.9 BH49@0.7	EP068: Heptachlor epoxide	1024-57-3	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: trans-Chlordane	5103-74-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: alpha-Endosulfan	959-98-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: cis-Chlordane	5103-71-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Dieldrin	60-57-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDE	72-55-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin	72-20-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: beta-Endosulfan	33213-65-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDD	72-54-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin aldehyde	7421-93-4	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endosulfan sulfate	1031-07-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Endrin ketone	53494-70-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: 4.4`-DDT	50-29-3	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Methoxychlor	72-43-5	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
EP068B: Organophosphorus Pesticides (OP) (QC Lot: 2184389)									
ES1904527-001	BH29@0.4	EP068: Dichlorvos	62-73-7	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Demeton-S-methyl	919-86-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Dimethoate	60-51-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Diazinon	333-41-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Malathion	121-75-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Fenthion	55-38-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorpyrifos	2921-88-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Pirimphos-ethyl	23505-41-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorfenvinphos	470-90-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Bromophos-ethyl	4824-78-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Fenamiphos	22224-92-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Prothiofos	34643-46-4	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Ethion	563-12-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Carbophenothion	786-19-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Azinphos Methyl	86-50-0	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Monocrotophos	6923-22-4	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Parathion-methyl	298-00-0	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Parathion	56-38-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
ES1904527-031	BH35@0.7	EP068: Dichlorvos	62-73-7	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Demeton-S-methyl	919-86-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Dimethoate	60-51-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Diazinon	333-41-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Malathion	121-75-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP068B: Organophosphorus Pesticides (OP) (QC Lot: 2184389) - continued									
ES1904527-031	BH35@0.7	EP068: Fenthion	55-38-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorpyrifos	2921-88-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Pirimphos-ethyl	23505-41-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorfenvinphos	470-90-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Bromophos-ethyl	4824-78-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Fenamiphos	22224-92-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Prothiofos	34643-46-4	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Ethion	563-12-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Carbophenothion	786-19-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Azinphos Methyl	86-50-0	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Monocrotophos	6923-22-4	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Parathion-methyl	298-00-0	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Parathion	56-38-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
EP068B: Organophosphorus Pesticides (OP) (QC Lot: 2185543)									
ES1904527-056	BH41@2.4	EP068: Dichlorvos	62-73-7	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Demeton-S-methyl	919-86-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Dimethoate	60-51-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Diazinon	333-41-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Malathion	121-75-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Fenthion	55-38-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorpyrifos	2921-88-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Pirimphos-ethyl	23505-41-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorfenvinphos	470-90-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Bromophos-ethyl	4824-78-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Fenamiphos	22224-92-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Prothiofos	34643-46-4	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Ethion	563-12-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Carbophenothion	786-19-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Azinphos Methyl	86-50-0	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Monocrotophos	6923-22-4	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Parathion-methyl	298-00-0	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Parathion	56-38-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
ES1904527-085	BH49@0.9 BH49@0.7	EP068: Dichlorvos	62-73-7	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Demeton-S-methyl	919-86-8	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Dimethoate	60-51-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Diazinon	333-41-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Malathion	121-75-5	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Fenthion	55-38-9	0.05	mg/kg	<0.05	<0.05	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP068B: Organophosphorus Pesticides (OP) (QC Lot: 2185543) - continued									
ES1904527-085	BH49@0.9 BH49@0.7	EP068: Chlorpyrifos	2921-88-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Pirimphos-ethyl	23505-41-1	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Chlorfenvinphos	470-90-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Bromophos-ethyl	4824-78-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Fenamiphos	22224-92-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Prothiofos	34643-46-4	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Ethion	563-12-2	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Carbophenothion	786-19-6	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Azinphos Methyl	86-50-0	0.05	mg/kg	<0.05	<0.05	0.00	No Limit
		EP068: Monocrotophos	6923-22-4	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Parathion-methyl	298-00-0	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP068: Parathion	56-38-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
EP074A: Monocyclic Aromatic Hydrocarbons (QC Lot: 2184164)									
ES1904527-001	BH29@0.4	EP074: Styrene	100-42-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Isopropylbenzene	98-82-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: n-Propylbenzene	103-65-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: sec-Butylbenzene	135-98-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: tert-Butylbenzene	98-06-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: p-Isopropyltoluene	99-87-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: n-Butylbenzene	104-51-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1904527-038	BH36@2.1	EP074: Styrene	100-42-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Isopropylbenzene	98-82-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: n-Propylbenzene	103-65-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: sec-Butylbenzene	135-98-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: tert-Butylbenzene	98-06-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: p-Isopropyltoluene	99-87-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: n-Butylbenzene	104-51-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074A: Monocyclic Aromatic Hydrocarbons (QC Lot: 2184167)									
ES1904527-056	BH41@2.4	EP074: Styrene	100-42-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Isopropylbenzene	98-82-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: n-Propylbenzene	103-65-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: sec-Butylbenzene	135-98-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: tert-Butylbenzene	98-06-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: p-Isopropyltoluene	99-87-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP074A: Monocyclic Aromatic Hydrocarbons (QC Lot: 2184167) - continued									
ES1904527-056	BH41@2.4	EP074: n-Butylbenzene	104-51-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1904527-085	BH49@0.9 BH49@0.7	EP074: Styrene	100-42-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Isopropylbenzene	98-82-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: n-Propylbenzene	103-65-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: sec-Butylbenzene	135-98-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: tert-Butylbenzene	98-06-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: p-Isopropyltoluene	99-87-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: n-Butylbenzene	104-51-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074A: Monocyclic Aromatic Hydrocarbons (QC Lot: 2186000)									
ES1904553-032	Anonymous	EP074: Styrene	100-42-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Isopropylbenzene	98-82-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: n-Propylbenzene	103-65-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: sec-Butylbenzene	135-98-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: tert-Butylbenzene	98-06-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: p-Isopropyltoluene	99-87-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: n-Butylbenzene	104-51-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074B: Oxygenated Compounds (QC Lot: 2184164)									
ES1904527-001	BH29@0.4	EP074: Vinyl Acetate	108-05-4	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 2-Butanone (MEK)	78-93-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 2-Hexanone (MBK)	591-78-6	5	mg/kg	<5	<5	0.00	No Limit
ES1904527-038	BH36@2.1	EP074: Vinyl Acetate	108-05-4	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 2-Butanone (MEK)	78-93-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 2-Hexanone (MBK)	591-78-6	5	mg/kg	<5	<5	0.00	No Limit
EP074B: Oxygenated Compounds (QC Lot: 2184167)									
ES1904527-056	BH41@2.4	EP074: Vinyl Acetate	108-05-4	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 2-Butanone (MEK)	78-93-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 2-Hexanone (MBK)	591-78-6	5	mg/kg	<5	<5	0.00	No Limit
ES1904527-085	BH49@0.9 BH49@0.7	EP074: Vinyl Acetate	108-05-4	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 2-Butanone (MEK)	78-93-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 2-Hexanone (MBK)	591-78-6	5	mg/kg	<5	<5	0.00	No Limit
EP074B: Oxygenated Compounds (QC Lot: 2186000)									

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP074B: Oxygenated Compounds (QC Lot: 2186000) - continued									
ES1904553-032	Anonymous	EP074: Vinyl Acetate	108-05-4	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 2-Butanone (MEK)	78-93-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg	<5	<5	0.00	No Limit
		EP074: 2-Hexanone (MBK)	591-78-6	5	mg/kg	<5	<5	0.00	No Limit
EP074C: Sulfonated Compounds (QC Lot: 2184164)									
ES1904527-001	BH29@0.4	EP074: Carbon disulfide	75-15-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1904527-038	BH36@2.1	EP074: Carbon disulfide	75-15-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074C: Sulfonated Compounds (QC Lot: 2184167)									
ES1904527-056	BH41@2.4	EP074: Carbon disulfide	75-15-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1904527-085	BH49@0.9 BH49@0.7	EP074: Carbon disulfide	75-15-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074C: Sulfonated Compounds (QC Lot: 2186000)									
ES1904553-032	Anonymous	EP074: Carbon disulfide	75-15-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074D: Fumigants (QC Lot: 2184164)									
ES1904527-001	BH29@0.4	EP074: 2.2-Dichloropropane	594-20-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dichloropropane	78-87-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1904527-038	BH36@2.1	EP074: 2.2-Dichloropropane	594-20-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dichloropropane	78-87-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074D: Fumigants (QC Lot: 2184167)									
ES1904527-056	BH41@2.4	EP074: 2.2-Dichloropropane	594-20-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dichloropropane	78-87-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1904527-085	BH49@0.9 BH49@0.7	EP074: 2.2-Dichloropropane	594-20-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dichloropropane	78-87-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074D: Fumigants (QC Lot: 2186000)									
ES1904553-032	Anonymous	EP074: 2.2-Dichloropropane	594-20-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dichloropropane	78-87-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP074D: Fumigants (QC Lot: 2186000) - continued									
ES1904553-032	Anonymous	EP074: 1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074E: Halogenated Aliphatic Compounds (QC Lot: 2184164)									
ES1904527-001	BH29@0.4	EP074: 1.1-Dichloroethene	75-35-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Iodomethane	74-88-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1-Dichloroethane	75-34-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.1-Trichloroethane	71-55-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1-Dichloropropylene	563-58-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Carbon Tetrachloride	56-23-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dichloroethane	107-06-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Trichloroethene	79-01-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dibromomethane	74-95-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.2-Trichloroethane	79-00-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.3-Dichloropropane	142-28-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Tetrachloroethene	127-18-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.3-Trichloropropane	96-18-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Pentachloroethane	76-01-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dichlorodifluoromethane	75-71-8	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Chloromethane	74-87-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Vinyl chloride	75-01-4	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Bromomethane	74-83-9	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Chloroethane	75-00-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Trichlorofluoromethane	75-69-4	5	mg/kg	<5	<5	0.00	No Limit
ES1904527-038	BH36@2.1	EP074: 1.1-Dichloroethene	75-35-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Iodomethane	74-88-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1-Dichloroethane	75-34-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.1-Trichloroethane	71-55-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1-Dichloropropylene	563-58-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Carbon Tetrachloride	56-23-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dichloroethane	107-06-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Trichloroethene	79-01-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dibromomethane	74-95-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP074E: Halogenated Aliphatic Compounds (QC Lot: 2184164) - continued									
ES1904527-038	BH36@2.1	EP074: 1.1.2-Trichloroethane	79-00-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.3-Dichloropropane	142-28-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Tetrachloroethene	127-18-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.3-Trichloropropane	96-18-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Pentachloroethane	76-01-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dichlorodifluoromethane	75-71-8	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Chloromethane	74-87-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Vinyl chloride	75-01-4	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Bromomethane	74-83-9	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Chloroethane	75-00-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Trichlorofluoromethane	75-69-4	5	mg/kg	<5	<5	0.00	No Limit
EP074E: Halogenated Aliphatic Compounds (QC Lot: 2184167)									
ES1904527-056	BH41@2.4	EP074: 1.1-Dichloroethene	75-35-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Iodomethane	74-88-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1-Dichloroethane	75-34-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.1-Trichloroethane	71-55-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1-Dichloropropylene	563-58-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Carbon Tetrachloride	56-23-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dichloroethane	107-06-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Trichloroethene	79-01-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dibromomethane	74-95-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.2-Trichloroethane	79-00-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.3-Dichloropropane	142-28-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Tetrachloroethene	127-18-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.3-Trichloropropane	96-18-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Pentachloroethane	76-01-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dichlorodifluoromethane	75-71-8	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Chloromethane	74-87-3	5	mg/kg	<5	<5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP074E: Halogenated Aliphatic Compounds (QC Lot: 2184167) - continued									
ES1904527-056	BH41@2.4	EP074: Vinyl chloride	75-01-4	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Bromomethane	74-83-9	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Chloroethane	75-00-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Trichlorofluoromethane	75-69-4	5	mg/kg	<5	<5	0.00	No Limit
ES1904527-085	BH49@0.9 BH49@0.7	EP074: 1.1-Dichloroethene	75-35-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Iodomethane	74-88-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1-Dichloroethane	75-34-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.1-Trichloroethane	71-55-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1-Dichloropropylene	563-58-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Carbon Tetrachloride	56-23-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dichloroethane	107-06-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Trichloroethene	79-01-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dibromomethane	74-95-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.2-Trichloroethane	79-00-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.3-Dichloropropane	142-28-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Tetrachloroethene	127-18-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.3-Trichloropropane	96-18-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Pentachloroethane	76-01-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dichlorodifluoromethane	75-71-8	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Chloromethane	74-87-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Vinyl chloride	75-01-4	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Bromomethane	74-83-9	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Chloroethane	75-00-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Trichlorofluoromethane	75-69-4	5	mg/kg	<5	<5	0.00	No Limit
EP074E: Halogenated Aliphatic Compounds (QC Lot: 2186000)									
ES1904553-032	Anonymous	EP074: 1.1-Dichloroethene	75-35-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Iodomethane	74-88-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1-Dichloroethane	75-34-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.1-Trichloroethane	71-55-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1-Dichloropropylene	563-58-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Carbon Tetrachloride	56-23-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP074E: Halogenated Aliphatic Compounds (QC Lot: 2186000) - continued									
ES1904553-032	Anonymous	EP074: 1.2-Dichloroethane	107-06-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Trichloroethene	79-01-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dibromomethane	74-95-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.2-Trichloroethane	79-00-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.3-Dichloropropane	142-28-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Tetrachloroethene	127-18-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.3-Trichloropropane	96-18-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Pentachloroethane	76-01-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dichlorodifluoromethane	75-71-8	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Chloromethane	74-87-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Vinyl chloride	75-01-4	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Bromomethane	74-83-9	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Chloroethane	75-00-3	5	mg/kg	<5	<5	0.00	No Limit
		EP074: Trichlorofluoromethane	75-69-4	5	mg/kg	<5	<5	0.00	No Limit
EP074F: Halogenated Aromatic Compounds (QC Lot: 2184164)									
ES1904527-001	BH29@0.4	EP074: Chlorobenzene	108-90-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromobenzene	108-86-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 2-Chlorotoluene	95-49-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 4-Chlorotoluene	106-43-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1904527-038	BH36@2.1	EP074: Chlorobenzene	108-90-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromobenzene	108-86-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 2-Chlorotoluene	95-49-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 4-Chlorotoluene	106-43-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074F: Halogenated Aromatic Compounds (QC Lot: 2184167)									
ES1904527-056	BH41@2.4	EP074: Chlorobenzene	108-90-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromobenzene	108-86-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 2-Chlorotoluene	95-49-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 4-Chlorotoluene	106-43-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1904527-085	BH49@0.9 BH49@0.7	EP074: Chlorobenzene	108-90-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromobenzene	108-86-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 2-Chlorotoluene	95-49-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 4-Chlorotoluene	106-43-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP074F: Halogenated Aromatic Compounds (QC Lot: 2184167) - continued									
ES1904527-085	BH49@0.9 BH49@0.7	EP074: 1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074F: Halogenated Aromatic Compounds (QC Lot: 2186000)									
ES1904553-032	Anonymous	EP074: Chlorobenzene	108-90-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromobenzene	108-86-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 2-Chlorotoluene	95-49-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 4-Chlorotoluene	106-43-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: 1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074G: Trihalomethanes (QC Lot: 2184164)									
ES1904527-001	BH29@0.4	EP074: Chloroform	67-66-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromodichloromethane	75-27-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dibromochloromethane	124-48-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromoform	75-25-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1904527-038	BH36@2.1	EP074: Chloroform	67-66-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromodichloromethane	75-27-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dibromochloromethane	124-48-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromoform	75-25-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074G: Trihalomethanes (QC Lot: 2184167)									
ES1904527-056	BH41@2.4	EP074: Chloroform	67-66-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromodichloromethane	75-27-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dibromochloromethane	124-48-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromoform	75-25-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1904527-085	BH49@0.9 BH49@0.7	EP074: Chloroform	67-66-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromodichloromethane	75-27-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dibromochloromethane	124-48-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromoform	75-25-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP074G: Trihalomethanes (QC Lot: 2186000)									
ES1904553-032	Anonymous	EP074: Chloroform	67-66-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromodichloromethane	75-27-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Dibromochloromethane	124-48-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP074: Bromoform	75-25-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075A: Phenolic Compounds (QC Lot: 2184391)									
ES1904527-001	BH29@0.4	EP075: Phenol	108-95-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Chlorophenol	95-57-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Methylphenol	95-48-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3- & 4-Methylphenol	1319-77-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Nitrophenol	88-75-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4-Dimethylphenol	105-67-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4-Dichlorophenol	120-83-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.6-Dichlorophenol	87-65-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075A: Phenolic Compounds (QC Lot: 2184391) - continued									
ES1904527-001	BH29@0.4	EP075: 4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachlorophenol	87-86-5	1	mg/kg	<1	<1	0.00	No Limit
ES1904527-031	BH35@0.7	EP075: Phenol	108-95-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Chlorophenol	95-57-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Methylphenol	95-48-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3- & 4-Methylphenol	1319-77-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Nitrophenol	88-75-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4-Dimethylphenol	105-67-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4-Dichlorophenol	120-83-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.6-Dichlorophenol	87-65-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachlorophenol	87-86-5	1	mg/kg	<1	<1	0.00	No Limit
EP075A: Phenolic Compounds (QC Lot: 2185545)									
ES1904527-056	BH41@2.4	EP075: Phenol	108-95-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Chlorophenol	95-57-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Methylphenol	95-48-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3- & 4-Methylphenol	1319-77-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Nitrophenol	88-75-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4-Dimethylphenol	105-67-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4-Dichlorophenol	120-83-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.6-Dichlorophenol	87-65-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachlorophenol	87-86-5	1	mg/kg	<1	<1	0.00	No Limit
ES1904527-085	BH49@0.9 BH49@0.7	EP075: Phenol	108-95-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Chlorophenol	95-57-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Methylphenol	95-48-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3- & 4-Methylphenol	1319-77-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Nitrophenol	88-75-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4-Dimethylphenol	105-67-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4-Dichlorophenol	120-83-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.6-Dichlorophenol	87-65-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075A: Phenolic Compounds (QC Lot: 2185545) - continued									
ES1904527-085	BH49@0.9 BH49@0.7	EP075: Pentachlorophenol	87-86-5	1	mg/kg	<1	<1	0.00	No Limit
EP075B: Polynuclear Aromatic Hydrocarbons (QC Lot: 2184391)									
ES1904527-001	BH29@0.4	EP075: Naphthalene	91-20-3	0.5	mg/kg	1.8	1.6	12.4	No Limit
		EP075: 2-Methylnaphthalene	91-57-6	0.5	mg/kg	1.7	1.5	10.5	No Limit
		EP075: 2-Chloronaphthalene	91-58-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acenaphthylene	208-96-8	0.5	mg/kg	1.9	1.8	0.00	No Limit
		EP075: Acenaphthene	83-32-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fluorene	86-73-7	0.5	mg/kg	2.8	2.4	16.2	No Limit
		EP075: Phenanthrene	85-01-8	0.5	mg/kg	14.0	12.7	9.86	0% - 20%
		EP075: Anthracene	120-12-7	0.5	mg/kg	3.3	3.0	10.7	No Limit
		EP075: Fluoranthene	206-44-0	0.5	mg/kg	14.7	12.4	17.0	0% - 20%
		EP075: Pyrene	129-00-0	0.5	mg/kg	14.2	12.7	11.1	0% - 20%
		EP075: N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benz(a)anthracene	56-55-3	0.5	mg/kg	7.3	6.8	7.90	0% - 50%
		EP075: Chrysene	218-01-9	0.5	mg/kg	5.5	4.9	11.0	0% - 50%
		EP075: 7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(a)pyrene	50-32-8	0.5	mg/kg	5.7	5.2	9.61	0% - 50%
		EP075: 3-Methylcholanthrene	56-49-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg	2.0	1.7	12.8	No Limit
		EP075: Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg	0.6	0.5	0.00	No Limit
		EP075: Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg	2.3	1.9	18.0	No Limit
		EP075: Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg	8	7	0.00	No Limit
ES1904527-031	BH35@0.7	EP075: Naphthalene	91-20-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Methylnaphthalene	91-57-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Chloronaphthalene	91-58-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acenaphthylene	208-96-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acenaphthene	83-32-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fluorene	86-73-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Phenanthrene	85-01-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Anthracene	120-12-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fluoranthene	206-44-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pyrene	129-00-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benz(a)anthracene	56-55-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chrysene	218-01-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(a)pyrene	50-32-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3-Methylcholanthrene	56-49-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075B: Polynuclear Aromatic Hydrocarbons (QC Lot: 2184391) - continued									
ES1904527-031	BH35@0.7	EP075: Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg	<1	<1	0.00	No Limit
EP075B: Polynuclear Aromatic Hydrocarbons (QC Lot: 2185545)									
ES1904527-056	BH41@2.4	EP075: Naphthalene	91-20-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Methylnaphthalene	91-57-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Chloronaphthalene	91-58-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acenaphthylene	208-96-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acenaphthene	83-32-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fluorene	86-73-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Phenanthrene	85-01-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Anthracene	120-12-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fluoranthene	206-44-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pyrene	129-00-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benz(a)anthracene	56-55-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chrysene	218-01-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(a)pyrene	50-32-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3-Methylcholanthrene	56-49-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg	<1	<1	0.00	No Limit
ES1904527-085	BH49@0.9 BH49@0.7	EP075: Naphthalene	91-20-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Methylnaphthalene	91-57-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Chloronaphthalene	91-58-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acenaphthylene	208-96-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acenaphthene	83-32-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fluorene	86-73-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Phenanthrene	85-01-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Anthracene	120-12-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Fluoranthene	206-44-0	0.5	mg/kg	<0.5	0.5	0.00	No Limit
		EP075: Pyrene	129-00-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benz(a)anthracene	56-55-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chrysene	218-01-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075B: Polynuclear Aromatic Hydrocarbons (QC Lot: 2185545) - continued									
ES1904527-085	BH49@0.9 BH49@0.7	EP075: Benzo(a)pyrene	50-32-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3-Methylcholanthrene	56-49-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg	<1	<1	0.00	No Limit
EP075C: Phthalate Esters (QC Lot: 2184391)									
ES1904527-001	BH29@0.4	EP075: Dimethyl phthalate	131-11-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Diethyl phthalate	84-66-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Di-n-butyl phthalate	84-74-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Butyl benzyl phthalate	85-68-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Di-n-octylphthalate	117-84-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1904527-031	BH35@0.7	EP075: Dimethyl phthalate	131-11-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Diethyl phthalate	84-66-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Di-n-butyl phthalate	84-74-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Butyl benzyl phthalate	85-68-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Di-n-octylphthalate	117-84-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075C: Phthalate Esters (QC Lot: 2185545)									
ES1904527-056	BH41@2.4	EP075: Dimethyl phthalate	131-11-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Diethyl phthalate	84-66-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Di-n-butyl phthalate	84-74-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Butyl benzyl phthalate	85-68-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Di-n-octylphthalate	117-84-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1904527-085	BH49@0.9 BH49@0.7	EP075: Dimethyl phthalate	131-11-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Diethyl phthalate	84-66-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Di-n-butyl phthalate	84-74-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Butyl benzyl phthalate	85-68-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Di-n-octylphthalate	117-84-0	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075D: Nitrosamines (QC Lot: 2184391)									
ES1904527-001	BH29@0.4	EP075: N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodiethylamine	55-18-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosopyrrolidine	930-55-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: N-Nitrosomorpholine	59-89-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosopiperidine	100-75-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodibutylamine	924-16-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Methapyrilene	91-80-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075D: Nitrosamines (QC Lot: 2184391) - continued									
ES1904527-031	BH35@0.7	EP075: N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodiethylamine	55-18-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosopyrrolidine	930-55-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: N-Nitrosomorpholine	59-89-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosopiperidine	100-75-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodibutylamine	924-16-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Methapyrilene	91-80-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075D: Nitrosamines (QC Lot: 2185545)									
ES1904527-056	BH41@2.4	EP075: N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodiethylamine	55-18-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosopyrrolidine	930-55-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: N-Nitrosomorpholine	59-89-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosopiperidine	100-75-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodibutylamine	924-16-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Methapyrilene	91-80-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1904527-085	BH49@0.9 BH49@0.7	EP075: N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodiethylamine	55-18-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosopyrrolidine	930-55-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: N-Nitrosomorpholine	59-89-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosopiperidine	100-75-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodibutylamine	924-16-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Methapyrilene	91-80-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075E: Nitroaromatics and Ketones (QC Lot: 2184391)									
ES1904527-001	BH29@0.4	EP075: 2-Picoline	109-06-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acetophenone	98-86-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Nitrobenzene	98-95-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Isophorone	78-59-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.6-Dinitrotoluene	606-20-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 2.4-Dinitrotoluene	121-14-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 1-Naphthylamine	134-32-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075E: Nitroaromatics and Ketones (QC Lot: 2184391) - continued									
ES1904527-001	BH29@0.4	EP075: 5-Nitro-o-toluidine	99-55-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Phenacetin	62-44-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Aminobiphenyl	92-67-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachloronitrobenzene	82-68-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pronamide	23950-58-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dimethylaminoazobenzene	60-11-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorobenzilate	510-15-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Azobenzene	103-33-3	1	mg/kg	<1	<1	0.00	No Limit
ES1904527-031	BH35@0.7	EP075: 2-Picoline	109-06-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acetophenone	98-86-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Nitrobenzene	98-95-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Isophorone	78-59-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.6-Dinitrotoluene	606-20-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 2.4-Dinitrotoluene	121-14-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 1-Naphthylamine	134-32-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 5-Nitro-o-toluidine	99-55-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Phenacetin	62-44-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Aminobiphenyl	92-67-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachloronitrobenzene	82-68-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pronamide	23950-58-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dimethylaminoazobenzene	60-11-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorobenzilate	510-15-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Azobenzene	103-33-3	1	mg/kg	<1	<1	0.00	No Limit
EP075E: Nitroaromatics and Ketones (QC Lot: 2185545)									
ES1904527-056	BH41@2.4	EP075: 2-Picoline	109-06-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acetophenone	98-86-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Nitrobenzene	98-95-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Isophorone	78-59-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.6-Dinitrotoluene	606-20-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 2.4-Dinitrotoluene	121-14-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 1-Naphthylamine	134-32-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 5-Nitro-o-toluidine	99-55-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Phenacetin	62-44-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Aminobiphenyl	92-67-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachloronitrobenzene	82-68-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075E: Nitroaromatics and Ketones (QC Lot: 2185545) - continued									
ES1904527-056	BH41@2.4	EP075: Pronamide	23950-58-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dimethylaminoazobenzene	60-11-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorobenzilate	510-15-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Azobenzene	103-33-3	1	mg/kg	<1	<1	0.00	No Limit
ES1904527-085	BH49@0.9 BH49@0.7	EP075: 2-Picoline	109-06-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Acetophenone	98-86-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Nitrobenzene	98-95-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Isophorone	78-59-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2.6-Dinitrotoluene	606-20-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 2.4-Dinitrotoluene	121-14-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 1-Naphthylamine	134-32-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 5-Nitro-o-toluidine	99-55-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Phenacetin	62-44-2	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Aminobiphenyl	92-67-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachloronitrobenzene	82-68-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pronamide	23950-58-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Dimethylaminoazobenzene	60-11-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Chlorobenzilate	510-15-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Azobenzene	103-33-3	1	mg/kg	<1	<1	0.00	No Limit
EP075F: Haloethers (QC Lot: 2184391)									
ES1904527-001	BH29@0.4	EP075: Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1904527-031	BH35@0.7	EP075: Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075F: Haloethers (QC Lot: 2185545)									
ES1904527-056	BH41@2.4	EP075: Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1904527-085	BH49@0.9 BH49@0.7	EP075: Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075G: Chlorinated Hydrocarbons (QC Lot: 2184391)									

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075G: Chlorinated Hydrocarbons (QC Lot: 2184391) - continued									
ES1904527-001	BH29@0.4	EP075: 1.3-Dichlorobenzene	541-73-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.4-Dichlorobenzene	106-46-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.2-Dichlorobenzene	95-50-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachloroethane	67-72-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachloropropylene	1888-71-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachlorobutadiene	87-68-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachlorobenzene	608-93-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachlorobenzene (HCB)	118-74-1	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg	<2.5	<2.5	0.00	No Limit
ES1904527-031	BH35@0.7	EP075: 1.3-Dichlorobenzene	541-73-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.4-Dichlorobenzene	106-46-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.2-Dichlorobenzene	95-50-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachloroethane	67-72-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachloropropylene	1888-71-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachlorobutadiene	87-68-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachlorobenzene	608-93-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachlorobenzene (HCB)	118-74-1	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg	<2.5	<2.5	0.00	No Limit
EP075G: Chlorinated Hydrocarbons (QC Lot: 2185545)									
ES1904527-056	BH41@2.4	EP075: 1.3-Dichlorobenzene	541-73-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.4-Dichlorobenzene	106-46-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.2-Dichlorobenzene	95-50-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachloroethane	67-72-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachloropropylene	1888-71-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachlorobutadiene	87-68-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachlorobenzene	608-93-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachlorobenzene (HCB)	118-74-1	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg	<2.5	<2.5	0.00	No Limit
ES1904527-085	BH49@0.9 BH49@0.7	EP075: 1.3-Dichlorobenzene	541-73-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.4-Dichlorobenzene	106-46-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.2-Dichlorobenzene	95-50-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachloroethane	67-72-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachloropropylene	1888-71-7	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachlorobutadiene	87-68-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Pentachlorobenzene	608-93-5	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Hexachlorobenzene (HCB)	118-74-1	0.5	mg/kg	<1.0	<1.0	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP075G: Chlorinated Hydrocarbons (QC Lot: 2185545) - continued									
ES1904527-085	BH49@0.9 BH49@0.7	EP075: Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg	<2.5	<2.5	0.00	No Limit
EP075H: Anilines and Benzidines (QC Lot: 2184391)									
ES1904527-001	BH29@0.4	EP075: Aniline	62-53-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chloroaniline	106-47-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Nitroaniline	88-74-4	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 3-Nitroaniline	99-09-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Dibenzofuran	132-64-9	0.5	mg/kg	1.7	1.6	7.18	No Limit
		EP075: 4-Nitroaniline	100-01-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Carbazole	86-74-8	0.5	mg/kg	2.0	1.1	58.7	No Limit
		EP075: 3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1904527-031	BH35@0.7	EP075: Aniline	62-53-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chloroaniline	106-47-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Nitroaniline	88-74-4	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 3-Nitroaniline	99-09-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Dibenzofuran	132-64-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Nitroaniline	100-01-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Carbazole	86-74-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP075H: Anilines and Benzidines (QC Lot: 2185545)									
ES1904527-056	BH41@2.4	EP075: Aniline	62-53-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chloroaniline	106-47-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Nitroaniline	88-74-4	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 3-Nitroaniline	99-09-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Dibenzofuran	132-64-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Nitroaniline	100-01-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Carbazole	86-74-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
ES1904527-085	BH49@0.9 BH49@0.7	EP075: Aniline	62-53-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Chloroaniline	106-47-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 2-Nitroaniline	88-74-4	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: 3-Nitroaniline	99-09-2	0.5	mg/kg	<1.0	<1.0	0.00	No Limit
		EP075: Dibenzofuran	132-64-9	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 4-Nitroaniline	100-01-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: Carbazole	86-74-8	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP075: 3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
EP080/071: Total Petroleum Hydrocarbons (QC Lot: 2184165)									
ES1904527-001	BH29@0.4	EP080: C6 - C9 Fraction	----	10	mg/kg	<10	<10	0.00	No Limit
ES1904527-038	BH36@2.1	EP080: C6 - C9 Fraction	----	10	mg/kg	<10	<10	0.00	No Limit
EP080/071: Total Petroleum Hydrocarbons (QC Lot: 2184168)									

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP080/071: Total Petroleum Hydrocarbons (QC Lot: 2184168) - continued									
ES1904527-056	BH41@2.4	EP080: C6 - C9 Fraction	----	10	mg/kg	<10	<10	0.00	No Limit
ES1904527-085	BH49@0.9 BH49@0.7	EP080: C6 - C9 Fraction	----	10	mg/kg	<10	<10	0.00	No Limit
EP080/071: Total Petroleum Hydrocarbons (QC Lot: 2184390)									
ES1904527-001	BH29@0.4	EP071: C15 - C28 Fraction	----	100	mg/kg	280	290	4.93	No Limit
		EP071: C29 - C36 Fraction	----	100	mg/kg	140	160	15.7	No Limit
		EP071: C10 - C14 Fraction	----	50	mg/kg	<50	<50	0.00	No Limit
ES1904527-031	BH35@0.7	EP071: C15 - C28 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: C29 - C36 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: C10 - C14 Fraction	----	50	mg/kg	<50	<50	0.00	No Limit
EP080/071: Total Petroleum Hydrocarbons (QC Lot: 2185544)									
ES1904527-056	BH41@2.4	EP071: C15 - C28 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: C29 - C36 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: C10 - C14 Fraction	----	50	mg/kg	<50	<50	0.00	No Limit
ES1904527-085	BH49@0.9 BH49@0.7	EP071: C15 - C28 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: C29 - C36 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: C10 - C14 Fraction	----	50	mg/kg	<50	<50	0.00	No Limit
EP080/071: Total Petroleum Hydrocarbons (QC Lot: 2185625)									
ES1904431-001	Anonymous	EP080: C6 - C9 Fraction	----	10	mg/kg	<10	<10	0.00	No Limit
ES1904537-006	Anonymous	EP080: C6 - C9 Fraction	----	10	mg/kg	<10	<10	0.00	No Limit
EP080/071: Total Petroleum Hydrocarbons (QC Lot: 2186001)									
ES1904553-032	Anonymous	EP080: C6 - C9 Fraction	----	10	mg/kg	<10	<10	0.00	No Limit
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QC Lot: 2184165)									
ES1904527-001	BH29@0.4	EP080: C6 - C10 Fraction	C6_C10	10	mg/kg	<10	<10	0.00	No Limit
ES1904527-038	BH36@2.1	EP080: C6 - C10 Fraction	C6_C10	10	mg/kg	<10	<10	0.00	No Limit
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QC Lot: 2184168)									
ES1904527-056	BH41@2.4	EP080: C6 - C10 Fraction	C6_C10	10	mg/kg	<10	<10	0.00	No Limit
ES1904527-085	BH49@0.9 BH49@0.7	EP080: C6 - C10 Fraction	C6_C10	10	mg/kg	<10	<10	0.00	No Limit
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QC Lot: 2184390)									
ES1904527-001	BH29@0.4	EP071: >C16 - C34 Fraction	----	100	mg/kg	370	400	8.31	No Limit
		EP071: >C34 - C40 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: >C10 - C16 Fraction	----	50	mg/kg	<50	<50	0.00	No Limit
ES1904527-031	BH35@0.7	EP071: >C16 - C34 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: >C34 - C40 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: >C10 - C16 Fraction	----	50	mg/kg	<50	<50	0.00	No Limit
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QC Lot: 2185544)									
ES1904527-056	BH41@2.4	EP071: >C16 - C34 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: >C34 - C40 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: >C10 - C16 Fraction	----	50	mg/kg	<50	<50	0.00	No Limit
ES1904527-085	BH49@0.9 BH49@0.7	EP071: >C16 - C34 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QC Lot: 2185544) - continued									
ES1904527-085	BH49@0.9 BH49@0.7	EP071: >C34 - C40 Fraction	----	100	mg/kg	<100	<100	0.00	No Limit
		EP071: >C10 - C16 Fraction	----	50	mg/kg	<50	<50	0.00	No Limit
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QC Lot: 2185625)									
ES1904431-001	Anonymous	EP080: C6 - C10 Fraction	C6_C10	10	mg/kg	<10	<10	0.00	No Limit
ES1904537-006	Anonymous	EP080: C6 - C10 Fraction	C6_C10	10	mg/kg	<10	<10	0.00	No Limit
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QC Lot: 2186001)									
ES1904553-032	Anonymous	EP080: C6 - C10 Fraction	C6_C10	10	mg/kg	<10	<10	0.00	No Limit
EP080: BTEXN (QC Lot: 2184165)									
ES1904527-001	BH29@0.4	EP080: Benzene	71-43-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP080: Toluene	108-88-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Naphthalene	91-20-3	1	mg/kg	2	1	0.00	No Limit
ES1904527-038	BH36@2.1	EP080: Benzene	71-43-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP080: Toluene	108-88-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Naphthalene	91-20-3	1	mg/kg	<1	<1	0.00	No Limit
EP080: BTEXN (QC Lot: 2184168)									
ES1904527-056	BH41@2.4	EP080: Benzene	71-43-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP080: Toluene	108-88-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Naphthalene	91-20-3	1	mg/kg	<1	<1	0.00	No Limit
ES1904527-085	BH49@0.9 BH49@0.7	EP080: Benzene	71-43-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP080: Toluene	108-88-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Naphthalene	91-20-3	1	mg/kg	<1	<1	0.00	No Limit
EP080: BTEXN (QC Lot: 2185625)									
ES1904431-001	Anonymous	EP080: Benzene	71-43-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP080: BTEXN (QC Lot: 2185625) - continued									
ES1904431-001	Anonymous	EP080: Toluene	108-88-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Naphthalene	91-20-3	1	mg/kg	<1	<1	0.00	No Limit
ES1904537-006	Anonymous	EP080: Benzene	71-43-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP080: Toluene	108-88-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Naphthalene	91-20-3	1	mg/kg	<1	<1	0.00	No Limit
EP080: BTEXN (QC Lot: 2186001)									
ES1904553-032	Anonymous	EP080: Benzene	71-43-2	0.2	mg/kg	<0.2	<0.2	0.00	No Limit
		EP080: Toluene	108-88-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	<0.5	0.00	No Limit
		EP080: Naphthalene	91-20-3	1	mg/kg	<1	<1	0.00	No Limit
EP231A: Perfluoroalkyl Sulfonic Acids (QC Lot: 2184690)									
ES1904279-010	Anonymous	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	0.0017	0.0016	0.00	No Limit
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
ES1904527-046	BH38@1.6	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 2184690)									
ES1904279-010	Anonymous	EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 2184690) - continued									
ES1904279-010	Anonymous	EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	<0.001	0.00	No Limit
ES1904527-046	BH38@1.6	EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	<0.001	0.00	No Limit
EP231C: Perfluoroalkyl Sulfonamides (QC Lot: 2184690)									
ES1904279-010	Anonymous	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
ES1904527-046	BH38@1.6	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	<0.0002	0.00	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit

Sub-Matrix: **SOIL**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP231C: Perfluoroalkyl Sulfonamides (QC Lot: 2184690) - continued									
ES1904527-046	BH38@1.6	EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QC Lot: 2184690)									
ES1904279-010	Anonymous	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
ES1904527-046	BH38@1.6	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	<0.0005	0.00	No Limit

Method Blank (MB) and Laboratory Control Spike (LCS) Report

The quality control term Method / Laboratory Blank refers to an analyte free matrix to which all reagents are added in the same volumes or proportions as used in standard sample preparation. The purpose of this QC parameter is to monitor potential laboratory contamination. The quality control term Laboratory Control Spike (LCS) refers to a certified reference material, or a known interference free matrix spiked with target analytes. The purpose of this QC parameter is to monitor method precision and accuracy independent of sample matrix. Dynamic Recovery Limits are based on statistical evaluation of processed LCS.

Sub-Matrix: **SOIL**

				Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
Method: Compound	CAS Number	LOR	Unit	Result	Concentration	LCS	Low	High
EG005T: Total Metals by ICP-AES (QCLot: 2184945)								
EG005T: Arsenic	7440-38-2	5	mg/kg	<5	21.7 mg/kg	87.6	86	126
EG005T: Cadmium	7440-43-9	1	mg/kg	<1	4.64 mg/kg	101	83	113
EG005T: Chromium	7440-47-3	2	mg/kg	<2	43.9 mg/kg	109	76	128
EG005T: Copper	7440-50-8	5	mg/kg	<5	32 mg/kg	102	86	120
EG005T: Lead	7439-92-1	5	mg/kg	<5	40 mg/kg	95.4	80	114
EG005T: Nickel	7440-02-0	2	mg/kg	<2	55 mg/kg	108	87	123
EG005T: Zinc	7440-66-6	5	mg/kg	<5	60.8 mg/kg	105	80	122
EG005T: Total Metals by ICP-AES (QCLot: 2185046)								
EG005T: Arsenic	7440-38-2	5	mg/kg	<5	21.7 mg/kg	91.3	86	126
EG005T: Cadmium	7440-43-9	1	mg/kg	<1	4.64 mg/kg	108	83	113
EG005T: Chromium	7440-47-3	2	mg/kg	<2	43.9 mg/kg	92.7	76	128
EG005T: Copper	7440-50-8	5	mg/kg	<5	32 mg/kg	102	86	120
EG005T: Lead	7439-92-1	5	mg/kg	<5	40 mg/kg	106	80	114
EG005T: Nickel	7440-02-0	2	mg/kg	<2	55 mg/kg	108	87	123
EG005T: Zinc	7440-66-6	5	mg/kg	<5	60.8 mg/kg	104	80	122
EG005T: Total Metals by ICP-AES (QCLot: 2185048)								
EG005T: Arsenic	7440-38-2	5	mg/kg	<5	21.7 mg/kg	110	86	126
EG005T: Cadmium	7440-43-9	1	mg/kg	<1	4.64 mg/kg	102	83	113
EG005T: Chromium	7440-47-3	2	mg/kg	<2	43.9 mg/kg	90.2	76	128
EG005T: Copper	7440-50-8	5	mg/kg	<5	32 mg/kg	97.5	86	120
EG005T: Lead	7439-92-1	5	mg/kg	<5	40 mg/kg	99.8	80	114
EG005T: Nickel	7440-02-0	2	mg/kg	<2	55 mg/kg	102	87	123
EG005T: Zinc	7440-66-6	5	mg/kg	<5	60.8 mg/kg	108	80	122
EG005T: Total Metals by ICP-AES (QCLot: 2187356)								
EG005T: Arsenic	7440-38-2	5	mg/kg	<5	21.7 mg/kg	104	86	126
EG005T: Cadmium	7440-43-9	1	mg/kg	<1	4.64 mg/kg	103	83	113
EG005T: Chromium	7440-47-3	2	mg/kg	<2	43.9 mg/kg	95.0	76	128
EG005T: Copper	7440-50-8	5	mg/kg	<5	32 mg/kg	95.2	86	120
EG005T: Lead	7439-92-1	5	mg/kg	<5	40 mg/kg	102	80	114
EG005T: Nickel	7440-02-0	2	mg/kg	<2	55 mg/kg	103	87	123
EG005T: Zinc	7440-66-6	5	mg/kg	<5	60.8 mg/kg	102	80	122
EG035T: Total Recoverable Mercury by FIMS (QCLot: 2184946)								
EG035T: Mercury	7439-97-6	0.1	mg/kg	<0.1	2.57 mg/kg	84.8	70	105
EG035T: Total Recoverable Mercury by FIMS (QCLot: 2185047)								

Sub-Matrix: **SOIL**

				Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
Method: Compound	CAS Number	LOR	Unit	Result	Concentration	LCS	Low	High
EG035T: Total Recoverable Mercury by FIMS (QCLot: 2185047) - continued								
EG035T: Mercury	7439-97-6	0.1	mg/kg	<0.1	2.57 mg/kg	81.7	70	105
EG035T: Total Recoverable Mercury by FIMS (QCLot: 2185049)								
EG035T: Mercury	7439-97-6	0.1	mg/kg	<0.1	2.57 mg/kg	72.3	70	105
EG035T: Total Recoverable Mercury by FIMS (QCLot: 2187357)								
EG035T: Mercury	7439-97-6	0.1	mg/kg	<0.1	2.57 mg/kg	75.4	70	105
EP066: Polychlorinated Biphenyls (PCB) (QCLot: 2184392)								
EP066: Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	1 mg/kg	104	62	126
EP066: Polychlorinated Biphenyls (PCB) (QCLot: 2185546)								
EP066: Total Polychlorinated biphenyls	----	0.1	mg/kg	<0.1	1 mg/kg	95.0	62	126
EP068A: Organochlorine Pesticides (OC) (QCLot: 2184389)								
EP068: alpha-BHC	319-84-6	0.05	mg/kg	<0.05	0.5 mg/kg	95.6	69	113
EP068: Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	0.5 mg/kg	89.4	65	117
EP068: beta-BHC	319-85-7	0.05	mg/kg	<0.05	0.5 mg/kg	88.1	67	119
EP068: gamma-BHC	58-89-9	0.05	mg/kg	<0.05	0.5 mg/kg	104	68	116
EP068: delta-BHC	319-86-8	0.05	mg/kg	<0.05	0.5 mg/kg	102	65	117
EP068: Heptachlor	76-44-8	0.05	mg/kg	<0.05	0.5 mg/kg	108	67	115
EP068: Aldrin	309-00-2	0.05	mg/kg	<0.05	0.5 mg/kg	109	69	115
EP068: Heptachlor epoxide	1024-57-3	0.05	mg/kg	<0.05	0.5 mg/kg	103	62	118
EP068: trans-Chlordane	5103-74-2	0.05	mg/kg	<0.05	0.5 mg/kg	89.9	63	117
EP068: alpha-Endosulfan	959-98-8	0.05	mg/kg	<0.05	0.5 mg/kg	99.5	66	116
EP068: cis-Chlordane	5103-71-9	0.05	mg/kg	<0.05	0.5 mg/kg	95.0	64	116
EP068: Dieldrin	60-57-1	0.05	mg/kg	<0.05	0.5 mg/kg	104	66	116
EP068: 4.4`-DDE	72-55-9	0.05	mg/kg	<0.05	0.5 mg/kg	100	67	115
EP068: Endrin	72-20-8	0.05	mg/kg	<0.05	0.5 mg/kg	97.6	67	123
EP068: beta-Endosulfan	33213-65-9	0.05	mg/kg	<0.05	0.5 mg/kg	99.2	69	115
EP068: 4.4`-DDD	72-54-8	0.05	mg/kg	<0.05	0.5 mg/kg	98.9	69	121
EP068: Endrin aldehyde	7421-93-4	0.05	mg/kg	<0.05	0.5 mg/kg	87.6	56	120
EP068: Endosulfan sulfate	1031-07-8	0.05	mg/kg	<0.05	0.5 mg/kg	98.0	62	124
EP068: 4.4`-DDT	50-29-3	0.2	mg/kg	<0.2	0.5 mg/kg	89.5	66	120
EP068: Endrin ketone	53494-70-5	0.05	mg/kg	<0.05	0.5 mg/kg	89.6	64	122
EP068: Methoxychlor	72-43-5	0.2	mg/kg	<0.2	0.5 mg/kg	83.6	54	130
EP068A: Organochlorine Pesticides (OC) (QCLot: 2185543)								
EP068: alpha-BHC	319-84-6	0.05	mg/kg	<0.05	0.5 mg/kg	98.2	69	113
EP068: Hexachlorobenzene (HCB)	118-74-1	0.05	mg/kg	<0.05	0.5 mg/kg	90.4	65	117
EP068: beta-BHC	319-85-7	0.05	mg/kg	<0.05	0.5 mg/kg	90.5	67	119
EP068: gamma-BHC	58-89-9	0.05	mg/kg	<0.05	0.5 mg/kg	86.0	68	116
EP068: delta-BHC	319-86-8	0.05	mg/kg	<0.05	0.5 mg/kg	93.9	65	117
EP068: Heptachlor	76-44-8	0.05	mg/kg	<0.05	0.5 mg/kg	96.8	67	115

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP068A: Organochlorine Pesticides (OC) (QCLot: 2185543) - continued								
EP068: Aldrin	309-00-2	0.05	mg/kg	<0.05	0.5 mg/kg	79.9	69	115
EP068: Heptachlor epoxide	1024-57-3	0.05	mg/kg	<0.05	0.5 mg/kg	82.7	62	118
EP068: trans-Chlordane	5103-74-2	0.05	mg/kg	<0.05	0.5 mg/kg	98.4	63	117
EP068: alpha-Endosulfan	959-98-8	0.05	mg/kg	<0.05	0.5 mg/kg	104	66	116
EP068: cis-Chlordane	5103-71-9	0.05	mg/kg	<0.05	0.5 mg/kg	98.4	64	116
EP068: Dieldrin	60-57-1	0.05	mg/kg	<0.05	0.5 mg/kg	104	66	116
EP068: 4.4`-DDE	72-55-9	0.05	mg/kg	<0.05	0.5 mg/kg	104	67	115
EP068: Endrin	72-20-8	0.05	mg/kg	<0.05	0.5 mg/kg	104	67	123
EP068: beta-Endosulfan	33213-65-9	0.05	mg/kg	<0.05	0.5 mg/kg	108	69	115
EP068: 4.4`-DDD	72-54-8	0.05	mg/kg	<0.05	0.5 mg/kg	105	69	121
EP068: Endrin aldehyde	7421-93-4	0.05	mg/kg	<0.05	0.5 mg/kg	84.2	56	120
EP068: Endosulfan sulfate	1031-07-8	0.05	mg/kg	<0.05	0.5 mg/kg	101	62	124
EP068: 4.4`-DDT	50-29-3	0.2	mg/kg	<0.2	0.5 mg/kg	90.8	66	120
EP068: Endrin ketone	53494-70-5	0.05	mg/kg	<0.05	0.5 mg/kg	92.3	64	122
EP068: Methoxychlor	72-43-5	0.2	mg/kg	<0.2	0.5 mg/kg	84.2	54	130
EP068B: Organophosphorus Pesticides (OP) (QCLot: 2184389)								
EP068: Dichlorvos	62-73-7	0.05	mg/kg	<0.05	0.5 mg/kg	86.6	59	119
EP068: Demeton-S-methyl	919-86-8	0.05	mg/kg	<0.05	0.5 mg/kg	91.4	62	128
EP068: Monocrotophos	6923-22-4	0.2	mg/kg	<0.2	0.5 mg/kg	84.5	54	126
EP068: Dimethoate	60-51-5	0.05	mg/kg	<0.05	0.5 mg/kg	90.4	67	119
EP068: Diazinon	333-41-5	0.05	mg/kg	<0.05	0.5 mg/kg	93.0	70	120
EP068: Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg	<0.05	0.5 mg/kg	95.5	72	120
EP068: Parathion-methyl	298-00-0	0.2	mg/kg	<0.2	0.5 mg/kg	89.3	68	120
EP068: Malathion	121-75-5	0.05	mg/kg	<0.05	0.5 mg/kg	90.4	68	122
EP068: Fenthion	55-38-9	0.05	mg/kg	<0.05	0.5 mg/kg	98.4	69	117
EP068: Chlorpyrifos	2921-88-2	0.05	mg/kg	<0.05	0.5 mg/kg	96.8	76	118
EP068: Parathion	56-38-2	0.2	mg/kg	<0.2	0.5 mg/kg	92.4	64	122
EP068: Pirimphos-ethyl	23505-41-1	0.05	mg/kg	<0.05	0.5 mg/kg	94.0	70	116
EP068: Chlorfenvinphos	470-90-6	0.05	mg/kg	<0.05	0.5 mg/kg	83.0	69	121
EP068: Bromophos-ethyl	4824-78-6	0.05	mg/kg	<0.05	0.5 mg/kg	97.2	66	118
EP068: Fenamiphos	22224-92-6	0.05	mg/kg	<0.05	0.5 mg/kg	76.0	68	124
EP068: Prothiofos	34643-46-4	0.05	mg/kg	<0.05	0.5 mg/kg	100	62	112
EP068: Ethion	563-12-2	0.05	mg/kg	<0.05	0.5 mg/kg	89.0	68	120
EP068: Carbophenothion	786-19-6	0.05	mg/kg	<0.05	0.5 mg/kg	95.2	65	127
EP068: Azinphos Methyl	86-50-0	0.05	mg/kg	<0.05	0.5 mg/kg	62.4	41	123
EP068B: Organophosphorus Pesticides (OP) (QCLot: 2185543)								
EP068: Dichlorvos	62-73-7	0.05	mg/kg	<0.05	0.5 mg/kg	79.9	59	119
EP068: Demeton-S-methyl	919-86-8	0.05	mg/kg	<0.05	0.5 mg/kg	94.2	62	128
EP068: Monocrotophos	6923-22-4	0.2	mg/kg	<0.2	0.5 mg/kg	83.7	54	126

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP068B: Organophosphorus Pesticides (OP) (QCLot: 2185543) - continued								
EP068: Dimethoate	60-51-5	0.05	mg/kg	<0.05	0.5 mg/kg	105	67	119
EP068: Diazinon	333-41-5	0.05	mg/kg	<0.05	0.5 mg/kg	104	70	120
EP068: Chlorpyrifos-methyl	5598-13-0	0.05	mg/kg	<0.05	0.5 mg/kg	98.5	72	120
EP068: Parathion-methyl	298-00-0	0.2	mg/kg	<0.2	0.5 mg/kg	97.8	68	120
EP068: Malathion	121-75-5	0.05	mg/kg	<0.05	0.5 mg/kg	78.6	68	122
EP068: Fenthion	55-38-9	0.05	mg/kg	<0.05	0.5 mg/kg	99.1	69	117
EP068: Chlorpyrifos	2921-88-2	0.05	mg/kg	<0.05	0.5 mg/kg	87.9	76	118
EP068: Parathion	56-38-2	0.2	mg/kg	<0.2	0.5 mg/kg	90.1	64	122
EP068: Pirimphos-ethyl	23505-41-1	0.05	mg/kg	<0.05	0.5 mg/kg	92.6	70	116
EP068: Chlorfenvinphos	470-90-6	0.05	mg/kg	<0.05	0.5 mg/kg	88.3	69	121
EP068: Bromophos-ethyl	4824-78-6	0.05	mg/kg	<0.05	0.5 mg/kg	77.5	66	118
EP068: Fenamiphos	22224-92-6	0.05	mg/kg	<0.05	0.5 mg/kg	92.7	68	124
EP068: Prothiofos	34643-46-4	0.05	mg/kg	<0.05	0.5 mg/kg	107	62	112
EP068: Ethion	563-12-2	0.05	mg/kg	<0.05	0.5 mg/kg	99.9	68	120
EP068: Carbophenothion	786-19-6	0.05	mg/kg	<0.05	0.5 mg/kg	88.1	65	127
EP068: Azinphos Methyl	86-50-0	0.05	mg/kg	<0.05	0.5 mg/kg	74.2	41	123
EP074A: Monocyclic Aromatic Hydrocarbons (QCLot: 2184164)								
EP074: Styrene	100-42-5	0.5	mg/kg	<0.5	1 mg/kg	101	67	113
EP074: Isopropylbenzene	98-82-8	0.5	mg/kg	<0.5	1 mg/kg	106	65	117
EP074: n-Propylbenzene	103-65-1	0.5	mg/kg	<0.5	1 mg/kg	106	66	122
EP074: 1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg	<0.5	1 mg/kg	108	68	118
EP074: sec-Butylbenzene	135-98-8	0.5	mg/kg	<0.5	1 mg/kg	109	69	119
EP074: 1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg	<0.5	1 mg/kg	109	69	117
EP074: tert-Butylbenzene	98-06-6	0.5	mg/kg	<0.5	1 mg/kg	110	69	115
EP074: p-Isopropyltoluene	99-87-6	0.5	mg/kg	<0.5	1 mg/kg	107	66	118
EP074: n-Butylbenzene	104-51-8	0.5	mg/kg	<0.5	1 mg/kg	108	59	125
EP074A: Monocyclic Aromatic Hydrocarbons (QCLot: 2184167)								
EP074: Styrene	100-42-5	0.5	mg/kg	<0.5	1 mg/kg	105	67	113
EP074: Isopropylbenzene	98-82-8	0.5	mg/kg	<0.5	1 mg/kg	102	65	117
EP074: n-Propylbenzene	103-65-1	0.5	mg/kg	<0.5	1 mg/kg	100	66	122
EP074: 1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg	<0.5	1 mg/kg	101	68	118
EP074: sec-Butylbenzene	135-98-8	0.5	mg/kg	<0.5	1 mg/kg	100	69	119
EP074: 1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg	<0.5	1 mg/kg	103	69	117
EP074: tert-Butylbenzene	98-06-6	0.5	mg/kg	<0.5	1 mg/kg	102	69	115
EP074: p-Isopropyltoluene	99-87-6	0.5	mg/kg	<0.5	1 mg/kg	99.1	66	118
EP074: n-Butylbenzene	104-51-8	0.5	mg/kg	<0.5	1 mg/kg	100	59	125
EP074A: Monocyclic Aromatic Hydrocarbons (QCLot: 2186000)								
EP074: Styrene	100-42-5	0.5	mg/kg	<0.5	1 mg/kg	98.0	67	113

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP074A: Monocyclic Aromatic Hydrocarbons (QCLot: 2186000) - continued								
EP074: Isopropylbenzene	98-82-8	0.5	mg/kg	<0.5	1 mg/kg	101	65	117
EP074: n-Propylbenzene	103-65-1	0.5	mg/kg	<0.5	1 mg/kg	94.9	66	122
EP074: 1.3.5-Trimethylbenzene	108-67-8	0.5	mg/kg	<0.5	1 mg/kg	98.1	68	118
EP074: sec-Butylbenzene	135-98-8	0.5	mg/kg	<0.5	1 mg/kg	100	69	119
EP074: 1.2.4-Trimethylbenzene	95-63-6	0.5	mg/kg	<0.5	1 mg/kg	99.6	69	117
EP074: tert-Butylbenzene	98-06-6	0.5	mg/kg	<0.5	1 mg/kg	99.8	69	115
EP074: p-Isopropyltoluene	99-87-6	0.5	mg/kg	<0.5	1 mg/kg	99.5	66	118
EP074: n-Butylbenzene	104-51-8	0.5	mg/kg	<0.5	1 mg/kg	96.7	59	125
EP074B: Oxygenated Compounds (QCLot: 2184164)								
EP074: Vinyl Acetate	108-05-4	5	mg/kg	<5	10 mg/kg	70.9	30	156
EP074: 2-Butanone (MEK)	78-93-3	5	mg/kg	<5	10 mg/kg	91.5	58	136
EP074: 4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg	<5	10 mg/kg	94.7	62	132
EP074: 2-Hexanone (MBK)	591-78-6	5	mg/kg	<5	10 mg/kg	83.5	54	136
EP074B: Oxygenated Compounds (QCLot: 2184167)								
EP074: Vinyl Acetate	108-05-4	5	mg/kg	<5	10 mg/kg	72.3	30	156
EP074: 2-Butanone (MEK)	78-93-3	5	mg/kg	<5	10 mg/kg	61.7	58	136
EP074: 4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg	<5	10 mg/kg	100	62	132
EP074: 2-Hexanone (MBK)	591-78-6	5	mg/kg	<5	10 mg/kg	64.5	54	136
EP074B: Oxygenated Compounds (QCLot: 2186000)								
EP074: Vinyl Acetate	108-05-4	5	mg/kg	<5	10 mg/kg	69.7	30	156
EP074: 2-Butanone (MEK)	78-93-3	5	mg/kg	<5	10 mg/kg	94.0	58	136
EP074: 4-Methyl-2-pentanone (MIBK)	108-10-1	5	mg/kg	<5	10 mg/kg	74.2	62	132
EP074: 2-Hexanone (MBK)	591-78-6	5	mg/kg	<5	10 mg/kg	78.3	54	136
EP074C: Sulfonated Compounds (QCLot: 2184164)								
EP074: Carbon disulfide	75-15-0	0.5	mg/kg	<0.5	1 mg/kg	82.3	54	126
EP074C: Sulfonated Compounds (QCLot: 2184167)								
EP074: Carbon disulfide	75-15-0	0.5	mg/kg	<0.5	1 mg/kg	69.1	54	126
EP074C: Sulfonated Compounds (QCLot: 2186000)								
EP074: Carbon disulfide	75-15-0	0.5	mg/kg	<0.5	1 mg/kg	79.6	54	126
EP074D: Fumigants (QCLot: 2184164)								
EP074: 2.2-Dichloropropane	594-20-7	0.5	mg/kg	<0.5	1 mg/kg	103	60	126
EP074: 1.2-Dichloropropane	78-87-5	0.5	mg/kg	<0.5	1 mg/kg	106	68	124
EP074: cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg	<0.5	1 mg/kg	99.0	51	119
EP074: trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg	<0.5	1 mg/kg	96.0	52	114
EP074: 1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg	<0.5	1 mg/kg	102	63	115
EP074D: Fumigants (QCLot: 2184167)								
EP074: 2.2-Dichloropropane	594-20-7	0.5	mg/kg	<0.5	1 mg/kg	94.0	60	126

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP074D: Fumigants (QCLot: 2184167) - continued								
EP074: 1.2-Dichloropropane	78-87-5	0.5	mg/kg	<0.5	1 mg/kg	104	68	124
EP074: cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg	<0.5	1 mg/kg	100	51	119
EP074: trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg	<0.5	1 mg/kg	98.8	52	114
EP074: 1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg	<0.5	1 mg/kg	110	63	115
EP074D: Fumigants (QCLot: 2186000)								
EP074: 2.2-Dichloropropane	594-20-7	0.5	mg/kg	<0.5	1 mg/kg	90.2	60	126
EP074: 1.2-Dichloropropane	78-87-5	0.5	mg/kg	<0.5	1 mg/kg	88.0	68	124
EP074: cis-1.3-Dichloropropylene	10061-01-5	0.5	mg/kg	<0.5	1 mg/kg	87.4	51	119
EP074: trans-1.3-Dichloropropylene	10061-02-6	0.5	mg/kg	<0.5	1 mg/kg	82.7	52	114
EP074: 1.2-Dibromoethane (EDB)	106-93-4	0.5	mg/kg	<0.5	1 mg/kg	93.0	63	115
EP074E: Halogenated Aliphatic Compounds (QCLot: 2184164)								
EP074: Dichlorodifluoromethane	75-71-8	5	mg/kg	<5	10 mg/kg	55.2	30	148
EP074: Chloromethane	74-87-3	5	mg/kg	<5	10 mg/kg	75.3	41	141
EP074: Vinyl chloride	75-01-4	5	mg/kg	<5	10 mg/kg	81.2	43	147
EP074: Bromomethane	74-83-9	5	mg/kg	<5	10 mg/kg	88.5	47	141
EP074: Chloroethane	75-00-3	5	mg/kg	<5	10 mg/kg	92.5	49	143
EP074: Trichlorofluoromethane	75-69-4	5	mg/kg	<5	10 mg/kg	93.9	49	135
EP074: 1.1-Dichloroethene	75-35-4	0.5	mg/kg	<0.5	1 mg/kg	97.7	54	126
EP074: Iodomethane	74-88-4	0.5	mg/kg	<0.5	1 mg/kg	73.0	43	129
EP074: trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg	<0.5	1 mg/kg	99.1	64	120
EP074: 1.1-Dichloroethane	75-34-3	0.5	mg/kg	<0.5	1 mg/kg	104	67	125
EP074: cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg	<0.5	1 mg/kg	103	69	121
EP074: 1.1.1-Trichloroethane	71-55-6	0.5	mg/kg	<0.5	1 mg/kg	106	65	117
EP074: 1.1-Dichloropropylene	563-58-6	0.5	mg/kg	<0.5	1 mg/kg	103	65	123
EP074: Carbon Tetrachloride	56-23-5	0.5	mg/kg	<0.5	1 mg/kg	98.9	59	125
EP074: 1.2-Dichloroethane	107-06-2	0.5	mg/kg	<0.5	1 mg/kg	106	65	125
EP074: Trichloroethene	79-01-6	0.5	mg/kg	<0.5	1 mg/kg	106	70	118
EP074: Dibromomethane	74-95-3	0.5	mg/kg	<0.5	1 mg/kg	102	68	118
EP074: 1.1.2-Trichloroethane	79-00-5	0.5	mg/kg	<0.5	1 mg/kg	105	64	126
EP074: 1.3-Dichloropropane	142-28-9	0.5	mg/kg	<0.5	1 mg/kg	104	68	122
EP074: Tetrachloroethene	127-18-4	0.5	mg/kg	<0.5	1 mg/kg	110	67	143
EP074: 1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg	<0.5	1 mg/kg	104	62	122
EP074: trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg	<0.5	1 mg/kg	88.4	54	128
EP074: cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg	<0.5	1 mg/kg	95.6	55	129
EP074: 1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg	<0.5	1 mg/kg	97.8	65	121
EP074: 1.2.3-Trichloropropane	96-18-4	0.5	mg/kg	<0.5	1 mg/kg	103	61	125
EP074: Pentachloroethane	76-01-7	0.5	mg/kg	<0.5	1 mg/kg	94.7	20	134
EP074: 1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg	<0.5	1 mg/kg	95.5	53	129

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP074E: Halogenated Aliphatic Compounds (QCLot: 2184167)								
EP074: Dichlorodifluoromethane	75-71-8	5	mg/kg	<5	10 mg/kg	37.0	30	148
EP074: Chloromethane	74-87-3	5	mg/kg	<5	10 mg/kg	57.3	41	141
EP074: Vinyl chloride	75-01-4	5	mg/kg	<5	10 mg/kg	68.4	43	147
EP074: Bromomethane	74-83-9	5	mg/kg	<5	10 mg/kg	72.6	47	141
EP074: Chloroethane	75-00-3	5	mg/kg	<5	10 mg/kg	76.8	49	143
EP074: Trichlorofluoromethane	75-69-4	5	mg/kg	<5	10 mg/kg	79.7	49	135
EP074: 1.1-Dichloroethene	75-35-4	0.5	mg/kg	<0.5	1 mg/kg	84.3	54	126
EP074: Iodomethane	74-88-4	0.5	mg/kg	<0.5	1 mg/kg	60.8	43	129
EP074: trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg	<0.5	1 mg/kg	91.3	64	120
EP074: 1.1-Dichloroethane	75-34-3	0.5	mg/kg	<0.5	1 mg/kg	95.7	67	125
EP074: cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg	<0.5	1 mg/kg	100	69	121
EP074: 1.1.1-Trichloroethane	71-55-6	0.5	mg/kg	<0.5	1 mg/kg	97.9	65	117
EP074: 1.1-Dichloropropylene	563-58-6	0.5	mg/kg	<0.5	1 mg/kg	96.6	65	123
EP074: Carbon Tetrachloride	56-23-5	0.5	mg/kg	<0.5	1 mg/kg	94.6	59	125
EP074: 1.2-Dichloroethane	107-06-2	0.5	mg/kg	<0.5	1 mg/kg	105	65	125
EP074: Trichloroethene	79-01-6	0.5	mg/kg	<0.5	1 mg/kg	101	70	118
EP074: Dibromomethane	74-95-3	0.5	mg/kg	<0.5	1 mg/kg	102	68	118
EP074: 1.1.2-Trichloroethane	79-00-5	0.5	mg/kg	<0.5	1 mg/kg	108	64	126
EP074: 1.3-Dichloropropane	142-28-9	0.5	mg/kg	<0.5	1 mg/kg	107	68	122
EP074: Tetrachloroethene	127-18-4	0.5	mg/kg	<0.5	1 mg/kg	101	67	143
EP074: 1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg	<0.5	1 mg/kg	105	62	122
EP074: trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg	<0.5	1 mg/kg	103	54	128
EP074: cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg	<0.5	1 mg/kg	106	55	129
EP074: 1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg	<0.5	1 mg/kg	105	65	121
EP074: 1.2.3-Trichloropropane	96-18-4	0.5	mg/kg	<0.5	1 mg/kg	107	61	125
EP074: Pentachloroethane	76-01-7	0.5	mg/kg	<0.5	1 mg/kg	96.8	20	134
EP074: 1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg	<0.5	1 mg/kg	107	53	129
EP074E: Halogenated Aliphatic Compounds (QCLot: 2186000)								
EP074: Dichlorodifluoromethane	75-71-8	5	mg/kg	<5	10 mg/kg	83.1	30	148
EP074: Chloromethane	74-87-3	5	mg/kg	<5	10 mg/kg	82.6	41	141
EP074: Vinyl chloride	75-01-4	5	mg/kg	<5	10 mg/kg	86.3	43	147
EP074: Bromomethane	74-83-9	5	mg/kg	<5	10 mg/kg	91.1	47	141
EP074: Chloroethane	75-00-3	5	mg/kg	<5	10 mg/kg	101	49	143
EP074: Trichlorofluoromethane	75-69-4	5	mg/kg	<5	10 mg/kg	92.8	49	135
EP074: 1.1-Dichloroethene	75-35-4	0.5	mg/kg	<0.5	1 mg/kg	91.0	54	126
EP074: Iodomethane	74-88-4	0.5	mg/kg	<0.5	1 mg/kg	86.6	43	129
EP074: trans-1.2-Dichloroethene	156-60-5	0.5	mg/kg	<0.5	1 mg/kg	94.6	64	120
EP074: 1.1-Dichloroethane	75-34-3	0.5	mg/kg	<0.5	1 mg/kg	89.2	67	125
EP074: cis-1.2-Dichloroethene	156-59-2	0.5	mg/kg	<0.5	1 mg/kg	93.2	69	121

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP074E: Halogenated Aliphatic Compounds (QCLot: 2186000) - continued								
EP074: 1.1.1-Trichloroethane	71-55-6	0.5	mg/kg	<0.5	1 mg/kg	90.4	65	117
EP074: 1.1-Dichloropropylene	563-58-6	0.5	mg/kg	<0.5	1 mg/kg	91.2	65	123
EP074: Carbon Tetrachloride	56-23-5	0.5	mg/kg	<0.5	1 mg/kg	90.2	59	125
EP074: 1.2-Dichloroethane	107-06-2	0.5	mg/kg	<0.5	1 mg/kg	79.6	65	125
EP074: Trichloroethene	79-01-6	0.5	mg/kg	<0.5	1 mg/kg	93.1	70	118
EP074: Dibromomethane	74-95-3	0.5	mg/kg	<0.5	1 mg/kg	86.0	68	118
EP074: 1.1.2-Trichloroethane	79-00-5	0.5	mg/kg	<0.5	1 mg/kg	92.1	64	126
EP074: 1.3-Dichloropropane	142-28-9	0.5	mg/kg	<0.5	1 mg/kg	92.8	68	122
EP074: Tetrachloroethene	127-18-4	0.5	mg/kg	<0.5	1 mg/kg	104	67	143
EP074: 1.1.1.2-Tetrachloroethane	630-20-6	0.5	mg/kg	<0.5	1 mg/kg	97.8	62	122
EP074: trans-1.4-Dichloro-2-butene	110-57-6	0.5	mg/kg	<0.5	1 mg/kg	83.3	54	128
EP074: cis-1.4-Dichloro-2-butene	1476-11-5	0.5	mg/kg	<0.5	1 mg/kg	83.9	55	129
EP074: 1.1.2.2-Tetrachloroethane	79-34-5	0.5	mg/kg	<0.5	1 mg/kg	86.4	65	121
EP074: 1.2.3-Trichloropropane	96-18-4	0.5	mg/kg	<0.5	1 mg/kg	91.4	61	125
EP074: Pentachloroethane	76-01-7	0.5	mg/kg	<0.5	1 mg/kg	98.0	20	134
EP074: 1.2-Dibromo-3-chloropropane	96-12-8	0.5	mg/kg	<0.5	1 mg/kg	81.8	53	129
EP074F: Halogenated Aromatic Compounds (QCLot: 2184164)								
EP074: Chlorobenzene	108-90-7	0.5	mg/kg	<0.5	1 mg/kg	108	68	116
EP074: Bromobenzene	108-86-1	0.5	mg/kg	<0.5	1 mg/kg	109	70	114
EP074: 2-Chlorotoluene	95-49-8	0.5	mg/kg	<0.5	1 mg/kg	110	68	122
EP074: 4-Chlorotoluene	106-43-4	0.5	mg/kg	<0.5	1 mg/kg	109	67	123
EP074: 1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg	<0.5	1 mg/kg	108	52	122
EP074F: Halogenated Aromatic Compounds (QCLot: 2184167)								
EP074: Chlorobenzene	108-90-7	0.5	mg/kg	<0.5	1 mg/kg	105	68	116
EP074: Bromobenzene	108-86-1	0.5	mg/kg	<0.5	1 mg/kg	106	70	114
EP074: 2-Chlorotoluene	95-49-8	0.5	mg/kg	<0.5	1 mg/kg	105	68	122
EP074: 4-Chlorotoluene	106-43-4	0.5	mg/kg	<0.5	1 mg/kg	102	67	123
EP074: 1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg	<0.5	1 mg/kg	105	52	122
EP074F: Halogenated Aromatic Compounds (QCLot: 2186000)								
EP074: Chlorobenzene	108-90-7	0.5	mg/kg	<0.5	1 mg/kg	102	68	116
EP074: Bromobenzene	108-86-1	0.5	mg/kg	<0.5	1 mg/kg	96.9	70	114
EP074: 2-Chlorotoluene	95-49-8	0.5	mg/kg	<0.5	1 mg/kg	97.3	68	122
EP074: 4-Chlorotoluene	106-43-4	0.5	mg/kg	<0.5	1 mg/kg	94.0	67	123
EP074: 1.2.3-Trichlorobenzene	87-61-6	0.5	mg/kg	<0.5	1 mg/kg	98.9	52	122
EP074G: Trihalomethanes (QCLot: 2184164)								
EP074: Chloroform	67-66-3	0.5	mg/kg	<0.5	1 mg/kg	103	66	124
EP074: Bromodichloromethane	75-27-4	0.5	mg/kg	<0.5	1 mg/kg	96.2	61	121
EP074: Dibromochloromethane	124-48-1	0.5	mg/kg	<0.5	1 mg/kg	95.8	63	121

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP074G: Trihalomethanes (QCLot: 2184164) - continued								
EP074: Bromoform	75-25-2	0.5	mg/kg	<0.5	1 mg/kg	92.6	60	126
EP074G: Trihalomethanes (QCLot: 2184167)								
EP074: Chloroform	67-66-3	0.5	mg/kg	<0.5	1 mg/kg	99.6	66	124
EP074: Bromodichloromethane	75-27-4	0.5	mg/kg	<0.5	1 mg/kg	99.9	61	121
EP074: Dibromochloromethane	124-48-1	0.5	mg/kg	<0.5	1 mg/kg	103	63	121
EP074: Bromoform	75-25-2	0.5	mg/kg	<0.5	1 mg/kg	100	60	126
EP074G: Trihalomethanes (QCLot: 2186000)								
EP074: Chloroform	67-66-3	0.5	mg/kg	<0.5	1 mg/kg	90.2	66	124
EP074: Bromodichloromethane	75-27-4	0.5	mg/kg	<0.5	1 mg/kg	85.6	61	121
EP074: Dibromochloromethane	124-48-1	0.5	mg/kg	<0.5	1 mg/kg	88.7	63	121
EP074: Bromoform	75-25-2	0.5	mg/kg	<0.5	1 mg/kg	83.8	60	126
EP075A: Phenolic Compounds (QCLot: 2184391)								
EP075: Phenol	108-95-2	0.5	mg/kg	<0.5	1.5 mg/kg	94.1	64	114
EP075: 2-Chlorophenol	95-57-8	0.5	mg/kg	<0.5	1.5 mg/kg	90.1	57	115
EP075: 2-Methylphenol	95-48-7	0.5	mg/kg	<0.5	1.5 mg/kg	109	55	117
EP075: 3- & 4-Methylphenol	1319-77-3	0.5	mg/kg	<0.5	1.5 mg/kg	76.1	46	122
EP075: 2-Nitrophenol	88-75-5	0.5	mg/kg	<0.5	1.5 mg/kg	69.4	47	117
EP075: 2.4-Dimethylphenol	105-67-9	0.5	mg/kg	<0.5	1.5 mg/kg	89.4	14	108
EP075: 2.4-Dichlorophenol	120-83-2	0.5	mg/kg	<0.5	1.5 mg/kg	79.6	47	105
EP075: 2.6-Dichlorophenol	87-65-0	0.5	mg/kg	<0.5	1.5 mg/kg	104	48	110
EP075: 4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg	<0.5	1.5 mg/kg	97.5	57	113
EP075: 2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg	<0.5	1.5 mg/kg	64.2	49	109
EP075: 2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg	<0.5	1.5 mg/kg	# 117	49	107
EP075: Pentachlorophenol	87-86-5	1	mg/kg	<1	3 mg/kg	17.5	12	76
EP075A: Phenolic Compounds (QCLot: 2185545)								
EP075: Phenol	108-95-2	0.5	mg/kg	<0.5	1.5 mg/kg	104	64	114
EP075: 2-Chlorophenol	95-57-8	0.5	mg/kg	<0.5	1.5 mg/kg	91.6	57	115
EP075: 2-Methylphenol	95-48-7	0.5	mg/kg	<0.5	1.5 mg/kg	106	55	117
EP075: 3- & 4-Methylphenol	1319-77-3	0.5	mg/kg	<0.5	1.5 mg/kg	70.4	46	122
EP075: 2-Nitrophenol	88-75-5	0.5	mg/kg	<0.5	1.5 mg/kg	51.7	47	117
EP075: 2.4-Dimethylphenol	105-67-9	0.5	mg/kg	<0.5	1.5 mg/kg	101	14	108
EP075: 2.4-Dichlorophenol	120-83-2	0.5	mg/kg	<0.5	1.5 mg/kg	76.5	47	105
EP075: 2.6-Dichlorophenol	87-65-0	0.5	mg/kg	<0.5	1.5 mg/kg	76.6	48	110
EP075: 4-Chloro-3-methylphenol	59-50-7	0.5	mg/kg	<0.5	1.5 mg/kg	96.5	57	113
EP075: 2.4.6-Trichlorophenol	88-06-2	0.5	mg/kg	<0.5	1.5 mg/kg	59.7	49	109
EP075: 2.4.5-Trichlorophenol	95-95-4	0.5	mg/kg	<0.5	1.5 mg/kg	# 111	49	107
EP075: Pentachlorophenol	87-86-5	1	mg/kg	<1	3 mg/kg	20.5	12	76
EP075B: Polynuclear Aromatic Hydrocarbons (QCLot: 2184391)								

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP075B: Polynuclear Aromatic Hydrocarbons (QCLot: 2184391) - continued								
EP075: Naphthalene	91-20-3	0.5	mg/kg	<0.5	1.5 mg/kg	100	62	118
EP075: 2-Methylnaphthalene	91-57-6	0.5	mg/kg	<0.5	1.5 mg/kg	103	58	116
EP075: 2-Chloronaphthalene	91-58-7	0.5	mg/kg	<0.5	1.5 mg/kg	79.0	54	112
EP075: Acenaphthylene	208-96-8	0.5	mg/kg	<0.5	1.5 mg/kg	102	56	114
EP075: Acenaphthene	83-32-9	0.5	mg/kg	<0.5	1.5 mg/kg	93.9	62	112
EP075: Fluorene	86-73-7	0.5	mg/kg	<0.5	1.5 mg/kg	96.4	59	115
EP075: Phenanthrene	85-01-8	0.5	mg/kg	<0.5	1.5 mg/kg	95.2	63	113
EP075: Anthracene	120-12-7	0.5	mg/kg	<0.5	1.5 mg/kg	92.8	57	111
EP075: Fluoranthene	206-44-0	0.5	mg/kg	<0.5	1.5 mg/kg	98.7	58	114
EP075: Pyrene	129-00-0	0.5	mg/kg	<0.5	1.5 mg/kg	99.4	57	117
EP075: N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg	<0.5	1.5 mg/kg	106	58	114
EP075: Benz(a)anthracene	56-55-3	0.5	mg/kg	<0.5	1.5 mg/kg	113	59	115
EP075: Chrysene	218-01-9	0.5	mg/kg	<0.5	1.5 mg/kg	107	61	117
EP075: Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg	<1	3 mg/kg	95.5	57	119
EP075: 7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg	<0.5	1.5 mg/kg	99.9	48	106
EP075: Benzo(a)pyrene	50-32-8	0.5	mg/kg	<0.5	1.5 mg/kg	99.6	56	116
EP075: 3-Methylcholanthrene	56-49-5	0.5	mg/kg	<0.5	1.5 mg/kg	75.7	50	116
EP075: Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg	<0.5	1.5 mg/kg	86.5	55	117
EP075: Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg	<0.5	1.5 mg/kg	84.4	53	119
EP075: Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg	<0.5	1.5 mg/kg	88.0	56	120
EP075B: Polynuclear Aromatic Hydrocarbons (QCLot: 2185545)								
EP075: Naphthalene	91-20-3	0.5	mg/kg	<0.5	1.5 mg/kg	103	62	118
EP075: 2-Methylnaphthalene	91-57-6	0.5	mg/kg	<0.5	1.5 mg/kg	98.6	58	116
EP075: 2-Chloronaphthalene	91-58-7	0.5	mg/kg	<0.5	1.5 mg/kg	104	54	112
EP075: Acenaphthylene	208-96-8	0.5	mg/kg	<0.5	1.5 mg/kg	101	56	114
EP075: Acenaphthene	83-32-9	0.5	mg/kg	<0.5	1.5 mg/kg	95.6	62	112
EP075: Fluorene	86-73-7	0.5	mg/kg	<0.5	1.5 mg/kg	96.7	59	115
EP075: Phenanthrene	85-01-8	0.5	mg/kg	<0.5	1.5 mg/kg	89.4	63	113
EP075: Anthracene	120-12-7	0.5	mg/kg	<0.5	1.5 mg/kg	90.8	57	111
EP075: Fluoranthene	206-44-0	0.5	mg/kg	<0.5	1.5 mg/kg	95.2	58	114
EP075: Pyrene	129-00-0	0.5	mg/kg	<0.5	1.5 mg/kg	98.1	57	117
EP075: N-2-Fluorenyl Acetamide	53-96-3	0.5	mg/kg	<0.5	1.5 mg/kg	90.3	58	114
EP075: Benz(a)anthracene	56-55-3	0.5	mg/kg	<0.5	1.5 mg/kg	104	59	115
EP075: Chrysene	218-01-9	0.5	mg/kg	<0.5	1.5 mg/kg	105	61	117
EP075: Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	1	mg/kg	<1	3 mg/kg	94.1	57	119
EP075: 7.12-Dimethylbenz(a)anthracene	57-97-6	0.5	mg/kg	<0.5	1.5 mg/kg	98.7	48	106
EP075: Benzo(a)pyrene	50-32-8	0.5	mg/kg	<0.5	1.5 mg/kg	97.1	56	116

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP075B: Polynuclear Aromatic Hydrocarbons (QCLot: 2185545) - continued								
EP075: 3-Methylcholanthrene	56-49-5	0.5	mg/kg	<0.5	1.5 mg/kg	82.8	50	116
EP075: Indeno(1.2.3.cd)pyrene	193-39-5	0.5	mg/kg	<0.5	1.5 mg/kg	85.4	55	117
EP075: Dibenz(a.h)anthracene	53-70-3	0.5	mg/kg	<0.5	1.5 mg/kg	85.1	53	119
EP075: Benzo(g.h.i)perylene	191-24-2	0.5	mg/kg	<0.5	1.5 mg/kg	87.2	56	120
EP075C: Phthalate Esters (QCLot: 2184391)								
EP075: Dimethyl phthalate	131-11-3	0.5	mg/kg	<0.5	1.5 mg/kg	105	60	118
EP075: Diethyl phthalate	84-66-2	0.5	mg/kg	<0.5	1.5 mg/kg	99.0	65	115
EP075: Di-n-butyl phthalate	84-74-2	0.5	mg/kg	<0.5	1.5 mg/kg	96.4	65	121
EP075: Butyl benzyl phthalate	85-68-7	0.5	mg/kg	<0.5	1.5 mg/kg	106	62	116
EP075: bis(2-ethylhexyl) phthalate	117-81-7	----	mg/kg	----	1.5 mg/kg	89.9	69	133
EP075: Di-n-octylphthalate	117-84-0	0.5	mg/kg	<0.5	1.5 mg/kg	94.4	62	124
EP075C: Phthalate Esters (QCLot: 2185545)								
EP075: Dimethyl phthalate	131-11-3	0.5	mg/kg	<0.5	1.5 mg/kg	102	60	118
EP075: Diethyl phthalate	84-66-2	0.5	mg/kg	<0.5	1.5 mg/kg	97.9	65	115
EP075: Di-n-butyl phthalate	84-74-2	0.5	mg/kg	<0.5	1.5 mg/kg	94.5	65	121
EP075: Butyl benzyl phthalate	85-68-7	0.5	mg/kg	<0.5	1.5 mg/kg	98.4	62	116
EP075: bis(2-ethylhexyl) phthalate	117-81-7	----	mg/kg	----	1.5 mg/kg	92.0	69	133
EP075: Di-n-octylphthalate	117-84-0	0.5	mg/kg	<0.5	1.5 mg/kg	88.1	62	124
EP075D: Nitrosamines (QCLot: 2184391)								
EP075: N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg	<0.5	1.5 mg/kg	83.3	39	124
EP075: N-Nitrosodiethylamine	55-18-5	0.5	mg/kg	<0.5	1.5 mg/kg	96.0	59	117
EP075: N-Nitrosopyrrolidine	930-55-2	0.5	mg/kg	<0.5	1.5 mg/kg	111	53	125
EP075: N-Nitrosomorpholine	59-89-2	0.5	mg/kg	<0.5	1.5 mg/kg	108	65	121
EP075: N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg	<0.5	1.5 mg/kg	102	59	123
EP075: N-Nitrosopiperidine	100-75-4	0.5	mg/kg	<0.5	1.5 mg/kg	89.5	57	115
EP075: N-Nitrosodibutylamine	924-16-3	0.5	mg/kg	<0.5	1.5 mg/kg	102	57	119
EP075: N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	0.5	mg/kg	<0.6	3 mg/kg	95.9	42	112
EP075: Methapyrilene	91-80-5	0.5	mg/kg	<0.5	1.5 mg/kg	100	16	123
EP075D: Nitrosamines (QCLot: 2185545)								
EP075: N-Nitrosomethylethylamine	10595-95-6	0.5	mg/kg	<0.5	1.5 mg/kg	109	39	124
EP075: N-Nitrosodiethylamine	55-18-5	0.5	mg/kg	<0.5	1.5 mg/kg	104	59	117
EP075: N-Nitrosopyrrolidine	930-55-2	0.5	mg/kg	<0.5	1.5 mg/kg	112	53	125
EP075: N-Nitrosomorpholine	59-89-2	0.5	mg/kg	<0.5	1.5 mg/kg	113	65	121
EP075: N-Nitrosodi-n-propylamine	621-64-7	0.5	mg/kg	<0.5	1.5 mg/kg	104	59	123
EP075: N-Nitrosopiperidine	100-75-4	0.5	mg/kg	<0.5	1.5 mg/kg	100	57	115
EP075: N-Nitrosodibutylamine	924-16-3	0.5	mg/kg	<0.5	1.5 mg/kg	94.1	57	119

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report		
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP075D: Nitrosamines (QCLot: 2185545) - continued								
EP075: N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	0.5	mg/kg	<0.6	3 mg/kg	93.8	42	112
EP075: Methapyrilene	91-80-5	0.5	mg/kg	<0.5	1.5 mg/kg	102	16	123
EP075E: Nitroaromatics and Ketones (QCLot: 2184391)								
EP075: 2-Picoline	109-06-8	0.5	mg/kg	<0.5	1.5 mg/kg	77.8	27	129
EP075: Acetophenone	98-86-2	0.5	mg/kg	<0.5	1.5 mg/kg	97.2	60	116
EP075: Nitrobenzene	98-95-3	0.5	mg/kg	<0.5	1.5 mg/kg	94.7	65	119
EP075: Isophorone	78-59-1	0.5	mg/kg	<0.5	1.5 mg/kg	89.7	62	116
EP075: 2.6-Dinitrotoluene	606-20-2	0.5	mg/kg	<0.5	1.5 mg/kg	106	58	118
EP075: 2.4-Dinitrotoluene	121-14-2	0.5	mg/kg	<0.5	1.5 mg/kg	96.3	59	115
EP075: 1-Naphthylamine	134-32-7	0.5	mg/kg	<0.5	1.5 mg/kg	67.7	18	112
EP075: 4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg	<0.5	1.5 mg/kg	84.0	10	87
EP075: 5-Nitro-o-toluidine	99-55-8	0.5	mg/kg	<0.5	1.5 mg/kg	80.7	48	99
EP075: Azobenzene	103-33-3	1	mg/kg	<1	1.5 mg/kg	101	62	118
EP075: 1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg	<0.5	1.5 mg/kg	85.4	36	114
EP075: Phenacetin	62-44-2	0.5	mg/kg	<0.5	1.5 mg/kg	73.0	62	114
EP075: 4-Aminobiphenyl	92-67-1	0.5	mg/kg	<0.5	1.5 mg/kg	89.0	36	102
EP075: Pentachloronitrobenzene	82-68-8	0.5	mg/kg	<0.5	1.5 mg/kg	102	56	110
EP075: Pronamide	23950-58-5	0.5	mg/kg	<0.5	1.5 mg/kg	94.0	54	110
EP075: Dimethylaminoazobenzene	60-11-7	0.5	mg/kg	<0.5	1.5 mg/kg	99.9	48	108
EP075: Chlorobenzilate	510-15-6	0.5	mg/kg	<0.5	1.5 mg/kg	98.7	57	112
EP075E: Nitroaromatics and Ketones (QCLot: 2185545)								
EP075: 2-Picoline	109-06-8	0.5	mg/kg	<0.5	1.5 mg/kg	96.7	27	129
EP075: Acetophenone	98-86-2	0.5	mg/kg	<0.5	1.5 mg/kg	102	60	116
EP075: Nitrobenzene	98-95-3	0.5	mg/kg	<0.5	1.5 mg/kg	106	65	119
EP075: Isophorone	78-59-1	0.5	mg/kg	<0.5	1.5 mg/kg	102	62	116
EP075: 2.6-Dinitrotoluene	606-20-2	0.5	mg/kg	<0.5	1.5 mg/kg	101	58	118
EP075: 2.4-Dinitrotoluene	121-14-2	0.5	mg/kg	<0.5	1.5 mg/kg	91.4	59	115
EP075: 1-Naphthylamine	134-32-7	0.5	mg/kg	<0.5	1.5 mg/kg	71.5	18	112
EP075: 4-Nitroquinoline-N-oxide	56-57-5	0.5	mg/kg	<0.5	1.5 mg/kg	# 99.2	10	87
EP075: 5-Nitro-o-toluidine	99-55-8	0.5	mg/kg	<0.5	1.5 mg/kg	80.8	48	99
EP075: Azobenzene	103-33-3	1	mg/kg	<1	1.5 mg/kg	96.7	62	118
EP075: 1.3.5-Trinitrobenzene	99-35-4	0.5	mg/kg	<0.5	1.5 mg/kg	85.0	36	114
EP075: Phenacetin	62-44-2	0.5	mg/kg	<0.5	1.5 mg/kg	107	62	114
EP075: 4-Aminobiphenyl	92-67-1	0.5	mg/kg	<0.5	1.5 mg/kg	89.3	36	102
EP075: Pentachloronitrobenzene	82-68-8	0.5	mg/kg	<0.5	1.5 mg/kg	100	56	110
EP075: Pronamide	23950-58-5	0.5	mg/kg	<0.5	1.5 mg/kg	92.0	54	110
EP075: Dimethylaminoazobenzene	60-11-7	0.5	mg/kg	<0.5	1.5 mg/kg	94.7	48	108
EP075: Chlorobenzilate	510-15-6	0.5	mg/kg	<0.5	1.5 mg/kg	95.2	57	112

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP075F: Haloethers (QCLot: 2184391)								
EP075: Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg	<0.5	1.5 mg/kg	117	63	121
EP075: Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg	<0.5	1.5 mg/kg	87.6	59	115
EP075: 4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg	<0.5	1.5 mg/kg	94.5	58	112
EP075: 4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg	<0.5	1.5 mg/kg	95.0	58	110
EP075F: Haloethers (QCLot: 2185545)								
EP075: Bis(2-chloroethyl) ether	111-44-4	0.5	mg/kg	<0.5	1.5 mg/kg	99.4	63	121
EP075: Bis(2-chloroethoxy) methane	111-91-1	0.5	mg/kg	<0.5	1.5 mg/kg	96.6	59	115
EP075: 4-Chlorophenyl phenyl ether	7005-72-3	0.5	mg/kg	<0.5	1.5 mg/kg	97.3	58	112
EP075: 4-Bromophenyl phenyl ether	101-55-3	0.5	mg/kg	<0.5	1.5 mg/kg	95.7	58	110
EP075G: Chlorinated Hydrocarbons (QCLot: 2184391)								
EP075: 1.3-Dichlorobenzene	541-73-1	0.5	mg/kg	<0.5	1.5 mg/kg	90.7	58	112
EP075: 1.4-Dichlorobenzene	106-46-7	0.5	mg/kg	<0.5	1.5 mg/kg	94.1	58	116
EP075: 1.2-Dichlorobenzene	95-50-1	0.5	mg/kg	<0.5	1.5 mg/kg	102	57	115
EP075: Hexachloroethane	67-72-1	0.5	mg/kg	<0.5	1.5 mg/kg	88.5	54	116
EP075: 1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg	<0.5	1.5 mg/kg	86.0	63	108
EP075: Hexachloropropylene	1888-71-7	0.5	mg/kg	<0.5	1.5 mg/kg	91.1	39	110
EP075: Hexachlorobutadiene	87-68-3	0.5	mg/kg	<0.5	1.5 mg/kg	99.2	59	117
EP075: Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg	<2.5	1.5 mg/kg	36.5	24	108
EP075: Pentachlorobenzene	608-93-5	0.5	mg/kg	<0.5	1.5 mg/kg	95.7	57	109
EP075: Hexachlorobenzene (HCB)	118-74-1	0.5	mg/kg	<0.5	1.5 mg/kg	101	59	111
EP075G: Chlorinated Hydrocarbons (QCLot: 2185545)								
EP075: 1.3-Dichlorobenzene	541-73-1	0.5	mg/kg	<0.5	1.5 mg/kg	99.9	58	112
EP075: 1.4-Dichlorobenzene	106-46-7	0.5	mg/kg	<0.5	1.5 mg/kg	103	58	116
EP075: 1.2-Dichlorobenzene	95-50-1	0.5	mg/kg	<0.5	1.5 mg/kg	104	57	115
EP075: Hexachloroethane	67-72-1	0.5	mg/kg	<0.5	1.5 mg/kg	102	54	116
EP075: 1.2.4-Trichlorobenzene	120-82-1	0.5	mg/kg	<0.5	1.5 mg/kg	102	63	108
EP075: Hexachloropropylene	1888-71-7	0.5	mg/kg	<0.5	1.5 mg/kg	91.7	39	110
EP075: Hexachlorobutadiene	87-68-3	0.5	mg/kg	<0.5	1.5 mg/kg	104	59	117
EP075: Hexachlorocyclopentadiene	77-47-4	2.5	mg/kg	<2.5	1.5 mg/kg	78.9	24	108
EP075: Pentachlorobenzene	608-93-5	0.5	mg/kg	<0.5	1.5 mg/kg	98.3	57	109
EP075: Hexachlorobenzene (HCB)	118-74-1	0.5	mg/kg	<0.5	1.5 mg/kg	102	59	111
EP075H: Anilines and Benzidines (QCLot: 2184391)								
EP075: Aniline	62-53-3	0.5	mg/kg	<0.5	1.5 mg/kg	93.0	13	108
EP075: 4-Chloroaniline	106-47-8	0.5	mg/kg	<0.5	1.5 mg/kg	61.7	21	99
EP075: 2-Nitroaniline	88-74-4	0.5	mg/kg	<0.5	1.5 mg/kg	108	52	112
EP075: 3-Nitroaniline	99-09-2	0.5	mg/kg	<0.5	1.5 mg/kg	93.2	32	94
EP075: Dibenzofuran	132-64-9	0.5	mg/kg	<0.5	1.5 mg/kg	95.4	60	110
EP075: 4-Nitroaniline	100-01-8	0.5	mg/kg	<0.5	1.5 mg/kg	# 118	42	112

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP075H: Anilines and Benzidines (QCLot: 2184391) - continued								
EP075: Carbazole	86-74-8	0.5	mg/kg	<0.5	1.5 mg/kg	97.3	59	111
EP075: 3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg	<0.5	1.5 mg/kg	99.3	23	113
EP075H: Anilines and Benzidines (QCLot: 2185545)								
EP075: Aniline	62-53-3	0.5	mg/kg	<0.5	1.5 mg/kg	103	13	108
EP075: 4-Chloroaniline	106-47-8	0.5	mg/kg	<0.5	1.5 mg/kg	73.7	21	99
EP075: 2-Nitroaniline	88-74-4	0.5	mg/kg	<0.5	1.5 mg/kg	102	52	112
EP075: 3-Nitroaniline	99-09-2	0.5	mg/kg	<0.5	1.5 mg/kg	90.1	32	94
EP075: Dibenzofuran	132-64-9	0.5	mg/kg	<0.5	1.5 mg/kg	94.2	60	110
EP075: 4-Nitroaniline	100-01-8	0.5	mg/kg	<0.5	1.5 mg/kg	83.0	42	112
EP075: Carbazole	86-74-8	0.5	mg/kg	<0.5	1.5 mg/kg	93.8	59	111
EP075: 3.3`-Dichlorobenzidine	91-94-1	0.5	mg/kg	<0.5	1.5 mg/kg	95.5	23	113
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2184165)								
EP080: C6 - C9 Fraction	----	10	mg/kg	<10	26 mg/kg	97.8	68	128
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2184168)								
EP080: C6 - C9 Fraction	----	10	mg/kg	<10	26 mg/kg	98.2	68	128
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2184390)								
EP071: C10 - C14 Fraction	----	50	mg/kg	<50	300 mg/kg	104	75	129
EP071: C15 - C28 Fraction	----	100	mg/kg	<100	450 mg/kg	112	77	131
EP071: C29 - C36 Fraction	----	100	mg/kg	<100	300 mg/kg	101	71	129
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2185544)								
EP071: C10 - C14 Fraction	----	50	mg/kg	<50	300 mg/kg	109	75	129
EP071: C15 - C28 Fraction	----	100	mg/kg	<100	450 mg/kg	118	77	131
EP071: C29 - C36 Fraction	----	100	mg/kg	<100	300 mg/kg	112	71	129
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2185625)								
EP080: C6 - C9 Fraction	----	10	mg/kg	<10	26 mg/kg	90.0	68	128
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2186001)								
EP080: C6 - C9 Fraction	----	10	mg/kg	<10	26 mg/kg	89.9	68	128
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2184165)								
EP080: C6 - C10 Fraction	C6_C10	10	mg/kg	<10	31 mg/kg	103	68	128
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2184168)								
EP080: C6 - C10 Fraction	C6_C10	10	mg/kg	<10	31 mg/kg	97.8	68	128
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2184390)								
EP071: >C10 - C16 Fraction	----	50	mg/kg	<50	375 mg/kg	106	77	125
EP071: >C16 - C34 Fraction	----	100	mg/kg	<100	525 mg/kg	110	74	138
EP071: >C34 - C40 Fraction	----	100	mg/kg	<100	225 mg/kg	77.8	63	131
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2185544)								
EP071: >C10 - C16 Fraction	----	50	mg/kg	<50	375 mg/kg	112	77	125

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2185544) - continued								
EP071: >C16 - C34 Fraction	----	100	mg/kg	<100	525 mg/kg	117	74	138
EP071: >C34 - C40 Fraction	----	100	mg/kg	<100	225 mg/kg	108	63	131
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2185625)								
EP080: C6 - C10 Fraction	C6_C10	10	mg/kg	<10	31 mg/kg	89.6	68	128
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2186001)								
EP080: C6 - C10 Fraction	C6_C10	10	mg/kg	<10	31 mg/kg	87.6	68	128
EP080: BTEXN (QCLot: 2184165)								
EP080: Benzene	71-43-2	0.2	mg/kg	<0.2	1 mg/kg	98.1	62	116
EP080: Toluene	108-88-3	0.5	mg/kg	<0.5	1 mg/kg	99.6	67	121
EP080: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	1 mg/kg	99.5	65	117
EP080: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	2 mg/kg	99.4	66	118
EP080: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	1 mg/kg	100	68	120
EP080: Naphthalene	91-20-3	1	mg/kg	<1	1 mg/kg	103	63	119
EP080: BTEXN (QCLot: 2184168)								
EP080: Benzene	71-43-2	0.2	mg/kg	<0.2	1 mg/kg	102	62	116
EP080: Toluene	108-88-3	0.5	mg/kg	<0.5	1 mg/kg	107	67	121
EP080: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	1 mg/kg	105	65	117
EP080: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	2 mg/kg	103	66	118
EP080: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	1 mg/kg	106	68	120
EP080: Naphthalene	91-20-3	1	mg/kg	<1	1 mg/kg	98.3	63	119
EP080: BTEXN (QCLot: 2185625)								
EP080: Benzene	71-43-2	0.2	mg/kg	<0.2	1 mg/kg	88.0	62	116
EP080: Toluene	108-88-3	0.5	mg/kg	<0.5	1 mg/kg	92.0	67	121
EP080: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	1 mg/kg	89.3	65	117
EP080: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	2 mg/kg	88.7	66	118
EP080: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	1 mg/kg	94.4	68	120
EP080: Naphthalene	91-20-3	1	mg/kg	<1	1 mg/kg	88.6	63	119
EP080: BTEXN (QCLot: 2186001)								
EP080: Benzene	71-43-2	0.2	mg/kg	<0.2	1 mg/kg	91.4	62	116
EP080: Toluene	108-88-3	0.5	mg/kg	<0.5	1 mg/kg	96.2	67	121
EP080: Ethylbenzene	100-41-4	0.5	mg/kg	<0.5	1 mg/kg	94.9	65	117
EP080: meta- & para-Xylene	108-38-3 106-42-3	0.5	mg/kg	<0.5	2 mg/kg	93.1	66	118
EP080: ortho-Xylene	95-47-6	0.5	mg/kg	<0.5	1 mg/kg	95.3	68	120
EP080: Naphthalene	91-20-3	1	mg/kg	<1	1 mg/kg	87.9	63	119

Sub-Matrix: **SOIL**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 2184690)								
EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.0002	mg/kg	<0.0002	0.00125 mg/kg	119	57	121
EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.0002	mg/kg	<0.0002	0.00125 mg/kg	116	55	125
EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.0002	mg/kg	<0.0002	0.00125 mg/kg	101	52	126
EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.0002	mg/kg	<0.0002	0.00125 mg/kg	74.8	54	123
EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	70.4	55	127
EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.0002	mg/kg	<0.0002	0.00125 mg/kg	80.4	54	125
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 2184690)								
EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.001	mg/kg	<0.001	0.00625 mg/kg	85.0	52	128
EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.0002	mg/kg	<0.0002	0.00125 mg/kg	114	54	129
EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.0002	mg/kg	<0.0002	0.00125 mg/kg	98.8	58	127
EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.0002	mg/kg	<0.0002	0.00125 mg/kg	108	57	128
EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	79.6	60	134
EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	81.2	63	130
EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.0002	mg/kg	<0.0002	0.00125 mg/kg	80.4	55	130
EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.0002	mg/kg	<0.0002	0.00125 mg/kg	70.4	62	130
EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.0002	mg/kg	<0.0002	0.00125 mg/kg	67.6	53	134
EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.0002	mg/kg	<0.0002	0.00125 mg/kg	69.6	49	129
EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.0005	mg/kg	<0.0005	0.00312 mg/kg	92.3	59	129
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 2184690)								
EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.0002	mg/kg	<0.0002	0.00125 mg/kg	96.8	52	132
EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.0005	mg/kg	<0.0005	0.00312 mg/kg	76.6	65	126
EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.0005	mg/kg	<0.0005	0.00312 mg/kg	84.9	64	126
EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.0005	mg/kg	<0.0005	0.00312 mg/kg	72.0	63	124
EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.0005	mg/kg	<0.0005	0.00312 mg/kg	67.3	58	125
EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.0002	mg/kg	<0.0002	0.00125 mg/kg	72.4	61	130
EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.0002	mg/kg	<0.0002	0.00125 mg/kg	70.4	55	130
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 2184690)								
EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.0005	mg/kg	<0.0005	0.00125 mg/kg	114	54	130
EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.0005	mg/kg	<0.0005	0.00125 mg/kg	106	61	130
EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.0005	mg/kg	<0.0005	0.00125 mg/kg	95.2	62	130
EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.0005	mg/kg	<0.0005	0.00125 mg/kg	83.6	60	130

Matrix Spike (MS) Report

The quality control term Matrix Spike (MS) refers to an intralaboratory split sample spiked with a representative set of target analytes. The purpose of this QC parameter is to monitor potential matrix effects on analyte recoveries. Static Recovery Limits as per laboratory Data Quality Objectives (DQOs). Ideal recovery ranges stated may be waived in the event of sample matrix interference.

Sub-Matrix: **SOIL**

				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Recovery Limits (%)	
Laboratory sample ID	Client sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EG005T: Total Metals by ICP-AES (QCLot: 2184945)							
ES1904242-006	Anonymous	EG005T: Arsenic	7440-38-2	50 mg/kg	116	70	130
		EG005T: Cadmium	7440-43-9	50 mg/kg	101	70	130
		EG005T: Chromium	7440-47-3	50 mg/kg	97.6	70	130
		EG005T: Copper	7440-50-8	250 mg/kg	98.2	70	130
		EG005T: Lead	7439-92-1	250 mg/kg	94.5	70	130
		EG005T: Nickel	7440-02-0	50 mg/kg	96.3	70	130
		EG005T: Zinc	7440-66-6	250 mg/kg	98.4	70	130
EG005T: Total Metals by ICP-AES (QCLot: 2185046)							
ES1904527-025	BH34@0.3	EG005T: Arsenic	7440-38-2	50 mg/kg	104	70	130
		EG005T: Cadmium	7440-43-9	50 mg/kg	97.4	70	130
		EG005T: Chromium	7440-47-3	50 mg/kg	92.9	70	130
		EG005T: Copper	7440-50-8	250 mg/kg	99.8	70	130
		EG005T: Lead	7439-92-1	250 mg/kg	102	70	130
		EG005T: Nickel	7440-02-0	50 mg/kg	79.8	70	130
		EG005T: Zinc	7440-66-6	250 mg/kg	120	70	130
EG005T: Total Metals by ICP-AES (QCLot: 2185048)							
ES1904527-079	BH47@2.4	EG005T: Arsenic	7440-38-2	50 mg/kg	95.6	70	130
		EG005T: Cadmium	7440-43-9	50 mg/kg	96.7	70	130
		EG005T: Chromium	7440-47-3	50 mg/kg	100	70	130
		EG005T: Copper	7440-50-8	250 mg/kg	98.4	70	130
		EG005T: Lead	7439-92-1	250 mg/kg	98.3	70	130
		EG005T: Nickel	7440-02-0	50 mg/kg	97.1	70	130
		EG005T: Zinc	7440-66-6	250 mg/kg	100	70	130
EG035T: Total Recoverable Mercury by FIMS (QCLot: 2184946)							
ES1904242-006	Anonymous	EG035T: Mercury	7439-97-6	5 mg/kg	98.7	70	130
EG035T: Total Recoverable Mercury by FIMS (QCLot: 2185047)							
ES1904527-025	BH34@0.3	EG035T: Mercury	7439-97-6	5 mg/kg	90.2	70	130
EG035T: Total Recoverable Mercury by FIMS (QCLot: 2185049)							
ES1904527-079	BH47@2.4	EG035T: Mercury	7439-97-6	5 mg/kg	87.4	70	130
EG035T: Total Recoverable Mercury by FIMS (QCLot: 2187357)							
ES1904383-001	Anonymous	EG035T: Mercury	7439-97-6	5 mg/kg	95.3	70	130
EP066: Polychlorinated Biphenyls (PCB) (QCLot: 2184392)							
ES1904527-001	BH29@0.4	EP066: Total Polychlorinated biphenyls	----	1 mg/kg	107	70	130
EP066: Polychlorinated Biphenyls (PCB) (QCLot: 2185546)							

Sub-Matrix: **SOIL**

				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Recovery Limits (%)	
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*Concentration*	*MS*	*Low*	*High*
EP066: Polychlorinated Biphenyls (PCB) (QCLot: 2185546) - continued							
ES1904527-056	BH41@2.4	EP066: Total Polychlorinated biphenyls	----	1 mg/kg	99.0	70	130
EP068A: Organochlorine Pesticides (OC) (QCLot: 2184389)							
ES1904527-001	BH29@0.4	EP068: gamma-BHC	58-89-9	0.5 mg/kg	104	70	130
		EP068: Heptachlor	76-44-8	0.5 mg/kg	87.3	70	130
		EP068: Aldrin	309-00-2	0.5 mg/kg	104	70	130
		EP068: Dieldrin	60-57-1	0.5 mg/kg	94.2	70	130
		EP068: Endrin	72-20-8	2 mg/kg	90.1	70	130
		EP068: 4.4`-DDT	50-29-3	2 mg/kg	85.2	70	130
EP068A: Organochlorine Pesticides (OC) (QCLot: 2185543)							
ES1904527-056	BH41@2.4	EP068: gamma-BHC	58-89-9	0.5 mg/kg	103	70	130
		EP068: Heptachlor	76-44-8	0.5 mg/kg	94.0	70	130
		EP068: Aldrin	309-00-2	0.5 mg/kg	84.3	70	130
		EP068: Dieldrin	60-57-1	0.5 mg/kg	82.0	70	130
		EP068: Endrin	72-20-8	2 mg/kg	111	70	130
		EP068: 4.4`-DDT	50-29-3	2 mg/kg	106	70	130
EP068B: Organophosphorus Pesticides (OP) (QCLot: 2184389)							
ES1904527-001	BH29@0.4	EP068: Diazinon	333-41-5	0.5 mg/kg	74.4	70	130
		EP068: Chlorpyrifos-methyl	5598-13-0	0.5 mg/kg	75.0	70	130
		EP068: Pirimphos-ethyl	23505-41-1	0.5 mg/kg	93.0	70	130
		EP068: Bromophos-ethyl	4824-78-6	0.5 mg/kg	97.6	70	130
		EP068: Prothiofos	34643-46-4	0.5 mg/kg	76.0	70	130
EP068B: Organophosphorus Pesticides (OP) (QCLot: 2185543)							
ES1904527-056	BH41@2.4	EP068: Diazinon	333-41-5	0.5 mg/kg	102	70	130
		EP068: Chlorpyrifos-methyl	5598-13-0	0.5 mg/kg	86.4	70	130
		EP068: Pirimphos-ethyl	23505-41-1	0.5 mg/kg	72.1	70	130
		EP068: Bromophos-ethyl	4824-78-6	0.5 mg/kg	83.8	70	130
		EP068: Prothiofos	34643-46-4	0.5 mg/kg	108	70	130
EP074E: Halogenated Aliphatic Compounds (QCLot: 2184164)							
ES1904527-001	BH29@0.4	EP074: 1.1-Dichloroethene	75-35-4	2.5 mg/kg	91.6	70	130
		EP074: Trichloroethene	79-01-6	2.5 mg/kg	94.1	70	130
EP074E: Halogenated Aliphatic Compounds (QCLot: 2184167)							
ES1904527-056	BH41@2.4	EP074: 1.1-Dichloroethene	75-35-4	2.5 mg/kg	102	70	130
		EP074: Trichloroethene	79-01-6	2.5 mg/kg	93.7	70	130
EP074E: Halogenated Aliphatic Compounds (QCLot: 2186000)							
ES1904553-032	Anonymous	EP074: 1.1-Dichloroethene	75-35-4	2.5 mg/kg	81.6	70	130
		EP074: Trichloroethene	79-01-6	2.5 mg/kg	78.0	70	130

Sub-Matrix: **SOIL**

				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Recovery Limits (%)	
Laboratory sample ID	Client sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP074F: Halogenated Aromatic Compounds (QCLot: 2184164)							
ES1904527-001	BH29@0.4	EP074: Chlorobenzene	108-90-7	2.5 mg/kg	106	70	130
EP074F: Halogenated Aromatic Compounds (QCLot: 2184167)							
ES1904527-056	BH41@2.4	EP074: Chlorobenzene	108-90-7	2.5 mg/kg	103	70	130
EP074F: Halogenated Aromatic Compounds (QCLot: 2186000)							
ES1904553-032	Anonymous	EP074: Chlorobenzene	108-90-7	2.5 mg/kg	89.7	70	130
EP075A: Phenolic Compounds (QCLot: 2184391)							
ES1904527-001	BH29@0.4	EP075: Phenol	108-95-2	10 mg/kg	112	60	130
		EP075: 2-Chlorophenol	95-57-8	10 mg/kg	110	60	130
		EP075: 2-Nitrophenol	88-75-5	10 mg/kg	92.1	50	130
		EP075: 4-Chloro-3-methylphenol	59-50-7	10 mg/kg	105	50	130
		EP075: Pentachlorophenol	87-86-5	10 mg/kg	112	10	130
EP075A: Phenolic Compounds (QCLot: 2185545)							
ES1904527-056	BH41@2.4	EP075: Phenol	108-95-2	10 mg/kg	89.0	60	130
		EP075: 2-Chlorophenol	95-57-8	10 mg/kg	95.0	60	130
		EP075: 2-Nitrophenol	88-75-5	10 mg/kg	84.2	50	130
		EP075: 4-Chloro-3-methylphenol	59-50-7	10 mg/kg	110	50	130
		EP075: Pentachlorophenol	87-86-5	10 mg/kg	79.4	10	130
EP075B: Polynuclear Aromatic Hydrocarbons (QCLot: 2184391)							
ES1904527-001	BH29@0.4	EP075: Acenaphthene	83-32-9	10 mg/kg	108	50	130
		EP075: Pyrene	129-00-0	10 mg/kg	92.8	50	130
EP075B: Polynuclear Aromatic Hydrocarbons (QCLot: 2185545)							
ES1904527-056	BH41@2.4	EP075: Acenaphthene	83-32-9	10 mg/kg	104	50	130
		EP075: Pyrene	129-00-0	10 mg/kg	105	50	130
EP075D: Nitrosamines (QCLot: 2184391)							
ES1904527-001	BH29@0.4	EP075: N-Nitrosodi-n-propylamine	621-64-7	10 mg/kg	116	50	130
EP075D: Nitrosamines (QCLot: 2185545)							
ES1904527-056	BH41@2.4	EP075: N-Nitrosodi-n-propylamine	621-64-7	10 mg/kg	105	50	130
EP075E: Nitroaromatics and Ketones (QCLot: 2184391)							
ES1904527-001	BH29@0.4	EP075: 2.4-Dinitrotoluene	121-14-2	10 mg/kg	118	40	130
EP075E: Nitroaromatics and Ketones (QCLot: 2185545)							
ES1904527-056	BH41@2.4	EP075: 2.4-Dinitrotoluene	121-14-2	10 mg/kg	105	40	130
EP075G: Chlorinated Hydrocarbons (QCLot: 2184391)							
ES1904527-001	BH29@0.4	EP075: 1.4-Dichlorobenzene	106-46-7	10 mg/kg	113	60	130
		EP075: 1.2.4-Trichlorobenzene	120-82-1	10 mg/kg	127	50	130
EP075G: Chlorinated Hydrocarbons (QCLot: 2185545)							

Sub-Matrix: **SOIL**

				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Recovery Limits (%)	
Laboratory sample ID	Client sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP075G: Chlorinated Hydrocarbons (QCLot: 2185545) - continued							
ES1904527-056	BH41@2.4	EP075: 1.4-Dichlorobenzene	106-46-7	10 mg/kg	99.0	60	130
		EP075: 1.2.4-Trichlorobenzene	120-82-1	10 mg/kg	112	50	130
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2184165)							
ES1904527-001	BH29@0.4	EP080: C6 - C9 Fraction	----	32.5 mg/kg	101	70	130
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2184168)							
ES1904527-056	BH41@2.4	EP080: C6 - C9 Fraction	----	32.5 mg/kg	93.0	70	130
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2184390)							
ES1904527-001	BH29@0.4	EP071: C10 - C14 Fraction	----	523 mg/kg	106	73	137
		EP071: C15 - C28 Fraction	----	2319 mg/kg	94.7	53	131
		EP071: C29 - C36 Fraction	----	1714 mg/kg	115	52	132
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2185544)							
ES1904527-056	BH41@2.4	EP071: C10 - C14 Fraction	----	523 mg/kg	107	73	137
		EP071: C15 - C28 Fraction	----	2319 mg/kg	102	53	131
		EP071: C29 - C36 Fraction	----	1714 mg/kg	119	52	132
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2185625)							
ES1904431-001	Anonymous	EP080: C6 - C9 Fraction	----	32.5 mg/kg	97.6	70	130
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2186001)							
ES1904553-032	Anonymous	EP080: C6 - C9 Fraction	----	32.5 mg/kg	86.1	70	130
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2184165)							
ES1904527-001	BH29@0.4	EP080: C6 - C10 Fraction	C6_C10	37.5 mg/kg	98.1	70	130
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2184168)							
ES1904527-056	BH41@2.4	EP080: C6 - C10 Fraction	C6_C10	37.5 mg/kg	93.6	70	130
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2184390)							
ES1904527-001	BH29@0.4	EP071: >C10 - C16 Fraction	----	860 mg/kg	98.8	73	137
		EP071: >C16 - C34 Fraction	----	3223 mg/kg	110	53	131
		EP071: >C34 - C40 Fraction	----	1058 mg/kg	110	52	132
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2185544)							
ES1904527-056	BH41@2.4	EP071: >C10 - C16 Fraction	----	860 mg/kg	102	73	137
		EP071: >C16 - C34 Fraction	----	3223 mg/kg	116	53	131
		EP071: >C34 - C40 Fraction	----	1058 mg/kg	112	52	132
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2185625)							
ES1904431-001	Anonymous	EP080: C6 - C10 Fraction	C6_C10	37.5 mg/kg	94.0	70	130
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2186001)							
ES1904553-032	Anonymous	EP080: C6 - C10 Fraction	C6_C10	37.5 mg/kg	86.4	70	130

Sub-Matrix: **SOIL**

				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Recovery Limits (%)	
Laboratory sample ID	Client sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP080: BTEXN (QCLot: 2184165)							
ES1904527-001	BH29@0.4	EP080: Benzene	71-43-2	2.5 mg/kg	96.0	70	130
		EP080: Toluene	108-88-3	2.5 mg/kg	97.1	70	130
		EP080: Ethylbenzene	100-41-4	2.5 mg/kg	100	70	130
		EP080: meta- & para-Xylene	108-38-3 106-42-3	2.5 mg/kg	98.9	70	130
		EP080: ortho-Xylene	95-47-6	2.5 mg/kg	101	70	130
		EP080: Naphthalene	91-20-3	2.5 mg/kg	87.4	70	130
EP080: BTEXN (QCLot: 2184168)							
ES1904527-056	BH41@2.4	EP080: Benzene	71-43-2	2.5 mg/kg	92.0	70	130
		EP080: Toluene	108-88-3	2.5 mg/kg	95.5	70	130
		EP080: Ethylbenzene	100-41-4	2.5 mg/kg	96.2	70	130
		EP080: meta- & para-Xylene	108-38-3 106-42-3	2.5 mg/kg	94.8	70	130
		EP080: ortho-Xylene	95-47-6	2.5 mg/kg	97.0	70	130
		EP080: Naphthalene	91-20-3	2.5 mg/kg	84.9	70	130
EP080: BTEXN (QCLot: 2185625)							
ES1904431-001	Anonymous	EP080: Benzene	71-43-2	2.5 mg/kg	87.0	70	130
		EP080: Toluene	108-88-3	2.5 mg/kg	90.3	70	130
		EP080: Ethylbenzene	100-41-4	2.5 mg/kg	89.8	70	130
		EP080: meta- & para-Xylene	108-38-3 106-42-3	2.5 mg/kg	89.4	70	130
		EP080: ortho-Xylene	95-47-6	2.5 mg/kg	93.8	70	130
		EP080: Naphthalene	91-20-3	2.5 mg/kg	83.2	70	130
EP080: BTEXN (QCLot: 2186001)							
ES1904553-032	Anonymous	EP080: Benzene	71-43-2	2.5 mg/kg	85.0	70	130
		EP080: Toluene	108-88-3	2.5 mg/kg	86.7	70	130
		EP080: Ethylbenzene	100-41-4	2.5 mg/kg	88.6	70	130
		EP080: meta- & para-Xylene	108-38-3 106-42-3	2.5 mg/kg	87.4	70	130
		EP080: ortho-Xylene	95-47-6	2.5 mg/kg	88.6	70	130
		EP080: Naphthalene	91-20-3	2.5 mg/kg	77.2	70	130
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 2184690)							
ES1904279-010	Anonymous	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.00125 mg/kg	111	50	130
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.00125 mg/kg	111	50	130
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.00125 mg/kg	98.0	50	130
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.00125 mg/kg	83.2	50	130
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.00125 mg/kg	60.0	50	130
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.00125 mg/kg	76.0	50	130

Sub-Matrix: **SOIL**

				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Recovery Limits (%)	
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*Concentration*	*MS*	*Low*	*High*
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 2184690)							
ES1904279-010	Anonymous	EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.00625 mg/kg	102	30	130
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.00125 mg/kg	114	50	130
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.00125 mg/kg	88.4	50	130
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.00125 mg/kg	109	50	130
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.00125 mg/kg	82.8	50	130
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.00125 mg/kg	88.8	50	130
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.00125 mg/kg	91.2	50	130
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.00125 mg/kg	63.2	50	130
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.00125 mg/kg	50.4	50	130
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.00125 mg/kg	64.0	30	130
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.00312 mg/kg	109	30	130
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 2184690)							
ES1904279-010	Anonymous	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.00125 mg/kg	110	50	130
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.00312 mg/kg	61.7	30	130
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.00312 mg/kg	103	30	130
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.00312 mg/kg	78.0	30	130
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.00312 mg/kg	60.9	30	130
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.00125 mg/kg	64.8	30	130
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.00125 mg/kg	64.4	30	130
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 2184690)							
ES1904279-010	Anonymous	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.00125 mg/kg	116	50	130
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.00125 mg/kg	102	50	130
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.00125 mg/kg	107	50	130
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.00125 mg/kg	103	50	130

ALS Environmental

QA/QC Compliance Assessment to assist with Quality Review

Work Order	: **ES1904527**	Page	: 1 of 26
Client	: **ARCADIS AUSTRALIA PACIFIC PTY LTD**	Laboratory	: Environmental Division Sydney
Contact	: CAITLAIN REGENA	Telephone	: +61 2 8784 8555
Project	: 10026439 - task 6	Date Samples Received	: 13-Feb-2019
Site	: ----	Issue Date	: 18-Feb-2019
Sampler	: TOM KEATLEY	No. of samples received	: 101
Order number	: 10026439- TASK 6	No. of samples analysed	: 44

This report is automatically generated by the ALS LIMS through interpretation of the ALS Quality Control Report and several Quality Assurance parameters measured by ALS. This automated reporting highlights any non-conformances, facilitates faster and more accurate data validation and is designed to assist internal expert and external Auditor review. Many components of this report contribute to the overall DQO assessment and reporting for guideline compliance.

Brief method summaries and references are also provided to assist in traceability.

Summary of Outliers

Outliers : Quality Control Samples

This report highlights outliers flagged in the Quality Control (QC) Report.

- **NO Method Blank value outliers occur.**
- **NO Duplicate outliers occur.**
- **NO Matrix Spike outliers occur.**
- **Laboratory Control outliers exist - please see following pages for full details.**
- **Surrogate recovery outliers exist for all regular sample matrices - please see following pages for full details.**

Outliers : Analysis Holding Time Compliance

- **NO Analysis Holding Time Outliers exist.**

Outliers : Frequency of Quality Control Samples

- **Quality Control Sample Frequency Outliers exist - please see following pages for full details.**

Outliers : Quality Control Samples

Duplicates, Method Blanks, Laboratory Control Samples and Matrix Spikes

Matrix: **SOIL**

Compound Group Name	Laboratory Sample ID	Client Sample ID	Analyte	CAS Number	Data	Limits	Comment
Laboratory Control Spike (LCS) Recoveries							
EP075A: Phenolic Compounds	QC-2184391-002	----	**2.4.5-Trichlorophenol**	95-95-4	117 %	49-107%	**Recovery greater than upper control limit**
EP075A: Phenolic Compounds	QC-2185545-002	----	**2.4.5-Trichlorophenol**	95-95-4	111 %	49-107%	**Recovery greater than upper control limit**
EP075E: Nitroaromatics and Ketones	QC-2185545-002	----	**4-Nitroquinoline-N-oxide**	56-57-5	99.2 %	10-87%	**Recovery greater than upper control limit**
EP075H: Anilines and Benzidines	QC-2184391-002	----	**4-Nitroaniline**	100-01-8	118 %	42-112%	**Recovery greater than upper control limit**

Regular Sample Surrogates

Sub-Matrix: **SOIL**

Compound Group Name	Laboratory Sample ID	Client Sample ID	Analyte	CAS Number	Data	Limits	Comment
Samples Submitted							
EP075T: Base/Neutral Extractable Surrogates	ES1904527-001	BH29@0.4	**1.2-Dichlorobenzene-D4**	2199-69-1	113 %	34-108 %	**Recovery greater than upper data quality objective**
EP075T: Base/Neutral Extractable Surrogates	ES1904527-035	BH36@1	**1.2-Dichlorobenzene-D4**	2199-69-1	111 %	34-108 %	**Recovery greater than upper data quality objective**
EP075T: Base/Neutral Extractable Surrogates	ES1904527-006	BH30@0.8	**1.2-Dichlorobenzene-D4**	2199-69-1	113 %	34-108 %	**Recovery greater than upper data quality objective**
EP075T: Base/Neutral Extractable Surrogates	ES1904527-056	BH41@2.4	**1.2-Dichlorobenzene-D4**	2199-69-1	119 %	34-108 %	**Recovery greater than upper data quality objective**
EP075T: Base/Neutral Extractable Surrogates	ES1904527-058	BH42@1.5	**1.2-Dichlorobenzene-D4**	2199-69-1	109 %	34-108 %	**Recovery greater than upper data quality objective**
EP075T: Base/Neutral Extractable Surrogates	ES1904527-064	BH44@1.3	**1.2-Dichlorobenzene-D4**	2199-69-1	111 %	34-108 %	**Recovery greater than upper data quality objective**
EP075T: Base/Neutral Extractable Surrogates	ES1904527-066	BH45@0.7 BH45@1.7	**1.2-Dichlorobenzene-D4**	2199-69-1	117 %	34-108 %	**Recovery greater than upper data quality objective**
EP075T: Base/Neutral Extractable Surrogates	ES1904527-021	BH33@0.5	**1.2-Dichlorobenzene-D4**	2199-69-1	118 %	34-108 %	**Recovery greater than upper data quality objective**
EP075T: Base/Neutral Extractable Surrogates	ES1904527-069	BH45@2.2	**1.2-Dichlorobenzene-D4**	2199-69-1	116 %	34-108 %	**Recovery greater than upper data quality objective**
EP075T: Base/Neutral Extractable Surrogates	ES1904527-071	BH46@0.3	**1.2-Dichlorobenzene-D4**	2199-69-1	112 %	34-108 %	**Recovery greater than upper data quality objective**
EP075T: Base/Neutral Extractable Surrogates	ES1904527-076	BH47@1.3	**1.2-Dichlorobenzene-D4**	2199-69-1	110 %	34-108 %	**Recovery greater than upper data quality objective**
EP075T: Base/Neutral Extractable Surrogates	ES1904527-029	BH34@3	**1.2-Dichlorobenzene-D4**	2199-69-1	115 %	34-108 %	**Recovery greater than upper data quality objective**
EP075T: Base/Neutral Extractable Surrogates	ES1904527-080	BH48@0.1 BH48@1.0	**1.2-Dichlorobenzene-D4**	2199-69-1	110 %	34-108 %	**Recovery greater than upper data quality objective**

Sub-Matrix: **SOIL**

Compound Group Name	Laboratory Sample ID	Client Sample ID	Analyte	CAS Number	Data	Limits	Comment
Samples Submitted - Continued							
EP075T: Base/Neutral Extractable Surrogates	ES1904527-038	BH36@2.1	**1.2-Dichlorobenzene-D4**	2199-69-1	113 %	34-108 %	**Recovery greater than upper data quality objective**
EP075T: Base/Neutral Extractable Surrogates	ES1904527-085	BH49@0.9 BH49@0.7	**1.2-Dichlorobenzene-D4**	2199-69-1	118 %	34-108 %	**Recovery greater than upper data quality objective**
EP075T: Base/Neutral Extractable Surrogates	ES1904527-040	BH37@1.1	**1.2-Dichlorobenzene-D4**	2199-69-1	111 %	34-108 %	**Recovery greater than upper data quality objective**
EP075T: Base/Neutral Extractable Surrogates	ES1904527-043	BH37@2.7	**1.2-Dichlorobenzene-D4**	2199-69-1	119 %	34-108 %	**Recovery greater than upper data quality objective**
EP075T: Base/Neutral Extractable Surrogates	ES1904527-044	BH38@0.3	**1.2-Dichlorobenzene-D4**	2199-69-1	110 %	34-108 %	**Recovery greater than upper data quality objective**
EP075T: Base/Neutral Extractable Surrogates	ES1904527-090	DUP2@2.2	**1.2-Dichlorobenzene-D4**	2199-69-1	111 %	34-108 %	**Recovery greater than upper data quality objective**
EP075T: Base/Neutral Extractable Surrogates	ES1904527-046	BH38@1.6	**1.2-Dichlorobenzene-D4**	2199-69-1	122 %	34-108 %	**Recovery greater than upper data quality objective**
EP075T: Base/Neutral Extractable Surrogates	ES1904527-055	BH41@2	**1.2-Dichlorobenzene-D4**	2199-69-1	118 %	34-108 %	**Recovery greater than upper data quality objective**
EP075T: Base/Neutral Extractable Surrogates	ES1904527-035	BH36@1	**2-Fluorobiphenyl**	321-60-8	125 %	35-121 %	**Recovery greater than upper data quality objective**
EP075T: Base/Neutral Extractable Surrogates	ES1904527-010	BH31@0.2	**2-Fluorobiphenyl**	321-60-8	124 %	35-121 %	**Recovery greater than upper data quality objective**
EP075T: Base/Neutral Extractable Surrogates	ES1904527-071	BH46@0.3	**2-Fluorobiphenyl**	321-60-8	122 %	35-121 %	**Recovery greater than upper data quality objective**
EP075T: Base/Neutral Extractable Surrogates	ES1904527-085	BH49@0.9 BH49@0.7	**2-Fluorobiphenyl**	321-60-8	123 %	35-121 %	**Recovery greater than upper data quality objective**

Outliers : Frequency of Quality Control Samples

Matrix: **SOIL**

Quality Control Sample Type	Count		Rate (%)		Quality Control Specification
Method	QC	Regular	Actual	Expected	
Matrix Spikes (MS)					
Total Metals by ICP-AES	3	69	4.35	5.00	NEPM 2013 B3 & ALS QC Standard

Analysis Holding Time Compliance

If samples are identified below as having been analysed or extracted outside of recommended holding times, this should be taken into consideration when interpreting results.

This report summarizes extraction / preparation and analysis times and compares each with ALS recommended holding times (referencing USEPA SW 846, APHA, AS and NEPM) based on the sample container provided. Dates reported represent first date of extraction or analysis and preclude subsequent dilutions and reruns. A listing of breaches (if any) is provided herein.

Holding time for leachate methods (e.g. TCLP) vary according to the analytes reported. Assessment compares the leach date with the shortest analyte holding time for the equivalent soil method. These are: organics 14 days, mercury 28 days & other metals 180 days. A recorded breach does not guarantee a breach for all non-volatile parameters.

Holding times for ***VOC in soils*** vary according to analytes of interest. Vinyl Chloride and Styrene holding time is 7 days; others 14 days. A recorded breach does not guarantee a breach for all VOC analytes and should be verified in case the reported breach is a false positive or Vinyl Chloride and Styrene are not key analytes of interest/concern.

Matrix: **SOIL** Evaluation: × = Holding time breach ; ✓ = Within holding time.

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EA055: Moisture Content (Dried @ 105-110°C)							
Soil Glass Jar - Unpreserved (EA055)							
BH29@0.4, BH30@0.8, BH30@2.7, BH31@0.2, BH31@2.3, BH32@1, BH32@1.9, BH33@0.5, BH33@2.5, BH44@0.3, BH44@1, BH44@1.3, BH45@0.7 - BH45@1.7, BH45@2.2, BH47@1.3, BH47@2.4, BH49@0.9 - BH49@0.7, BH49@2.5, DUP@2.7, DUP2@2.2	**11-Feb-2019**	**----**	----	----	**14-Feb-2019**	25-Feb-2019	✓
Soil Glass Jar - Unpreserved (EA055)							
BH34@0.3, BH34@3, BH35@0.7, BH36@1, BH36@1.5, BH36@2.1, BH37@1.1, BH37@1.5, BH37@2.7, BH38@0.3, BH38@1.6, BH39@0.3, BH39@2.5, BH40@0.3, BH41@2, BH41@2.4, BH42@1.5, BH46@0.3, BH48@0.1 - BH48@1.0	**12-Feb-2019**	**----**	----	----	**14-Feb-2019**	26-Feb-2019	✓
EA200: AS 4964 - 2004 Identification of Asbestos in Soils							
Snap Lock Bag (EA200)							
BH29@0.4, BH30@0.8, BH31@0.2, BH32@1, BH33@0.5, BH44@0.3, BH45@0.7 - BH45@1.7, BH49@0.9 - BH49@0.7	**11-Feb-2019**	**----**	----	----	**15-Feb-2019**	10-Aug-2019	✓
Snap Lock Bag (EA200)							
BH34@0.3, BH35@0.7, BH36@1, BH37@1.1, BH38@0.3, BH39@0.3, BH40@0.3, BH41@2, BH42@1.5, BH46@0.3, BH48@0.1 - BH48@1.0	**12-Feb-2019**	**----**	----	----	**15-Feb-2019**	11-Aug-2019	✓
Snap Lock Bag - Subsampled by ALS (EA200)							
BH47@1.3	**11-Feb-2019**	**----**	----	----	**18-Feb-2019**	10-Aug-2019	✓
Snap Lock Bag - Subsampled by ALS (EA200)							
BH38@1.6	**12-Feb-2019**	**----**	----	----	**18-Feb-2019**	11-Aug-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)		Sample Date	Extraction / Preparation			Analysis		
			Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EA200N: Asbestos Quantification (non-NATA)								
Snap Lock Bag (EA200N)								
BH29@0.4,	BH30@0.8,	**11-Feb-2019**	**----**	----	----	**15-Feb-2019**	10-Aug-2019	✓
BH31@0.2,	BH32@1,							
BH33@0.5,	BH44@0.3,							
BH45@0.7 - BH45@1.7,	BH49@0.9 - BH49@0.7							
Snap Lock Bag (EA200N)								
BH34@0.3,	BH35@0.7,	**12-Feb-2019**	**----**	----	----	**15-Feb-2019**	11-Aug-2019	✓
BH36@1,	BH37@1.1,							
BH38@0.3,	BH39@0.3,							
BH40@0.3,	BH41@2,							
BH42@1.5,	BH46@0.3,							
BH48@0.1 - BH48@1.0								
EG005T: Total Metals by ICP-AES								
Soil Glass Jar - Unpreserved (EG005T)								
BH29@0.4,	BH30@0.8,	**11-Feb-2019**	**14-Feb-2019**	10-Aug-2019	✓	**14-Feb-2019**	10-Aug-2019	✓
BH30@2.7,	BH31@0.2,							
BH31@2.3,	BH32@1,							
BH33@0.5,	BH33@2.5,							
BH44@0.3,	BH44@1.3,							
BH45@0.7 - BH45@1.7,	BH45@2.2,							
BH47@1.3,	BH47@2.4,							
BH49@0.9 - BH49@0.7,	BH49@2.5,							
DUP@2.7,	DUP2@2.2							
Soil Glass Jar - Unpreserved (EG005T)								
BH34@0.3,	BH34@3,	**12-Feb-2019**	**14-Feb-2019**	11-Aug-2019	✓	**14-Feb-2019**	11-Aug-2019	✓
BH35@0.7,	BH36@2.1,							
BH37@1.1,	BH37@2.7,							
BH38@0.3,	BH38@1.6,							
BH39@0.3,	BH39@2.5,							
BH40@0.3,	BH41@2,							
BH41@2.4,	BH42@1.5,							
BH46@0.3,	BH48@0.1 - BH48@1.0							
Soil Glass Jar - Unpreserved (EG005T)								
BH36@1		**12-Feb-2019**	**15-Feb-2019**	11-Aug-2019	✓	**15-Feb-2019**	11-Aug-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EG035T: Total Recoverable Mercury by FIMS							
Soil Glass Jar - Unpreserved (EG035T)							
BH29@0.4, BH30@0.8, BH30@2.7, BH31@0.2, BH31@2.3, BH32@1, BH33@0.5, BH33@2.5	**11-Feb-2019**	**14-Feb-2019**	11-Mar-2019	✓	**14-Feb-2019**	11-Mar-2019	✓
Soil Glass Jar - Unpreserved (EG035T)							
BH44@0.3, BH44@1.3, BH45@0.7 - BH45@1.7, BH45@2.2, BH47@1.3, BH47@2.4, BH49@0.9 - BH49@0.7, BH49@2.5, DUP@2.7, DUP2@2.2	**11-Feb-2019**	**14-Feb-2019**	11-Mar-2019	✓	**15-Feb-2019**	11-Mar-2019	✓
Soil Glass Jar - Unpreserved (EG035T)							
BH34@0.3, BH34@3, BH35@0.7, BH36@2.1, BH37@1.1, BH37@2.7, BH38@0.3, BH38@1.6, BH39@0.3, BH39@2.5, BH40@0.3, BH41@2, BH41@2.4, BH42@1.5, BH46@0.3, BH48@0.1 - BH48@1.0	**12-Feb-2019**	**14-Feb-2019**	12-Mar-2019	✓	**15-Feb-2019**	12-Mar-2019	✓
Soil Glass Jar - Unpreserved (EG035T)							
BH36@1	**12-Feb-2019**	**15-Feb-2019**	12-Mar-2019	✓	**15-Feb-2019**	12-Mar-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP066: Polychlorinated Biphenyls (PCB)							
Soil Glass Jar - Unpreserved (EP066)							
BH29@0.4, BH30@0.8, BH30@2.7, BH31@0.2, BH31@2.3, BH32@1, BH33@0.5, BH33@2.5, BH44@0.3, BH44@1.3, BH45@0.7 - BH45@1.7, BH45@2.2, BH47@1.3, BH47@2.4, BH49@0.9 - BH49@0.7, BH49@2.5, DUP@2.7, DUP2@2.2	**11-Feb-2019**	**14-Feb-2019**	25-Feb-2019	✓	**14-Feb-2019**	26-Mar-2019	✓
Soil Glass Jar - Unpreserved (EP066)							
BH34@0.3, BH34@3, BH35@0.7, BH36@1, BH36@2.1, BH37@1.1, BH37@2.7, BH38@0.3, BH38@1.6, BH39@0.3, BH39@2.5, BH40@0.3, BH41@2, BH41@2.4, BH42@1.5, BH46@0.3, BH48@0.1 - BH48@1.0	**12-Feb-2019**	**14-Feb-2019**	26-Feb-2019	✓	**14-Feb-2019**	26-Mar-2019	✓
EP068A: Organochlorine Pesticides (OC)							
Soil Glass Jar - Unpreserved (EP068)							
BH29@0.4, BH30@0.8, BH30@2.7, BH31@0.2, BH31@2.3, BH32@1, BH33@0.5, BH33@2.5, BH44@0.3, BH44@1.3, BH45@0.7 - BH45@1.7, BH45@2.2, BH47@1.3, BH47@2.4, BH49@0.9 - BH49@0.7, BH49@2.5, DUP@2.7, DUP2@2.2	**11-Feb-2019**	**14-Feb-2019**	25-Feb-2019	✓	**14-Feb-2019**	26-Mar-2019	✓
Soil Glass Jar - Unpreserved (EP068)							
BH34@0.3, BH34@3, BH35@0.7, BH36@1, BH36@2.1, BH37@1.1, BH37@2.7, BH38@0.3, BH38@1.6, BH39@0.3, BH39@2.5, BH40@0.3, BH41@2, BH41@2.4, BH42@1.5, BH46@0.3, BH48@0.1 - BH48@1.0	**12-Feb-2019**	**14-Feb-2019**	26-Feb-2019	✓	**14-Feb-2019**	26-Mar-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP068B: Organophosphorus Pesticides (OP)							
Soil Glass Jar - Unpreserved (EP068)							
BH29@0.4, BH30@0.8, BH30@2.7, BH31@0.2, BH31@2.3, BH32@1, BH33@0.5, BH33@2.5, BH44@0.3, BH44@1.3, BH45@0.7 - BH45@1.7, BH45@2.2, BH47@1.3, BH47@2.4, BH49@0.9 - BH49@0.7, BH49@2.5, DUP@2.7, DUP2@2.2	**11-Feb-2019**	**14-Feb-2019**	25-Feb-2019	✓	**14-Feb-2019**	26-Mar-2019	✓
Soil Glass Jar - Unpreserved (EP068)							
BH34@0.3, BH34@3, BH35@0.7, BH36@1, BH36@2.1, BH37@1.1, BH37@2.7, BH38@0.3, BH38@1.6, BH39@0.3, BH39@2.5, BH40@0.3, BH41@2, BH41@2.4, BH42@1.5, BH46@0.3, BH48@0.1 - BH48@1.0	**12-Feb-2019**	**14-Feb-2019**	26-Feb-2019	✓	**14-Feb-2019**	26-Mar-2019	✓
EP074A: Monocyclic Aromatic Hydrocarbons							
Soil Glass Jar - Unpreserved (EP074)							
BH29@0.4, BH30@0.8, BH30@2.7, BH31@0.2, BH31@2.3, BH32@1, BH33@0.5, BH33@2.5, BH44@0.3, BH44@1.3, BH45@0.7 - BH45@1.7, BH45@2.2, BH47@1.3, BH47@2.4, BH49@0.9 - BH49@0.7, BH49@2.5, DUP@2.7, DUP2@2.2	**11-Feb-2019**	**13-Feb-2019**	18-Feb-2019	✓	**14-Feb-2019**	18-Feb-2019	✓
Soil Glass Jar - Unpreserved (EP074)							
BH34@0.3, BH34@3, BH35@0.7, BH36@2.1, BH37@1.1, BH37@2.7, BH38@0.3, BH38@1.6, BH39@0.3, BH39@2.5, BH40@0.3, BH41@2, BH41@2.4, BH42@1.5, BH46@0.3, BH48@0.1 - BH48@1.0	**12-Feb-2019**	**13-Feb-2019**	19-Feb-2019	✓	**14-Feb-2019**	19-Feb-2019	✓
Soil Glass Jar - Unpreserved (EP074)							
BH36@1	**12-Feb-2019**	**14-Feb-2019**	19-Feb-2019	✓	**14-Feb-2019**	19-Feb-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP074B: Oxygenated Compounds							
Soil Glass Jar - Unpreserved (EP074)							
BH29@0.4, BH30@0.8, BH30@2.7, BH31@0.2, BH31@2.3, BH32@1, BH33@0.5, BH33@2.5, BH44@0.3, BH44@1.3, BH45@0.7 - BH45@1.7, BH45@2.2, BH47@1.3, BH47@2.4, BH49@0.9 - BH49@0.7, BH49@2.5, DUP@2.7, DUP2@2.2	**11-Feb-2019**	**13-Feb-2019**	18-Feb-2019	✓	**14-Feb-2019**	18-Feb-2019	✓
Soil Glass Jar - Unpreserved (EP074)							
BH34@0.3, BH34@3, BH35@0.7, BH36@2.1, BH37@1.1, BH37@2.7, BH38@0.3, BH38@1.6, BH39@0.3, BH39@2.5, BH40@0.3, BH41@2, BH41@2.4, BH42@1.5, BH46@0.3, BH48@0.1 - BH48@1.0	**12-Feb-2019**	**13-Feb-2019**	19-Feb-2019	✓	**14-Feb-2019**	19-Feb-2019	✓
Soil Glass Jar - Unpreserved (EP074)							
BH36@1	**12-Feb-2019**	**14-Feb-2019**	19-Feb-2019	✓	**14-Feb-2019**	19-Feb-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP074C: Sulfonated Compounds							
Soil Glass Jar - Unpreserved (EP074)							
BH29@0.4, BH30@0.8, BH30@2.7, BH31@0.2, BH31@2.3, BH32@1, BH33@0.5, BH33@2.5, BH44@0.3, BH44@1.3, BH45@0.7 - BH45@1.7, BH45@2.2, BH47@1.3, BH47@2.4, BH49@0.9 - BH49@0.7, BH49@2.5, DUP@2.7, DUP2@2.2	**11-Feb-2019**	**13-Feb-2019**	18-Feb-2019	✓	**14-Feb-2019**	18-Feb-2019	✓
Soil Glass Jar - Unpreserved (EP074)							
BH34@0.3, BH34@3, BH35@0.7, BH36@2.1, BH37@1.1, BH37@2.7, BH38@0.3, BH38@1.6, BH39@0.3, BH39@2.5, BH40@0.3, BH41@2, BH41@2.4, BH42@1.5, BH46@0.3, BH48@0.1 - BH48@1.0	**12-Feb-2019**	**13-Feb-2019**	19-Feb-2019	✓	**14-Feb-2019**	19-Feb-2019	✓
Soil Glass Jar - Unpreserved (EP074)							
BH36@1	**12-Feb-2019**	**14-Feb-2019**	19-Feb-2019	✓	**14-Feb-2019**	19-Feb-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP074D: Fumigants							
Soil Glass Jar - Unpreserved (EP074)							
BH29@0.4, BH30@0.8, BH30@2.7, BH31@0.2, BH31@2.3, BH32@1, BH33@0.5, BH33@2.5, BH44@0.3, BH44@1.3, BH45@0.7 - BH45@1.7, BH45@2.2, BH47@1.3, BH47@2.4, BH49@0.9 - BH49@0.7, BH49@2.5, DUP@2.7, DUP2@2.2	**11-Feb-2019**	**13-Feb-2019**	18-Feb-2019	✓	**14-Feb-2019**	18-Feb-2019	✓
Soil Glass Jar - Unpreserved (EP074)							
BH34@0.3, BH34@3, BH35@0.7, BH36@2.1, BH37@1.1, BH37@2.7, BH38@0.3, BH38@1.6, BH39@0.3, BH39@2.5, BH40@0.3, BH41@2, BH41@2.4, BH42@1.5, BH46@0.3, BH48@0.1 - BH48@1.0	**12-Feb-2019**	**13-Feb-2019**	19-Feb-2019	✓	**14-Feb-2019**	19-Feb-2019	✓
Soil Glass Jar - Unpreserved (EP074)							
BH36@1	**12-Feb-2019**	**14-Feb-2019**	19-Feb-2019	✓	**14-Feb-2019**	19-Feb-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP074E: Halogenated Aliphatic Compounds							
Soil Glass Jar - Unpreserved (EP074)							
BH29@0.4, BH30@0.8, BH30@2.7, BH31@0.2, BH31@2.3, BH32@1, BH33@0.5, BH33@2.5, BH44@0.3, BH44@1.3, BH45@0.7 - BH45@1.7, BH45@2.2, BH47@1.3, BH47@2.4, BH49@0.9 - BH49@0.7, BH49@2.5, DUP@2.7, DUP2@2.2	**11-Feb-2019**	**13-Feb-2019**	18-Feb-2019	✓	**14-Feb-2019**	18-Feb-2019	✓
Soil Glass Jar - Unpreserved (EP074)							
BH34@0.3, BH34@3, BH35@0.7, BH36@2.1, BH37@1.1, BH37@2.7, BH38@0.3, BH38@1.6, BH39@0.3, BH39@2.5, BH40@0.3, BH41@2, BH41@2.4, BH42@1.5, BH46@0.3, BH48@0.1 - BH48@1.0	**12-Feb-2019**	**13-Feb-2019**	19-Feb-2019	✓	**14-Feb-2019**	19-Feb-2019	✓
Soil Glass Jar - Unpreserved (EP074)							
BH36@1	**12-Feb-2019**	**14-Feb-2019**	19-Feb-2019	✓	**14-Feb-2019**	19-Feb-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP074F: Halogenated Aromatic Compounds							
Soil Glass Jar - Unpreserved (EP074)							
BH29@0.4, BH30@0.8, BH30@2.7, BH31@0.2, BH31@2.3, BH32@1, BH33@0.5, BH33@2.5, BH44@0.3, BH44@1.3, BH45@0.7 - BH45@1.7, BH45@2.2, BH47@1.3, BH47@2.4, BH49@0.9 - BH49@0.7, BH49@2.5, DUP@2.7, DUP2@2.2	**11-Feb-2019**	**13-Feb-2019**	18-Feb-2019	✓	**14-Feb-2019**	18-Feb-2019	✓
Soil Glass Jar - Unpreserved (EP074)							
BH34@0.3, BH34@3, BH35@0.7, BH36@2.1, BH37@1.1, BH37@2.7, BH38@0.3, BH38@1.6, BH39@0.3, BH39@2.5, BH40@0.3, BH41@2, BH41@2.4, BH42@1.5, BH46@0.3, BH48@0.1 - BH48@1.0	**12-Feb-2019**	**13-Feb-2019**	19-Feb-2019	✓	**14-Feb-2019**	19-Feb-2019	✓
Soil Glass Jar - Unpreserved (EP074)							
BH36@1	**12-Feb-2019**	**14-Feb-2019**	19-Feb-2019	✓	**14-Feb-2019**	19-Feb-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP074G: Trihalomethanes							
Soil Glass Jar - Unpreserved (EP074)							
BH29@0.4, BH30@0.8, BH30@2.7, BH31@0.2, BH31@2.3, BH32@1, BH33@0.5, BH33@2.5, BH44@0.3, BH44@1.3, BH45@0.7 - BH45@1.7, BH45@2.2, BH47@1.3, BH47@2.4, BH49@0.9 - BH49@0.7, BH49@2.5, DUP@2.7, DUP2@2.2	**11-Feb-2019**	**13-Feb-2019**	18-Feb-2019	✓	**14-Feb-2019**	18-Feb-2019	✓
Soil Glass Jar - Unpreserved (EP074)							
BH34@0.3, BH34@3, BH35@0.7, BH36@2.1, BH37@1.1, BH37@2.7, BH38@0.3, BH38@1.6, BH39@0.3, BH39@2.5, BH40@0.3, BH41@2, BH41@2.4, BH42@1.5, BH46@0.3, BH48@0.1 - BH48@1.0	**12-Feb-2019**	**13-Feb-2019**	19-Feb-2019	✓	**14-Feb-2019**	19-Feb-2019	✓
Soil Glass Jar - Unpreserved (EP074)							
BH36@1	**12-Feb-2019**	**14-Feb-2019**	19-Feb-2019	✓	**14-Feb-2019**	19-Feb-2019	✓
EP075A: Phenolic Compounds							
Soil Glass Jar - Unpreserved (EP075)							
BH29@0.4, BH30@0.8, BH30@2.7, BH31@0.2, BH31@2.3, BH32@1, BH33@0.5, BH33@2.5, BH44@0.3, BH44@1.3, BH45@0.7 - BH45@1.7, BH45@2.2, BH47@1.3, BH47@2.4, BH49@0.9 - BH49@0.7, BH49@2.5, DUP@2.7, DUP2@2.2	**11-Feb-2019**	**14-Feb-2019**	25-Feb-2019	✓	**14-Feb-2019**	26-Mar-2019	✓
Soil Glass Jar - Unpreserved (EP075)							
BH34@0.3, BH34@3, BH35@0.7, BH36@1, BH36@2.1, BH37@1.1, BH37@2.7, BH38@0.3, BH38@1.6, BH39@0.3, BH39@2.5, BH40@0.3, BH41@2, BH41@2.4, BH42@1.5, BH46@0.3, BH48@0.1 - BH48@1.0	**12-Feb-2019**	**14-Feb-2019**	26-Feb-2019	✓	**14-Feb-2019**	26-Mar-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP075B: Polynuclear Aromatic Hydrocarbons							
Soil Glass Jar - Unpreserved (EP075)							
BH29@0.4, BH30@0.8, BH30@2.7, BH31@0.2, BH31@2.3, BH32@1, BH33@0.5, BH33@2.5, BH44@0.3, BH44@1.3, BH45@0.7 - BH45@1.7, BH45@2.2, BH47@1.3, BH47@2.4, BH49@0.9 - BH49@0.7, BH49@2.5, DUP@2.7, DUP2@2.2	**11-Feb-2019**	**14-Feb-2019**	25-Feb-2019	✓	**14-Feb-2019**	26-Mar-2019	✓
Soil Glass Jar - Unpreserved (EP075)							
BH34@0.3, BH34@3, BH35@0.7, BH36@1, BH36@2.1, BH37@1.1, BH37@2.7, BH38@0.3, BH38@1.6, BH39@0.3, BH39@2.5, BH40@0.3, BH41@2, BH41@2.4, BH42@1.5, BH46@0.3, BH48@0.1 - BH48@1.0	**12-Feb-2019**	**14-Feb-2019**	26-Feb-2019	✓	**14-Feb-2019**	26-Mar-2019	✓
EP075C: Phthalate Esters							
Soil Glass Jar - Unpreserved (EP075)							
BH29@0.4, BH30@0.8, BH30@2.7, BH31@0.2, BH31@2.3, BH32@1, BH33@0.5, BH33@2.5, BH44@0.3, BH44@1.3, BH45@0.7 - BH45@1.7, BH45@2.2, BH47@1.3, BH47@2.4, BH49@0.9 - BH49@0.7, BH49@2.5, DUP@2.7, DUP2@2.2	**11-Feb-2019**	**14-Feb-2019**	25-Feb-2019	✓	**14-Feb-2019**	26-Mar-2019	✓
Soil Glass Jar - Unpreserved (EP075)							
BH34@0.3, BH34@3, BH35@0.7, BH36@1, BH36@2.1, BH37@1.1, BH37@2.7, BH38@0.3, BH38@1.6, BH39@0.3, BH39@2.5, BH40@0.3, BH41@2, BH41@2.4, BH42@1.5, BH46@0.3, BH48@0.1 - BH48@1.0	**12-Feb-2019**	**14-Feb-2019**	26-Feb-2019	✓	**14-Feb-2019**	26-Mar-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP075D: Nitrosamines							
Soil Glass Jar - Unpreserved (EP075)							
BH29@0.4, BH30@0.8, BH30@2.7, BH31@0.2, BH31@2.3, BH32@1, BH33@0.5, BH33@2.5, BH44@0.3, BH44@1.3, BH45@0.7 - BH45@1.7, BH45@2.2, BH47@1.3, BH47@2.4, BH49@0.9 - BH49@0.7, BH49@2.5, DUP@2.7, DUP2@2.2	**11-Feb-2019**	**14-Feb-2019**	25-Feb-2019	✓	**14-Feb-2019**	26-Mar-2019	✓
Soil Glass Jar - Unpreserved (EP075)							
BH34@0.3, BH34@3, BH35@0.7, BH36@1, BH36@2.1, BH37@1.1, BH37@2.7, BH38@0.3, BH38@1.6, BH39@0.3, BH39@2.5, BH40@0.3, BH41@2, BH41@2.4, BH42@1.5, BH46@0.3, BH48@0.1 - BH48@1.0	**12-Feb-2019**	**14-Feb-2019**	26-Feb-2019	✓	**14-Feb-2019**	26-Mar-2019	✓
EP075E: Nitroaromatics and Ketones							
Soil Glass Jar - Unpreserved (EP075)							
BH29@0.4, BH30@0.8, BH30@2.7, BH31@0.2, BH31@2.3, BH32@1, BH33@0.5, BH33@2.5, BH44@0.3, BH44@1.3, BH45@0.7 - BH45@1.7, BH45@2.2, BH47@1.3, BH47@2.4, BH49@0.9 - BH49@0.7, BH49@2.5, DUP@2.7, DUP2@2.2	**11-Feb-2019**	**14-Feb-2019**	25-Feb-2019	✓	**14-Feb-2019**	26-Mar-2019	✓
Soil Glass Jar - Unpreserved (EP075)							
BH34@0.3, BH34@3, BH35@0.7, BH36@1, BH36@2.1, BH37@1.1, BH37@2.7, BH38@0.3, BH38@1.6, BH39@0.3, BH39@2.5, BH40@0.3, BH41@2, BH41@2.4, BH42@1.5, BH46@0.3, BH48@0.1 - BH48@1.0	**12-Feb-2019**	**14-Feb-2019**	26-Feb-2019	✓	**14-Feb-2019**	26-Mar-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP075F: Haloethers							
Soil Glass Jar - Unpreserved (EP075)							
BH29@0.4, BH30@0.8, BH30@2.7, BH31@0.2, BH31@2.3, BH32@1, BH33@0.5, BH33@2.5, BH44@0.3, BH44@1.3, BH45@0.7 - BH45@1.7, BH45@2.2, BH47@1.3, BH47@2.4, BH49@0.9 - BH49@0.7, BH49@2.5, DUP@2.7, DUP2@2.2	**11-Feb-2019**	**14-Feb-2019**	25-Feb-2019	✓	**14-Feb-2019**	26-Mar-2019	✓
Soil Glass Jar - Unpreserved (EP075)							
BH34@0.3, BH34@3, BH35@0.7, BH36@1, BH36@2.1, BH37@1.1, BH37@2.7, BH38@0.3, BH38@1.6, BH39@0.3, BH39@2.5, BH40@0.3, BH41@2, BH41@2.4, BH42@1.5, BH46@0.3, BH48@0.1 - BH48@1.0	**12-Feb-2019**	**14-Feb-2019**	26-Feb-2019	✓	**14-Feb-2019**	26-Mar-2019	✓
EP075G: Chlorinated Hydrocarbons							
Soil Glass Jar - Unpreserved (EP075)							
BH29@0.4, BH30@0.8, BH30@2.7, BH31@0.2, BH31@2.3, BH32@1, BH33@0.5, BH33@2.5, BH44@0.3, BH44@1.3, BH45@0.7 - BH45@1.7, BH45@2.2, BH47@1.3, BH47@2.4, BH49@0.9 - BH49@0.7, BH49@2.5, DUP@2.7, DUP2@2.2	**11-Feb-2019**	**14-Feb-2019**	25-Feb-2019	✓	**14-Feb-2019**	26-Mar-2019	✓
Soil Glass Jar - Unpreserved (EP075)							
BH34@0.3, BH34@3, BH35@0.7, BH36@1, BH36@2.1, BH37@1.1, BH37@2.7, BH38@0.3, BH38@1.6, BH39@0.3, BH39@2.5, BH40@0.3, BH41@2, BH41@2.4, BH42@1.5, BH46@0.3, BH48@0.1 - BH48@1.0	**12-Feb-2019**	**14-Feb-2019**	26-Feb-2019	✓	**14-Feb-2019**	26-Mar-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP075H: Anilines and Benzidines							
Soil Glass Jar - Unpreserved (EP075)							
BH29@0.4, BH30@0.8, BH30@2.7, BH31@0.2, BH31@2.3, BH32@1, BH33@0.5, BH33@2.5, BH44@0.3, BH44@1.3, BH45@0.7 - BH45@1.7, BH45@2.2, BH47@1.3, BH47@2.4, BH49@0.9 - BH49@0.7, BH49@2.5, DUP@2.7, DUP2@2.2	**11-Feb-2019**	**14-Feb-2019**	25-Feb-2019	✓	**14-Feb-2019**	26-Mar-2019	✓
Soil Glass Jar - Unpreserved (EP075)							
BH34@0.3, BH34@3, BH35@0.7, BH36@1, BH36@2.1, BH37@1.1, BH37@2.7, BH38@0.3, BH38@1.6, BH39@0.3, BH39@2.5, BH40@0.3, BH41@2, BH41@2.4, BH42@1.5, BH46@0.3, BH48@0.1 - BH48@1.0	**12-Feb-2019**	**14-Feb-2019**	26-Feb-2019	✓	**14-Feb-2019**	26-Mar-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP080/071: Total Petroleum Hydrocarbons							
Soil Glass Jar - Unpreserved (EP080)							
BH29@0.4, BH30@0.8, BH30@2.7, BH31@0.2, BH31@2.3, BH32@1, BH33@0.5, BH33@2.5, BH44@0.3, BH44@1.3, BH45@0.7 - BH45@1.7, BH45@2.2, BH47@1.3, BH47@2.4, BH49@0.9 - BH49@0.7, BH49@2.5, DUP@2.7, DUP2@2.2	**11-Feb-2019**	**13-Feb-2019**	25-Feb-2019	✓	**14-Feb-2019**	25-Feb-2019	✓
Soil Glass Jar - Unpreserved (EP071)							
BH29@0.4, BH30@0.8, BH30@2.7, BH31@0.2, BH31@2.3, BH32@1, BH33@0.5, BH33@2.5, BH44@0.3, BH44@1.3, BH45@0.7 - BH45@1.7, BH45@2.2, BH47@1.3, BH47@2.4, BH49@0.9 - BH49@0.7, BH49@2.5, DUP@2.7, DUP2@2.2	**11-Feb-2019**	**14-Feb-2019**	25-Feb-2019	✓	**14-Feb-2019**	26-Mar-2019	✓
Soil Glass Jar - Unpreserved (EP080)							
BH34@0.3, BH34@3, BH35@0.7, BH36@2.1, BH37@1.1, BH37@2.7, BH38@0.3, BH38@1.6, BH39@0.3, BH39@2.5, BH40@0.3, BH41@2, BH41@2.4, BH42@1.5, BH46@0.3, BH48@0.1 - BH48@1.0	**12-Feb-2019**	**13-Feb-2019**	26-Feb-2019	✓	**14-Feb-2019**	26-Feb-2019	✓
Soil Glass Jar - Unpreserved (EP071)							
BH34@0.3, BH34@3, BH35@0.7, BH36@1, BH36@2.1, BH37@1.1, BH37@2.7, BH38@0.3, BH38@1.6, BH39@0.3, BH39@2.5, BH40@0.3, BH41@2, BH41@2.4, BH42@1.5, BH46@0.3, BH48@0.1 - BH48@1.0	**12-Feb-2019**	**14-Feb-2019**	26-Feb-2019	✓	**14-Feb-2019**	26-Mar-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions							
Soil Glass Jar - Unpreserved (EP080)							
BH29@0.4, BH30@0.8, BH30@2.7, BH31@0.2, BH31@2.3, BH32@1, BH33@0.5, BH33@2.5, BH44@0.3, BH44@1.3, BH45@0.7 - BH45@1.7, BH45@2.2, BH47@1.3, BH47@2.4, BH49@0.9 - BH49@0.7, BH49@2.5, DUP@2.7, DUP2@2.2	**11-Feb-2019**	**13-Feb-2019**	25-Feb-2019	✓	**14-Feb-2019**	25-Feb-2019	✓
Soil Glass Jar - Unpreserved (EP071)							
BH29@0.4, BH30@0.8, BH30@2.7, BH31@0.2, BH31@2.3, BH32@1, BH33@0.5, BH33@2.5, BH44@0.3, BH44@1.3, BH45@0.7 - BH45@1.7, BH45@2.2, BH47@1.3, BH47@2.4, BH49@0.9 - BH49@0.7, BH49@2.5, DUP@2.7, DUP2@2.2	**11-Feb-2019**	**14-Feb-2019**	25-Feb-2019	✓	**14-Feb-2019**	26-Mar-2019	✓
Soil Glass Jar - Unpreserved (EP080)							
BH34@0.3, BH34@3, BH35@0.7, BH36@2.1, BH37@1.1, BH37@2.7, BH38@0.3, BH38@1.6, BH39@0.3, BH39@2.5, BH40@0.3, BH41@2, BH41@2.4, BH42@1.5, BH46@0.3, BH48@0.1 - BH48@1.0	**12-Feb-2019**	**13-Feb-2019**	26-Feb-2019	✓	**14-Feb-2019**	26-Feb-2019	✓
Soil Glass Jar - Unpreserved (EP071)							
BH34@0.3, BH34@3, BH35@0.7, BH36@1, BH36@2.1, BH37@1.1, BH37@2.7, BH38@0.3, BH38@1.6, BH39@0.3, BH39@2.5, BH40@0.3, BH41@2, BH41@2.4, BH42@1.5, BH46@0.3, BH48@0.1 - BH48@1.0	**12-Feb-2019**	**14-Feb-2019**	26-Feb-2019	✓	**14-Feb-2019**	26-Mar-2019	✓

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)		Sample Date	Extraction / Preparation			Analysis		
			Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP080: BTEXN								
Soil Glass Jar - Unpreserved (EP080)								
BH29@0.4,	BH30@0.8,	**11-Feb-2019**	**13-Feb-2019**	25-Feb-2019	✓	**14-Feb-2019**	25-Feb-2019	✓
BH30@2.7,	BH31@0.2,							
BH31@2.3,	BH32@1,							
BH33@0.5,	BH33@2.5,							
BH44@0.3,	BH44@1.3,							
BH45@0.7 - BH45@1.7,	BH45@2.2,							
BH47@1.3,	BH47@2.4,							
BH49@0.9 - BH49@0.7,	BH49@2.5,							
DUP@2.7,	DUP2@2.2,							
TS,	TB							
Soil Glass Jar - Unpreserved (EP080)								
TSC		**11-Feb-2019**	**14-Feb-2019**	25-Feb-2019	✓	**14-Feb-2019**	25-Feb-2019	✓
Soil Glass Jar - Unpreserved (EP080)								
BH34@0.3,	BH34@3,	**12-Feb-2019**	**13-Feb-2019**	26-Feb-2019	✓	**14-Feb-2019**	26-Feb-2019	✓
BH35@0.7,	BH36@2.1,							
BH37@1.1,	BH37@2.7,							
BH38@0.3,	BH38@1.6,							
BH39@0.3,	BH39@2.5,							
BH40@0.3,	BH41@2,							
BH41@2.4,	BH42@1.5,							
BH46@0.3,	BH48@0.1 - BH48@1.0							
Soil Glass Jar - Unpreserved (EP080)								
BH36@1		**12-Feb-2019**	**14-Feb-2019**	26-Feb-2019	✓	**14-Feb-2019**	26-Feb-2019	✓
EP231A: Perfluoroalkyl Sulfonic Acids								
HDPE Soil Jar (EP231X)								
BH32@1.9,	BH44@1	**11-Feb-2019**	**14-Feb-2019**	10-Aug-2019	✓	**14-Feb-2019**	26-Mar-2019	✓
HDPE Soil Jar (EP231X)								
BH36@1.5,	BH37@1.5,	**12-Feb-2019**	**14-Feb-2019**	11-Aug-2019	✓	**14-Feb-2019**	26-Mar-2019	✓
BH38@1.6								
EP231B: Perfluoroalkyl Carboxylic Acids								
HDPE Soil Jar (EP231X)								
BH32@1.9,	BH44@1	**11-Feb-2019**	**14-Feb-2019**	10-Aug-2019	✓	**14-Feb-2019**	26-Mar-2019	✓
HDPE Soil Jar (EP231X)								
BH36@1.5,	BH37@1.5,	**12-Feb-2019**	**14-Feb-2019**	11-Aug-2019	✓	**14-Feb-2019**	26-Mar-2019	✓
BH38@1.6								
EP231C: Perfluoroalkyl Sulfonamides								
HDPE Soil Jar (EP231X)								
BH32@1.9,	BH44@1	**11-Feb-2019**	**14-Feb-2019**	10-Aug-2019	✓	**14-Feb-2019**	26-Mar-2019	✓
HDPE Soil Jar (EP231X)								
BH36@1.5,	BH37@1.5,	**12-Feb-2019**	**14-Feb-2019**	11-Aug-2019	✓	**14-Feb-2019**	26-Mar-2019	✓
BH38@1.6								

Matrix: **SOIL**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP231D: (n:2) Fluorotelomer Sulfonic Acids							
HDPE Soil Jar (EP231X) BH32@1.9, BH44@1	**11-Feb-2019**	**14-Feb-2019**	10-Aug-2019	✓	**14-Feb-2019**	26-Mar-2019	✓
HDPE Soil Jar (EP231X) BH36@1.5, BH37@1.5, BH38@1.6	**12-Feb-2019**	**14-Feb-2019**	11-Aug-2019	✓	**14-Feb-2019**	26-Mar-2019	✓
EP231P: PFAS Sums							
HDPE Soil Jar (EP231X) BH32@1.9, BH44@1	**11-Feb-2019**	**14-Feb-2019**	10-Aug-2019	✓	**14-Feb-2019**	26-Mar-2019	✓
HDPE Soil Jar (EP231X) BH36@1.5, BH37@1.5, BH38@1.6	**12-Feb-2019**	**14-Feb-2019**	11-Aug-2019	✓	**14-Feb-2019**	26-Mar-2019	✓

Matrix: **SOLID**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EA200: AS 4964 - 2004 Identification of Asbestos in bulk samples							
Snap Lock Bag (EA200) BH44 - PACM	**11-Feb-2019**	**----**	----	----	**15-Feb-2019**	10-Aug-2019	✓
Snap Lock Bag (EA200) Near BH48 - ACM	**12-Feb-2019**	**----**	----	----	**15-Feb-2019**	11-Aug-2019	✓

Quality Control Parameter Frequency Compliance

The following report summarises the frequency of laboratory QC samples analysed within the analytical lot(s) in which the submitted sample(s) was(were) processed. Actual rate should be greater than or equal to the expected rate. A listing of breaches is provided in the Summary of Outliers.

Matrix: **SOIL**

Evaluation: × = Quality Control frequency not within specification ; ✓ = Quality Control frequency within specification.

Quality Control Sample Type		Count		Rate (%)			Quality Control Specification
Analytical Methods	*Method*	*QC*	*Regular*	***Actual***	***Expected***	*Evaluation*	
Laboratory Duplicates (DUP)							
Moisture Content	EA055	6	57	**10.53**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	2	12	**16.67**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Pesticides by GCMS	EP068	4	35	**11.43**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Polychlorinated Biphenyls (PCB)	EP066	4	35	**11.43**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Semivolatile Organic Compounds	EP075	4	35	**11.43**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Total Mercury by FIMS	EG035T	7	70	**10.00**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Total Metals by ICP-AES	EG005T	7	69	**10.14**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH - Semivolatile Fraction	EP071	4	35	**11.43**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH Volatiles/BTEX	EP080	7	51	**13.73**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Volatile Organic Compounds	EP074	5	37	**13.51**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Laboratory Control Samples (LCS)							
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	1	12	**8.33**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Pesticides by GCMS	EP068	2	35	**5.71**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Polychlorinated Biphenyls (PCB)	EP066	2	35	**5.71**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Semivolatile Organic Compounds	EP075	2	35	**5.71**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Total Mercury by FIMS	EG035T	4	70	**5.71**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Total Metals by ICP-AES	EG005T	4	69	**5.80**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH - Semivolatile Fraction	EP071	2	35	**5.71**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH Volatiles/BTEX	EP080	4	51	**7.84**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Volatile Organic Compounds	EP074	3	37	**8.11**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Method Blanks (MB)							
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	1	12	**8.33**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Pesticides by GCMS	EP068	2	35	**5.71**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Polychlorinated Biphenyls (PCB)	EP066	2	35	**5.71**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Semivolatile Organic Compounds	EP075	2	35	**5.71**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Total Mercury by FIMS	EG035T	4	70	**5.71**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Total Metals by ICP-AES	EG005T	4	69	**5.80**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH - Semivolatile Fraction	EP071	2	35	**5.71**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH Volatiles/BTEX	EP080	4	51	**7.84**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Volatile Organic Compounds	EP074	3	37	**8.11**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Matrix Spikes (MS)							
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	1	12	**8.33**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Pesticides by GCMS	EP068	2	35	**5.71**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Polychlorinated Biphenyls (PCB)	EP066	2	35	**5.71**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Semivolatile Organic Compounds	EP075	2	35	**5.71**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Total Mercury by FIMS	EG035T	4	70	**5.71**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard

Matrix: **SOIL**

Evaluation: × = Quality Control frequency not within specification ; ✓ = Quality Control frequency within specification.

Quality Control Sample Type		Count		Rate (%)			Quality Control Specification
Analytical Methods	*Method*	*QC*	*Regular*	***Actual***	***Expected***	*Evaluation*	
Matrix Spikes (MS) - Continued							
Total Metals by ICP-AES	EG005T	3	69	**4.35**	**5.00**	×	NEPM 2013 B3 & ALS QC Standard
TRH - Semivolatile Fraction	EP071	2	35	**5.71**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH Volatiles/BTEX	EP080	4	51	**7.84**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Volatile Organic Compounds	EP074	3	37	**8.11**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard

Brief Method Summaries

The analytical procedures used by the Environmental Division have been developed from established internationally recognized procedures such as those published by the US EPA, APHA, AS and NEPM. In house developed procedures are employed in the absence of documented standards or by client request. The following report provides brief descriptions of the analytical procedures employed for results reported in the Certificate of Analysis. Sources from which ALS methods have been developed are provided within the Method Descriptions.

Analytical Methods	Method	Matrix	Method Descriptions
Moisture Content	EA055	SOIL	In house: A gravimetric procedure based on weight loss over a 12 hour drying period at 105-110 degrees C. This method is compliant with NEPM (2013) Schedule B(3) Section 7.1 and Table 1 (14 day holding time).
Asbestos Identification in Soils	EA200	SOIL	AS 4964 - 2004 Method for the qualitative identification of asbestos in bulk samples Analysis by Polarised Light Microscopy including dispersion staining
Asbestos Classification and Quantitation per NEPM 2013	* EA200N	SOIL	Asbestos Classification and Quantitation per NEPM 2013 with Confirmation of Identification by AS 4964 - 2004 Gravimetric determination of Asbestos Containing Material, Fibrous Asbestos, Asbestos Fines and sample weight and calculation of percentage concentrations per NEPM protocols. Asbestos (Fines and Fibrous FA+AF) is reported as the equivalent weight in the sample received after accounting for sub-sampling (where applicable for the <7mm and/or <2mm fractions).
Total Metals by ICP-AES	EG005T	SOIL	In house: Referenced to APHA 3120; USEPA SW 846 - 6010. Metals are determined following an appropriate acid digestion of the soil. The ICPAES technique ionises samples in a plasma, emitting a characteristic spectrum based on metals present. Intensities at selected wavelengths are compared against those of matrix matched standards. This method is compliant with NEPM (2013) Schedule B(3)
Total Mercury by FIMS	EG035T	SOIL	In house: Referenced to AS 3550, APHA 3112 Hg - B (Flow-injection (SnCl2) (Cold Vapour generation) AAS) FIM-AAS is an automated flameless atomic absorption technique. Mercury in solids are determined following an appropriate acid digestion. Ionic mercury is reduced online to atomic mercury vapour by SnCl2 which is then purged into a heated quartz cell. Quantification is by comparing absorbance against a calibration curve. This method is compliant with NEPM (2013) Schedule B(3)
Polychlorinated Biphenyls (PCB)	EP066	SOIL	In house: Referenced to USEPA SW 846 - 8270D Extracts are analysed by Capillary GC/MS and quantification is by comparison against an established 5 point calibration curve. This method is compliant with NEPM (2013) Schedule B(3) (Method 504)
Pesticides by GCMS	EP068	SOIL	In house: Referenced to USEPA SW 846 - 8270D Extracts are analysed by Capillary GC/MS and quantification is by comparison against an established 5 point calibration curve. This technique is compliant with NEPM (2013) Schedule B(3) (Method 504,505)
TRH - Semivolatile Fraction	EP071	SOIL	In house: Referenced to USEPA SW 846 - 8015A Sample extracts are analysed by Capillary GC/FID and quantified against alkane standards over the range C10 - C40. Compliant with NEPM amended 2013.
Volatile Organic Compounds	EP074	SOIL	In house: Referenced to USEPA SW 846 - 8260B Extracts are analysed by Purge and Trap, Capillary GC/MS. Quantification is by comparison against an established 5 point calibration curve. This method is compliant with NEPM (2013) Schedule B(3) (Method 501)
Semivolatile Organic Compounds	EP075	SOIL	In house: Referenced to USEPA SW 846 - 8270D Extracts are analysed by Capillary GC/MS and quantification is by comparison against an established 5 point calibration curve. This technique is compliant with NEPM (2013) Schedule B(3) (Method 502)
TRH Volatiles/BTEX	EP080	SOIL	In house: Referenced to USEPA SW 846 - 8260B. Extracts are analysed by Purge and Trap, Capillary GC/MS. Quantification is by comparison against an established 5 point calibration curve. Compliant with NEPM amended 2013.

Analytical Methods	Method	Matrix	Method Descriptions
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	SOIL	In-House. A portion of soil is extracted with MTBE. The extract is taken to dryness, made up in mobile phase. Analysis is by LC/MSMS, ESI Negative Mode using MRM. Where commercially available, isotopically labelled analogues of the target analytes are used as internal standards for quantification. Where a labelled analogue is not commercially available, the internal standard with similar chemistry and the closest retention time to the target is used for quantification. The DQO for internal standard response is 50-150% of that established at initial calibration. PFOS is quantified using a certified, traceable standard consisting of linear and branched PFOS isomers. This method complies with the quality control definitions as stated in QSM 5.1. Data is reviewed in line with the DQOs as stated in QSM5.1
Asbestos Identification in Bulk Solids	EA200	SOLID	In house: Referenced to AS 4964 - 2004 Method for the qualitative identification of asbestos in bulk samples Analysis by Polarised Light Microscopy including dispersion staining

Preparation Methods	Method	Matrix	Method Descriptions
Hot Block Digest for metals in soils sediments and sludges	EN69	SOIL	In house: Referenced to USEPA 200.2. Hot Block Acid Digestion 1.0g of sample is heated with Nitric and Hydrochloric acids, then cooled. Peroxide is added and samples heated and cooled again before being filtered and bulked to volume for analysis. Digest is appropriate for determination of selected metals in sludge, sediments, and soils. This method is compliant with NEPM (2013) Schedule B(3) (Method 202)
Sample Extraction for PFAS	EP231-PR	SOIL	In house
Methanolic Extraction of Soils for Purge and Trap	ORG16	SOIL	In house: Referenced to USEPA SW 846 - 5030A. 5g of solid is shaken with surrogate and 10mL methanol prior to analysis by Purge and Trap - GC/MS.
Tumbler Extraction of Solids	ORG17	SOIL	In house: Mechanical agitation (tumbler). 10g of sample, Na2SO4 and surrogate are extracted with 30mL 1:1 DCM/Acetone by end over end tumble. The solvent is decanted, dehydrated and concentrated (by KD) to the desired volume for analysis.

ALS Environmental

AIN OF CUSTODY

Laboratory: please tick →

TAT

DSYDNEY 277-289 Woodpark Road Smithfield NSW 2164
Ph: 02 8784 8555 E: samples.sydney@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	TURNAROUND REQUIREMENTS : 1 DAY TAT (List due date):	FOR LABORATORY USE ONLY (Circle)
OFFICE: Level 16, 580 George St, Sydney, NSW 2000	(Standard TAT may be longer for some tests e.g. Ultra Trace Organics) ☒ Non Standard or urgent TAT (List due date): Due 14/02/19	Custody Seal Intact? Yes No N/A
	ALS QUOTE NO.:	Free ice / frozen ice bricks present upon receipt? Yes No N/A
ORDER NUMBER: 10026439 - task 6	COC SEQUENCE NUMBER (Circle) COC: 1 2 3 4 5 6 7	Random Sample Temperature on Receipt: 7.5 °C
PROJECT MANAGER: Caitlain Regena CONTACT PH:	OF: 1 2 3 4 5 6 7	Other comment:

SAMPLER: Tom Keatley	SAMPLER MOBILE: 0429 948 897	RELINQUISHED BY:	RECEIVED BY:	RELINQUISHED BY:	RECEIVED BY:
COC emailed to ALS? (NO)	EDD FORMAT (or default): ESDAT	*Caitlain Regena*			MC
Email Reports to : caitlain.regena@arcadis.com; tom.keatley@arcadis.com		DATE/TIME:	DATE/TIME:	DATE/TIME:	DATE/TIME:
Email Invoice to: Accounts.Payable <AU.Accounts.Payable@arcadis.com>		13/02/2019			13/2/19 2:55pm

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)			CONTAINER INFORMATION	ANALYSIS REQUIRED Including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).						Additional Information
LAB ID	SAMPLE ID	DEPTH	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Anlytes)	Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
1	BH29@0.4		11-02-19	s		X	X	X	X		
2	BH29@1		11-02-19	s							
3	BH29@1.5		11-02-19	s							
4	BH29@2.1		11-02-19	s							
5	BH30@0.4		11-02-19	s							
6	BH30@0.8		11-02-19	s		X	X	X	X		
7	BH30@1		11-02-19	s							
8	BH30@1.8		11-02-19	s							
9	BH30@2.7		11-02-19	s		X	X	X			
10	BH31@0.2	~~12-02-19~~	11-02-19	s		X	X	X	X		
11	BH31@0.4	~~12-02-19~~	11-02-19	s							
12	BH31@0.9	~~12-02-19~~	11-02-19	s							
13	BH31@1.1	~~12-02-19~~	11-02-19	s							
14	BH31@2.3	~~12-02-19~~	11-02-19	s		X	X	X			
15	BH32@0.3	~~12-02-19~~	11-02-19	s							
					TOTAL	5	5	5	3		

Subcon / Forward Lab / Split WO
Lab / Analysis: Asbestos - Nauscall.
Organised By / Date: Samples 1,6,10,16,21,23,25,40,44,46,48,52,53,58,61,66,71,76,80,85
Relinquished By / Date: 12/2/19 forwarded to envirolab.
Courier / Courier: Samples Trip@2.7(2-4) forwarded
WO No:
Attached By PO / Internal Sheet:

Environmental Division
Sydney
Work Order Reference
ES1904527

Telephone : +61-2-8784 8555

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass;
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

ALS Environmental

AIN OF STODY

Laboratory: lease tick →

SYDNEY 277-289 Woodpark Road Smithfield NSW 2164
Ph: 02 8784 8555 E: samples.sydney@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	TURNAROUND REQUIREMENTS : 1 DAY TAT (List due date):	FOR LABORATORY USE ONLY (Circle)
OFFICE: Level 16, 580 George St, Sydney NSW 2000	(Standard TAT may be longer for some tests e.g. Ultra Trace Organics) ☒ Non Standard or urgent TAT (List due date): Due 14/02/19	Custody Seal Intact? Yes No N/A
	ALS QUOTE NO.:	Free ice / frozen ice bricks present upon receipt? Yes No N/A
ORDER NUMBER: 10026439 - task 6	COC SEQUENCE NUMBER (Circle) COC: 1 (2) 3 4 5 6 7	Random Sample Temperature on Receipt: 7.5 °C
PROJECT MANAGER: Caitlain Regena	CONTACT PH: OF: 1 2 3 4 5 6 (7)	Other comment:

SAMPLER: Tom Keatley	SAMPLER MOBILE: 0429 948 897	RELINQUISHED BY:	RECEIVED BY:	RELINQUISHED BY:	RECEIVED BY:
COC emailed to ALS? (NO)	EDD FORMAT (or default): ESDAT	*Caitlain Regena*			MC
Email Reports to : caitlain.regena@arcadis.com; tom.keatley@arcadis.com		DATE/TIME:	DATE/TIME:	DATE/TIME:	DATE/TIME: 13/2/19 2:55pm
Email Invoice to: Accounts.Payable <AU.Accounts.Payable@arcadis.com>		13/02/2019			

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)				CONTAINER INFORMATION	ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).									Additional Information
LAB ID	SAMPLE ID	DEPTH	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Anlytes)					Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
16	BH32@1		11-02-19	s		X	X	X	X						
17	BH32@1.3		11-02-19	s											
18	BH32@1.9		11-02-19	s						X					
19	BH32@2.5		11-02-19	s											
20	BH32@3		11-02-19	s											
21	BH33@0.5		11-02-19	s		X	X	X	X						
22	BH33@0.6		11-02-19	s											
23	BH33@1.5		11-02-19	s											
24	BH33@2.5		11-02-19	s		X	X	X							
25	BH34@0.3		12-02-19	s		X	X	X	X						
26	BH34@1		12-02-19	s											
27	BH34@2		12-02-19	s											
28	BH34@2.5		12-02-19	s											
29	BH34@3		12-02-19	s		X	X	X							
30	BH35@0.3		12-02-19	s											
					TOTAL	5	5	5	3	1					

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass;
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

ALS Environmental — CHAIN OF CUSTODY

Laboratory: please tick →

SYDNEY 277-289 Woodpark Road Smithfield NSW 2164
Ph: 02 8784 8555 E: samples.sydney@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	**TURNAROUND REQUIREMENTS :** 1 DAY TAT (List due date):	**FOR LABORATORY USE ONLY (Circle)**
OFFICE: Level 16, 580 George St, Sydney NSW 2000	(Standard TAT may be longer for some tests e.g. Ultra Trace Organics) ☒ Non Standard or urgent TAT (List due date): Due 14/02/19	Custody Seal Intact? Yes / No / N/A
	ALS QUOTE NO.:	Free ice / frozen ice bricks present upon receipt? Yes / No / N/A
ORDER NUMBER: 10026439 - task 6		COC SEQUENCE NUMBER (Circle): COC: 1 2 3 4 5 6 7; OF: 1 2 3 4 5 6 7
PROJECT MANAGER: Caitlain Regena	**CONTACT PH:**	Random Sample Temperature on Receipt: 1.5 °C
SAMPLER: Tom Keatley	**SAMPLER MOBILE:** 0429 948 897	Other comments:
COC emailed to ALS? (NO)	**EDD FORMAT (or default):** ESDAT	
Email Reports to : caitlain.regena@arcadis.com; tom.keatley@arcadis.com		
Email Invoice to: Accounts.Payable <AU.Accounts.Payable@arcadis.com>		

RELINQUISHED BY:	RECEIVED BY:	RELINQUISHED BY:	RECEIVED BY:
Caitlain Regena			ML
DATE/TIME: 13/02/2019	DATE/TIME:	DATE/TIME:	DATE/TIME: 13/2/19 2:55pm

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE*	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)				CONTAINER INFORMATION	ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).								Additional Information
LAB ID	SAMPLE ID	DEPTH	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Anlytes)				Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
31	BH35@0.7		12-02-19	s		X	X	X	X					
32	BH35@1.2		12-02-19	s										
33	BH35@2.4		12-02-19	s										
34	BH36@0.3		12-02-19	s										
35	BH36@1		12-02-19	s		X	X	X	X					
36	BH36@1.3		12-02-19	s										
37	BH36@1.5		12-02-19	s						X				
38	BH36@2.1		12-02-19	s		X	X	X						
39	BH37@0.3		12-02-19	s										
40	BH37@1.1		12-02-19	s		X	X	X	X					
41	BH37@1.5		12-02-19	s						X				
42	BH37@1.9		12-02-19	s										
43	BH37@2.7		12-02-19	s		X	X	X						
44	BH38@0.3		12-02-19	s		X	X	X	X					
45	BH38@0.8		12-02-19	s										
					TOTAL	6	6	6	4	2				

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass;
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

AIN OF STODY

Environmental Laboratory: please tick →

SYDNEY 277-289 Woodpark Road Smithfield NSW 2164
Ph: 02 8784 8555 E: samples.sydney@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	TURNAROUND REQUIREMENTS : (Standard TAT may be longer for some tests e.g. Ultra Trace Organics)	1 DAY TAT (List due date):	FOR LABORATORY USE ONLY (Circle)
OFFICE: Level 10, 580 George St, Sydney NSW 2000		☒ Non Standard or urgent TAT (List due date): Due 14/02/19	Custody Seal Intact? Yes No N/A
	ALS QUOTE NO.:	COC SEQUENCE NUMBER (Circle)	Ice bricks/ frozen ice bricks present upon receipt? Yes No N/A
ORDER NUMBER: 10026439 - task 6		COC: 1 2 3 4 5 6 7	Random Sample Temperature on Receipt: 1.5 °C
PROJECT MANAGER: Caitlain Regena	CONTACT PH:	OF: 1 2 3 4 5 6 7	Other comments:

SAMPLER: Tom Keatley	SAMPLER MOBILE: 0429 948 897	RELINQUISHED BY:	RECEIVED BY:	RELINQUISHED BY:	RECEIVED BY:
COC emailed to ALS? (NO)	EDD FORMAT (or default): ESDAT	*Caitlain Regena*			MC
Email Reports to : caitlain.regena@arcadis.com; tom.keatley@arcadis.com		DATE/TIME:	DATE/TIME:	DATE/TIME:	DATE/TIME:
Email Invoice to: Accounts.Payable <AU.Accounts.Payable@arcadis.com>		13/02/2019			13/2/19 2:55pm

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)				CONTAINER INFORMATION	ANALYSIS REQUIRED Including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).								Additional Information
LAB ID	SAMPLE ID	DEPTH	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Anlytes)				Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
46	BH38@1.6		12-02-19	s		X	X	X	X	X				
47	BH38@2.4		12-02-19	s										
48	BH39@0.3		12-02-19	s		X	X	X	X					
49	BH39@1.2		12-02-19	s										
50	BH39@1.6		12-02-19	s										
51	BH39@2.5		12-02-19	s		X	X	X						
52	BH40@0.3		12-02-19	s		X	X	X	X					
53	BH41@0.4		12-02-19	s										
54	BH41@1		12-02-19	s										
55	BH41@2		12-02-19	s		X	X	X	X					
56	BH41@2.4		12-02-19	s		X	X	X						
57	BH42@0.4		12-02-19	s										
58	BH42@1.5		12-02-19	s		X	X	X	X					
59	BH42@2		12-02-19	s										
60	BH42@2.5		12-02-19	s										
					TOTAL	7	7	7	5	1				

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass;
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

AIN OF STODY

Environmental | Laboratory: lease tick →

SYDNEY 277-289 Woodpark Road Smithfield NSW 2164
Ph: 02 8784 8555 E: samples.sydney@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	TURNAROUND REQUIREMENTS : 1 DAY TAT (List due date):	FOR LABORATORY USE ONLY (Circle)
OFFICE: [illegible]	(Standard TAT may be longer for some tests e.g., Ultra Trace Organics) ☒ Non Standard or urgent TAT (List due date): Due 14/02/19	Custody Seal Intact? Yes No N/A
	ALS QUOTE NO.:	COC SEQUENCE NUMBER (Circle) — Presence of frozen ice bricks/gel packs present upon receipt? Yes No N/A
ORDER NUMBER: 10026439 - task 6		COC: 1 2 3 4 5 6 7 — Random Sample Temperature on Receipt: 1.5 °C
PROJECT MANAGER: Caitlain Regena	CONTACT PH:	OF: 1 2 3 4 5 6 7 — Other comment:

SAMPLER: Tom Keatley	SAMPLER MOBILE: 0429 948 897	RELINQUISHED BY:	RECEIVED BY:	RELINQUISHED BY:	RECEIVED BY:
COC emailed to ALS? (NO)	EDD FORMAT (or default): ESDAT	*Caitlain Regena*			ML
Email Reports to : caitlain.regena@arcadis.com; tom.keatley@arcadis.com		DATE/TIME:	DATE/TIME:	DATE/TIME:	DATE/TIME:
Email Invoice to: Accounts.Payable <AU.Accounts.Payable@arcadis.com>		13/02/2019			13/2/19 2:55pm

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)				CONTAINER INFORMATION		ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).								Additional Information
LAB ID	SAMPLE ID	DEPTH	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Anlytes)					Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
61	BH44@0.3		11-02-19	s		X	X	X	X						
62	BH44@1		11-02-19	s						X					
63	BH44@1.2		11-02-19	s											
64	BH44@1.3		11-02-19	s		X	X	X							
65	BH45@0.4		11-02-19	s											
66	BH45@0.7		11-02-19	s		X	X	X	X						
67	BH45@0.9		11-02-19	s											
68	BH45@1.9		11-02-19	s											
69	BH45@2.2		11-02-19	s		X	X	X							
70	BH45@2.8		11-02-19	s											
71	BH46@0.3		12-02-19	s		X	X	X	X						
72	BH46@1		12-02-19	s											
73	BH46@1.7		12-02-19	s											
74	BH46@2.3		12-02-19	s											
75	BH47@0.3		11-02-19	s											
					TOTAL	5	5	5	3	1					

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass;
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

AIN OF CUSTODY

Environmental | Laboratory: please tick →

SYDNEY 277-289 Woodpark Road Smithfield NSW 2164
Ph: 02 8784 8555 | E: samples.sydney@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	TURNAROUND REQUIREMENTS : (Standard TAT may be longer for some tests e.g. Ultra Trace Organics)	1 DAY TAT (List due date):	FOR LABORATORY USE ONLY (Circle)
OFFICE: [redacted]		☒ Non Standard or urgent TAT (List due date): Due 14/02/19	Custody Seal Intact? Yes No N/A
	ALS QUOTE NO.:	COC SEQUENCE NUMBER (Circle)	Cooler / frozen ice bricks present upon receipt? Yes No N/A
ORDER NUMBER: 10026439 - task 6		COC: 1 2 3 4 5 6 7	Random Sample Temperature on Receipt: 12.5 °C
PROJECT MANAGER: Caitlain Regena	CONTACT PH:	OF: 1 2 3 4 5 6 7	Other comment:

SAMPLER: Tom Keatley	SAMPLER MOBILE: 0429 948 897	RELINQUISHED BY:	RECEIVED BY:	RELINQUISHED BY:	RECEIVED BY:
COC emailed to ALS? (NO)	EDD FORMAT (or default): ESDAT	*Caitlain Regena*			MC
Email Reports to : caitlain.regena@arcadis.com; tom.keatley@arcadis.com		DATE/TIME:	DATE/TIME:	DATE/TIME:	DATE/TIME: 13/2/19 2:55pm
Email Invoice to: Accounts.Payable <AU.Accounts.Payable@arcadis.com>		13/02/2019			

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)				CONTAINER INFORMATION	ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).									Additional Information
LAB ID	SAMPLE ID	DEPTH	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Anlytes)					Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
76	BH47@1.3		11-02-19	s		X	X	X	X						
77	BH47@1.6		11-02-19	s											
78	BH47@1.9		11-02-19	s											
79	BH47@2.4		11-02-19	s		X	X	X							
80	BH48@0.1		12-02-19	s		X	X	X	X						
81	BH48@0.3		12-02-19	s											
82	BH48@1.9		12-02-19	s											
83	BH48@2.5		12-02-19	s											
84	BH49@0.3		11-02-19	s											
85	BH49@0.9		11-02-19	s		X	X	X	X						
86	BH49@1		11-02-19	s											
87	BH49@1.4		11-02-19	s											
88	BH49@2.5		11-02-19	s		X	X	X							
89	DUP@2.7		11-02-19	s		X	X	X							
90	DUP2@2.2		11-02-19	s		X	X	X							
					TOTAL	7	7	7	3						

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass;
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

ALS Environmental — CHAIN OF CUSTODY

Laboratory: please tick →

SYDNEY 277-289 Woodpark Road Smithfield NSW 2164
Ph: 02 8784 8555 E: samples.sydney@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	TURNAROUND REQUIREMENTS : (Standard TAT may be longer for some tests e.g. Ultra Trace Organics)	1 DAY TAT (List due date):
OFFICE: Level 16, 680 George St Sydney NSW 2000		☒ Non Standard or urgent TAT (List due date): Due 14/02/19
	ALS QUOTE NO.:	COC SEQUENCE NUMBER (Circle) COC: 1 2 3 4 5 6 (7) (8) OF: 1 2 3 4 5 6 (7)
ORDER NUMBER: 10026439 - task 6		
PROJECT MANAGER: Caitlain Regena	CONTACT PH:	
SAMPLER: Tom Keatley	SAMPLER MOBILE: 0429 948 897	
COC emailed to ALS? (NO)	EDD FORMAT (or default): ESDAT	
Email Reports to : caitlain.regena@arcadis.com; tom.keatley@arcadis.com		
Email Invoice to: Accounts.Payable <AU.Accounts.Payable@arcadis.com>		

FOR LABORATORY USE ONLY (Circle)
Custody Seal Intact? Yes No N/A
Frozen ice bricks present upon receipt? Yes No N/A
Random Sample Temperature on Receipt: ~1.5 °C
Other comment:

RELINQUISHED BY:	RECEIVED BY:	RELINQUISHED BY:	RECEIVED BY:
Caitlain Regena			MC
DATE/TIME: 13/02/2019	DATE/TIME:	DATE/TIME:	DATE/TIME: 13/2/19 2:55pm

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)				CONTAINER INFORMATION	ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).									Additional Information
LAB ID	SAMPLE ID	DEPTH	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	S-5	S-13	S-23	Asbestos NEPM	Standard PFAS (28 Anlytes)	Asbestos ID	BTEX			Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
91	DUP3@2.4		12-02-19	s											
—	TRIP@2.7		11-02-19	s		X	X	X							Please send to Envirolab.
—	TRIP2@2.2		11-02-19	s		X	X	X							Please send to Envirolab.
92	TRIP3@2.4		12-02-19	s											
93	CC - Water		12-02-19	w											
94	Rinsate		12-02-19	w											
95	TS		11/02	s								x			
96	TB		11/02	s								x			
SNR	Near BH48 -ACM	0	~~11/02~~ 12-02-19	o							x				
SNR	BH44 - PACM	1.1	~~11/02~~ 12-02-19	o							x				
97	TSC		11/2/19												
					TOTAL	2	2	2	0	0	2	2			

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass;
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

Envirolab Services Pty Ltd
ABN 37 112 535 645
12 Ashley St Chatswood NSW 2067
ph 02 9910 6200 fax 02 9910 6201
customerservice@envirolab.com.au
www.envirolab.com.au

CERTIFICATE OF ANALYSIS 209318

Client Details

Client	Arcadis Australia Pacific Pty Ltd
Attention	Tom Keatley, Dean Stafford
Address	Level 16, 580 George St, Sydney, NSW, 2000

Sample Details

Your Reference	**10026439.1, King St North Carpark**
Number of Samples	1 Water
Date samples received	11/01/2019
Date completed instructions received	11/01/2019

Analysis Details

Please refer to the following pages for results, methodology summary and quality control data.

Samples were analysed as received from the client. Results relate specifically to the samples as received.

Results are reported on a dry weight basis for solids and on an as received basis for other matrices.

Report Details

Date results requested by	18/01/2019
Date of Issue	17/01/2019

NATA Accreditation Number 2901. This document shall not be reproduced except in full.

Accredited for compliance with ISO/IEC 17025 - Testing. **Tests not covered by NATA are denoted with ***

Results Approved By
Alexander Mitchell Maclean, Senior Chemist
Giovanni Agosti, Group Technical Manager
Priya Samarawickrama, Senior Chemist
Steven Luong, Senior Chemist

Authorised By



Jacinta Hurst, Laboratory Manager

VOCs in water		
Our Reference		209318-1
Your Reference	UNITS	TRIP
Date Sampled		08/01/2019
Type of sample		Water
Date extracted	-	14/01/2019
Date analysed	-	15/01/2019
Dichlorodifluoromethane	µg/L	<10
Chloromethane	µg/L	<10
Vinyl Chloride	µg/L	<10
Bromomethane	µg/L	<10
Chloroethane	µg/L	<10
Trichlorofluoromethane	µg/L	<10
1,1-Dichloroethene	µg/L	<1
Trans-1,2-dichloroethene	µg/L	<1
1,1-dichloroethane	µg/L	<1
Cis-1,2-dichloroethene	µg/L	19
Bromochloromethane	µg/L	<1
Chloroform	µg/L	<1
2,2-dichloropropane	µg/L	<1
1,2-dichloroethane	µg/L	<1
1,1,1-trichloroethane	µg/L	<1
1,1-dichloropropene	µg/L	<1
Cyclohexane	µg/L	<1
Carbon tetrachloride	µg/L	<1
Benzene	µg/L	<1
Dibromomethane	µg/L	<1
1,2-dichloropropane	µg/L	<1
Trichloroethene	µg/L	<1
Bromodichloromethane	µg/L	<1
trans-1,3-dichloropropene	µg/L	<1
cis-1,3-dichloropropene	µg/L	<1
1,1,2-trichloroethane	µg/L	<1
Toluene	µg/L	<1
1,3-dichloropropane	µg/L	<1
Dibromochloromethane	µg/L	<1
1,2-dibromoethane	µg/L	<1
Tetrachloroethene	µg/L	<1
1,1,1,2-tetrachloroethane	µg/L	<1
Chlorobenzene	µg/L	<1
Ethylbenzene	µg/L	<1
Bromoform	µg/L	<1

VOCs in water		
Our Reference		209318-1
Your Reference	UNITS	TRIP
Date Sampled		08/01/2019
Type of sample		Water
m+p-xylene	µg/L	<2
Styrene	µg/L	<1
1,1,2,2-tetrachloroethane	µg/L	<1
o-xylene	µg/L	<1
1,2,3-trichloropropane	µg/L	<1
Isopropylbenzene	µg/L	<1
Bromobenzene	µg/L	<1
n-propyl benzene	µg/L	<1
2-chlorotoluene	µg/L	<1
4-chlorotoluene	µg/L	<1
1,3,5-trimethyl benzene	µg/L	<1
Tert-butyl benzene	µg/L	<1
1,2,4-trimethyl benzene	µg/L	<1
1,3-dichlorobenzene	µg/L	<1
Sec-butyl benzene	µg/L	<1
1,4-dichlorobenzene	µg/L	<1
4-isopropyl toluene	µg/L	<1
1,2-dichlorobenzene	µg/L	<1
n-butyl benzene	µg/L	<1
1,2-dibromo-3-chloropropane	µg/L	<1
1,2,4-trichlorobenzene	µg/L	<1
Hexachlorobutadiene	µg/L	<1
1,2,3-trichlorobenzene	µg/L	<1
Surrogate Dibromofluoromethane	%	103
Surrogate toluene-d8	%	100
Surrogate 4-BFB	%	100

vTRH in Water (C6-C9) NEPM		
Our Reference	UNITS	209318-1
Your Reference		TRIP
Date Sampled		08/01/2019
Type of sample		Water
Date extracted	-	14/01/2019
Date analysed	-	15/01/2019
TRH C_6 - C_9	µg/L	14
TRH C_6 - C_{10}	µg/L	14
Surrogate Dibromofluoromethane	%	103
Surrogate toluene-d8	%	100
Surrogate 4-BFB	%	100

svTRH (C10-C40) in Water		
Our Reference	UNITS	209318-1
Your Reference		TRIP
Date Sampled		08/01/2019
Type of sample		Water
Date extracted	-	15/01/2019
Date analysed	-	16/01/2019
TRH C_{10} - C_{14}	µg/L	<50
TRH C_{15} - C_{28}	µg/L	<100
TRH C_{29} - C_{36}	µg/L	<100
TRH >C_{10} - C_{16}	µg/L	<50
TRH >C_{16} - C_{34}	µg/L	<100
TRH >C_{34} - C_{40}	µg/L	<100
Surrogate o-Terphenyl	%	79

SVOC's in water		
Our Reference	UNITS	209318-1
Your Reference		TRIP
Date Sampled		08/01/2019
Type of sample		Water
Date extracted	-	15/01/2019
Date analysed	-	15/01/2019
Phenol	µg/L	<2
Bis (2-chloroethyl) ether	µg/L	<5
2-Chlorophenol	µg/L	<2
1,3-Dichlorobenzene	µg/L	<2
1,4-Dichlorobenzene	µg/L	<2
2-Methylphenol	µg/L	<2
1,2-Dichlorobenzene	µg/L	<2
bis-(2-Chloroisopropyl) ether	µg/L	<5
3/4-Methylphenol	µg/L	<4
N-nitrosodi-n-propylamine	µg/L	<5
Hexachloroethane	µg/L	<2
Nitrobenzene	µg/L	<5
Isophorone	µg/L	<5
2,4-Dimethylphenol	µg/L	<2
2-Nitrophenol	µg/L	<2
bis (2-Chloroethoxy) methane	µg/L	<5
2,4-Dichlorophenol	µg/L	<2
1,2,4-Trichlorobenzene	µg/L	<2
Naphthalene	µg/L	<2
4-Chloroaniline	µg/L	<5
4-Chloro-3-methylphenol	µg/L	<10
Hexachlorobutadiene	µg/L	<2
2-Methylnaphthalene	µg/L	<2
Hexachlorocyclopentadiene	µg/L	<5
2,4,6-Trichlorophenol	µg/L	<2
2,4,5-Trichlorophenol	µg/L	<2
2-Chloronaphthalene	µg/L	<2
2-Nitroaniline	µg/L	<5
Dimethyl phthalate	µg/L	<10
2,6-Dinitrotoluene	µg/L	<5
Acenaphthylene	µg/L	<2
3-Nitroaniline	µg/L	<5
Acenaphthene	µg/L	<2
2,4-Dinitrophenol	µg/L	<20
4-Nitrophenol	µg/L	<20

SVOC's in water		
Our Reference		209318-1
Your Reference	UNITS	TRIP
Date Sampled		08/01/2019
Type of sample		Water
Dibenzofuran	µg/L	<5
Diethylphthalate	µg/L	<10
4-Chlorophenylphenylether	µg/L	<5
4-Nitroaniline	µg/L	<5
Fluorene	µg/L	<2
2-methyl-4,6-dinitrophenol	µg/L	<20
Azobenzene	µg/L	<5
4-Bromophenylphenylether	µg/L	<5
Hexachlorobenzene	µg/L	<2
Pentachlorophenol	µg/L	<10
Phenanthrene	µg/L	<2
Anthracene	µg/L	<2
Carbazole	µg/L	<5
Di-n-butylphthalate	µg/L	<10
Fluoranthene	µg/L	<2
Pyrene	µg/L	<2
Butylbenzylphthalate	µg/L	<10
Bis(2-ethylhexyl) phthalate	µg/L	<10
Benzo(a)anthracene	µg/L	<2
Chrysene	µg/L	<2
Di-n-octylphthalate	µg/L	<10
Benzo(b,j+k)fluoranthene	µg/L	<4
Benzo(a)pyrene	µg/L	<2
Indeno(1,2,3-c,d)pyrene	µg/L	<2
Dibenzo(a,h)anthracene	µg/L	<2
Benzo(g,h,i)perylene	µg/L	<2
Ethylmethanesulfonate	µg/L	<5
Aniline	µg/L	<5
Pentachloroethane	µg/L	<2
Benzyl alcohol	µg/L	<5
Acetophenone	µg/L	<5
N-nitrosomorpholine	µg/L	<5
N-nitrosopiperidine	µg/L	<5
2,6-Dichlorophenol	µg/L	<2
Hexachloropropene-1	µg/L	<2
N-nitroso-n-butylamine	µg/L	<5
Safrole	µg/L	<5
1,2,4,5-Tetrachlorobenzene	µg/L	<2

SVOC's in water		
Our Reference		209318-1
Your Reference	UNITS	TRIP
Date Sampled		08/01/2019
Type of sample		Water
Trans/Cis-iso-safrole	µg/L	<5
1,3-Dinitrobenzene	µg/L	<5
Pentachlorobenzene	µg/L	<2
1-Naphthylamine	µg/L	<5
2,3,4,6-Tetrachlorophenol	µg/L	<2
2-Naphthylamine	µg/L	<5
5-Nitro-o-toluidine	µg/L	<5
Diphenylamine	µg/L	<5
Phenacetin	µg/L	<5
Pentachloronitrobenzene	µg/L	<5
Dinoseb	µg/L	<10
Methapyrilene	µg/L	<10
p-Dimethylaminoazobenzene	µg/L	<5
2-Acetylaminofluorene	µg/L	<2
7,12-Dimethylbenz(a)anthracene	µg/L	<2
3-Methylcholanthrene	µg/L	<2
a-BHC	µg/L	<2
b-BHC	µg/L	<2
g-BHC	µg/L	<2
d-BHC	µg/L	<2
Heptachlor	µg/L	<2
Aldrin	µg/L	<2
Heptachlor Epoxide	µg/L	<2
g-Chlordane	µg/L	<2
a-Chlordane	µg/L	<2
Endosulfan I	µg/L	<2
p,p'-DDE	µg/L	<2
Dieldrin	µg/L	<2
Endrin	µg/L	<2
p,p'-DDD	µg/L	<2
Endosulfan II	µg/L	<2
Endrin Aldehyde	µg/L	<2
p,p'-DDT	µg/L	<2
Endosulfan Sulphate	µg/L	<2
Endrin Ketone	µg/L	<2
Methoxychlor	µg/L	<2
Surrogate 2-fluorophenol	%	62
Surrogate Phenol-d_6	%	43

SVOC's in water		
Our Reference		209318-1
Your Reference	UNITS	TRIP
Date Sampled		08/01/2019
Type of sample		Water
Surrogate Nitrobenzene-d_5	%	89
Surrogate 2-fluorobiphenyl	%	76
Surrogate 2,4,6-Tribromophenol	%	80
Surrogate *p*-Terphenyl-d_{14}	%	82

HM in water - dissolved		
Our Reference	UNITS	209318-1
Your Reference		TRIP
Date Sampled		08/01/2019
Type of sample		Water
Date prepared	-	14/01/2019
Date analysed	-	14/01/2019
Arsenic-Dissolved	µg/L	<1
Cadmium-Dissolved	µg/L	<0.1
Chromium-Dissolved	µg/L	<1
Copper-Dissolved	µg/L	<1
Lead-Dissolved	µg/L	<1
Mercury-Dissolved	µg/L	<0.05
Nickel-Dissolved	µg/L	1
Zinc-Dissolved	µg/L	3

Miscellaneous Inorganics		
Our Reference	UNITS	209318-1
Your Reference		TRIP
Date Sampled		08/01/2019
Type of sample		Water
Date prepared	-	14/01/2019
Date analysed	-	14/01/2019
Ammonia as N in water	mg/L	3.2

PFAS in Waters Short		
Our Reference		209318-1
Your Reference	UNITS	TRIP
Date Sampled		08/01/2019
Type of sample		Water
Date prepared	-	14/01/2019
Date analysed	-	14/01/2019
Perfluorohexanesulfonic acid - PFHxS	µg/L	<0.01
Perfluorooctanesulfonic acid PFOS	µg/L	<0.01
Perfluorooctanoic acid PFOA	µg/L	<0.01
6:2 FTS	µg/L	<0.01
8:2 FTS	µg/L	<0.01
Surrogate $^{13}C_8$ *PFOS*	%	104
Surrogate $^{13}C_2$ *PFOA*	%	88
Extracted ISTD $^{18}O_2$ *PFHxS*	%	101
Extracted ISTD $^{13}C_4$ *PFOS*	%	101
Extracted ISTD $^{13}C_4$ *PFOA*	%	84
Extracted ISTD $^{13}C_2$ *6:2FTS*	%	92
Extracted ISTD $^{13}C_2$ *8:2FTS*	%	103
Total Positive PFHxS & PFOS	µg/L	<0.01
Total Positive PFOA & PFOS	µg/L	<0.01
Total Positive PFAS	µg/L	<0.01

Method ID	Methodology Summary
Inorg-057	Ammonia - determined colourimetrically, based on APHA latest edition 4500-NH3 F. Soils are analysed following a KCl extraction.
Metals-021	Determination of Mercury by Cold Vapour AAS.
Metals-022	Determination of various metals by ICP-MS.
Org-003	Soil samples are extracted with Dichloromethane/Acetone and waters with Dichloromethane and analysed by GC-FID. F2 = (>C10-C16)-Naphthalene as per NEPM B1 Guideline on Investigation Levels for Soil and Groundwater (HSLs Tables 1A (3, 4)). Note Naphthalene is determined from the VOC analysis.
Org-012	Soil samples are extracted with Dichloromethane/Acetone and waters with Dichloromethane and analysed by GC-MS.
Org-013	Water samples are analysed directly by purge and trap GC-MS.
Org-016	Soil samples are extracted with methanol and spiked into water prior to analysing by purge and trap GC-MS. Water samples are analysed directly by purge and trap GC-MS. F1 = (C6-C10)-BTEX as per NEPM B1 Guideline on Investigation Levels for Soil and Groundwater.
Org-035	Soil samples are extracted with basified Methanol. Waters and soil extracts are directly injected and/or concentrated/extracted using SPE. Analysis is undertaken with LC-MS/MS. PFAS results include the sum of branched and linear isomers where applicable. Please note that PFAS results are corrected for Extracted Internal Standards (QSM 5.1 Table B-15 terminology), which are mass labelled analytes added prior to sample preparation to assess matrix effects and verify processing of the sample. PFAS analytes without a commercially available mass labelled analogue are corrected vs a closely eluting mass labelled PFAS compound. Surrogates are also reported, in this context they are mass labelled PFAS compounds added prior to extraction but are used as monitoring compounds only (not used for result correction). Envicarb (or similar) is used discretionally to remove interfering matrix components. Please contact the laboratory if estimates of Measurement Uncertainty are required as per WA DER.

QUALITY CONTROL: VOCs in water						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-W1	[NT]
Date extracted	-			14/01/2019	[NT]	[NT]	[NT]	[NT]	14/01/2019	[NT]
Date analysed	-			15/01/2019	[NT]	[NT]	[NT]	[NT]	15/01/2019	[NT]
Dichlorodifluoromethane	µg/L	10	Org-013	<10	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Chloromethane	µg/L	10	Org-013	<10	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Vinyl Chloride	µg/L	10	Org-013	<10	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Bromomethane	µg/L	10	Org-013	<10	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Chloroethane	µg/L	10	Org-013	<10	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Trichlorofluoromethane	µg/L	10	Org-013	<10	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
1,1-Dichloroethene	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Trans-1,2-dichloroethene	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
1,1-dichloroethane	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	105	[NT]
Cis-1,2-dichloroethene	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Bromochloromethane	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Chloroform	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	103	[NT]
2,2-dichloropropane	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
1,2-dichloroethane	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	102	[NT]
1,1,1-trichloroethane	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	106	[NT]
1,1-dichloropropene	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Cyclohexane	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Carbon tetrachloride	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Benzene	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Dibromomethane	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
1,2-dichloropropane	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Trichloroethene	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	96	[NT]
Bromodichloromethane	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	104	[NT]
trans-1,3-dichloropropene	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
cis-1,3-dichloropropene	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
1,1,2-trichloroethane	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Toluene	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
1,3-dichloropropane	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Dibromochloromethane	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	103	[NT]
1,2-dibromoethane	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Tetrachloroethene	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	101	[NT]
1,1,1,2-tetrachloroethane	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Chlorobenzene	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Ethylbenzene	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Bromoform	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
m+p-xylene	µg/L	2	Org-013	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Styrene	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
1,1,2,2-tetrachloroethane	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
o-xylene	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]

QUALITY CONTROL: VOCs in water					Duplicate				Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-W1	[NT]
1,2,3-trichloropropane	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Isopropylbenzene	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Bromobenzene	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
n-propyl benzene	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
2-chlorotoluene	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
4-chlorotoluene	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
1,3,5-trimethyl benzene	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Tert-butyl benzene	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
1,2,4-trimethyl benzene	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
1,3-dichlorobenzene	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Sec-butyl benzene	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
1,4-dichlorobenzene	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
4-isopropyl toluene	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
1,2-dichlorobenzene	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
n-butyl benzene	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
1,2-dibromo-3-chloropropane	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
1,2,4-trichlorobenzene	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Hexachlorobutadiene	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
1,2,3-trichlorobenzene	µg/L	1	Org-013	<1	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Surrogate Dibromofluoromethane	%		Org-013	103	[NT]	[NT]	[NT]	[NT]	98	[NT]
Surrogate toluene-d8	%		Org-013	101	[NT]	[NT]	[NT]	[NT]	100	[NT]
Surrogate 4-BFB	%		Org-013	101	[NT]	[NT]	[NT]	[NT]	103	[NT]

QUALITY CONTROL: vTRH in Water (C6-C9) NEPM						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-W1	[NT]
Date extracted	-			14/01/2019	[NT]	[NT]	[NT]	[NT]	14/01/2019	[NT]
Date analysed	-			15/01/2019	[NT]	[NT]	[NT]	[NT]	15/01/2019	[NT]
TRH C_6 - C_9	µg/L	10	Org-016	<10	[NT]	[NT]	[NT]	[NT]	103	[NT]
TRH C_6 - C_{10}	µg/L	10	Org-016	<10	[NT]	[NT]	[NT]	[NT]	103	[NT]
Surrogate Dibromofluoromethane	%		Org-016	103	[NT]	[NT]	[NT]	[NT]	98	[NT]
Surrogate toluene-d8	%		Org-016	101	[NT]	[NT]	[NT]	[NT]	100	[NT]
Surrogate 4-BFB	%		Org-016	101	[NT]	[NT]	[NT]	[NT]	103	[NT]

QUALITY CONTROL: svTRH (C10-C40) in Water						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-W2	[NT]
Date extracted	-			15/01/2019	[NT]	[NT]	[NT]	[NT]	15/01/2019	[NT]
Date analysed	-			16/01/2019	[NT]	[NT]	[NT]	[NT]	16/01/2019	[NT]
TRH C_{10} - C_{14}	µg/L	50	Org-003	<50	[NT]	[NT]	[NT]	[NT]	105	[NT]
TRH C_{15} - C_{28}	µg/L	100	Org-003	<100	[NT]	[NT]	[NT]	[NT]	85	[NT]
TRH C_{29} - C_{36}	µg/L	100	Org-003	<100	[NT]	[NT]	[NT]	[NT]	123	[NT]
TRH >C_{10} - C_{16}	µg/L	50	Org-003	<50	[NT]	[NT]	[NT]	[NT]	105	[NT]
TRH >C_{16} - C_{34}	µg/L	100	Org-003	<100	[NT]	[NT]	[NT]	[NT]	85	[NT]
TRH >C_{34} - C_{40}	µg/L	100	Org-003	<100	[NT]	[NT]	[NT]	[NT]	123	[NT]
Surrogate o-Terphenyl	%		Org-003	93	[NT]	[NT]	[NT]	[NT]	114	[NT]

QUALITY CONTROL: SVOC's in water						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-W1	[NT]
Date extracted	-			15/01/2019	[NT]	[NT]	[NT]	[NT]	15/01/2019	[NT]
Date analysed	-			15/01/2019	[NT]	[NT]	[NT]	[NT]	15/01/2019	[NT]
Phenol	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	42	[NT]
Bis (2-chloroethyl) ether	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
2-Chlorophenol	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	71	[NT]
1,3-Dichlorobenzene	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
1,4-Dichlorobenzene	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	54	[NT]
2-Methylphenol	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
1,2-Dichlorobenzene	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
bis-(2-Chloroisopropyl) ether	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
3/4-Methylphenol	µg/L	4	Org-012	<4	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
N-nitrosodi-n-propylamine	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Hexachloroethane	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Nitrobenzene	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Isophorone	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
2,4-Dimethylphenol	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
2-Nitrophenol	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
bis (2-Chloroethoxy) methane	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
2,4-Dichlorophenol	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
1,2,4-Trichlorobenzene	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Naphthalene	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
4-Chloroaniline	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
4-Chloro-3-methylphenol	µg/L	10	Org-012	<10	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Hexachlorobutadiene	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
2-Methylnaphthalene	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Hexachlorocyclopentadiene	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
2,4,6-Trichlorophenol	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
2,4,5-Trichlorophenol	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
2-Chloronaphthalene	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
2-Nitroaniline	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Dimethyl phthalate	µg/L	10	Org-012	<10	[NT]	[NT]	[NT]	[NT]	84	[NT]
2,6-Dinitrotoluene	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Acenaphthylene	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
3-Nitroaniline	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Acenaphthene	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	78	[NT]
2,4-Dinitrophenol	µg/L	20	Org-012	<20	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
4-Nitrophenol	µg/L	20	Org-012	<20	[NT]	[NT]	[NT]	[NT]	34	[NT]
Dibenzofuran	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Diethylphthalate	µg/L	10	Org-012	<10	[NT]	[NT]	[NT]	[NT]	93	[NT]
4-Chlorophenylphenylether	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
4-Nitroaniline	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]

QUALITY CONTROL: SVOC's in water					Duplicate				Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-W1	[NT]
Fluorene	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
2-methyl-4,6-dinitrophenol	µg/L	20	Org-012	<20	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Azobenzene	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
4-Bromophenylphenylether	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Hexachlorobenzene	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Pentachlorophenol	µg/L	10	Org-012	<10	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Phenanthrene	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Anthracene	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Carbazole	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Di-n-butylphthalate	µg/L	10	Org-012	<10	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Fluoranthene	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Pyrene	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	84	[NT]
Butylbenzylphthalate	µg/L	10	Org-012	<10	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Bis(2-ethylhexyl) phthalate	µg/L	10	Org-012	<10	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Benzo(a)anthracene	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Chrysene	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Di-n-octylphthalate	µg/L	10	Org-012	<10	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Benzo(b,j+k)fluoranthene	µg/L	4	Org-012	<4	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Benzo(a)pyrene	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Indeno(1,2,3-c,d)pyrene	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Dibenzo(a,h)anthracene	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Benzo(g,h,i)perylene	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Ethylmethanesulfonate	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Aniline	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Pentachloroethane	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Benzyl alcohol	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Acetophenone	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
N-nitrosomorpholine	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
N-nitrosopiperidine	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
2,6-Dichlorophenol	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Hexachloropropene-1	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
N-nitroso-n-butylamine	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Safrole	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
1,2,4,5-Tetrachlorobenzene	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Trans/Cis-iso-safrole	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
1,3-Dinitrobenzene	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Pentachlorobenzene	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
1-Naphthylamine	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
2,3,4,6-Tetrachlorophenol	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
2-Naphthylamine	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
5-Nitro-o-toluidine	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]

QUALITY CONTROL: SVOC's in water					Duplicate				Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-W1	[NT]
Diphenylamine	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Phenacetin	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Pentachloronitrobenzene	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Dinoseb	µg/L	10	Org-012	<10	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Methapyrilene	µg/L	10	Org-012	<10	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
p-Dimethylaminoazobenzene	µg/L	5	Org-012	<5	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
2-Acetylaminofluorene	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
7,12-Dimethylbenz(a)anthracene	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
3-Methylcholanthrene	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
a-BHC	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
b-BHC	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
g-BHC	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
d-BHC	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Heptachlor	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Aldrin	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	86	[NT]
Heptachlor Epoxide	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
g-Chlordane	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
a-Chlordane	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Endosulfan I	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
p,p'-DDE	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Dieldrin	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	108	[NT]
Endrin	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
p,p'-DDD	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Endosulfan II	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Endrin Aldehyde	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
p,p'-DDT	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Endosulfan Sulphate	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Endrin Ketone	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Methoxychlor	µg/L	2	Org-012	<2	[NT]	[NT]	[NT]	[NT]	[NT]	[NT]
Surrogate 2-fluorophenol	%		Org-012	52	[NT]	[NT]	[NT]	[NT]	52	[NT]
Surrogate Phenol-d_6	%		Org-012	35	[NT]	[NT]	[NT]	[NT]	35	[NT]
Surrogate Nitrobenzene-d_5	%		Org-012	86	[NT]	[NT]	[NT]	[NT]	81	[NT]
Surrogate 2-fluorobiphenyl	%		Org-012	69	[NT]	[NT]	[NT]	[NT]	65	[NT]
Surrogate 2,4,6-Tribromophenol	%		Org-012	74	[NT]	[NT]	[NT]	[NT]	75	[NT]
Surrogate *p*-Terphenyl-d_{14}	%		Org-012	94	[NT]	[NT]	[NT]	[NT]	85	[NT]

QUALITY CONTROL: HM in water - dissolved						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-W2	[NT]
Date prepared	-			14/01/2019	[NT]	[NT]	[NT]	[NT]	14/01/2019	[NT]
Date analysed	-			14/01/2019	[NT]	[NT]	[NT]	[NT]	14/01/2019	[NT]
Arsenic-Dissolved	µg/L	1	Metals-022	<1	[NT]	[NT]	[NT]	[NT]	94	[NT]
Cadmium-Dissolved	µg/L	0.1	Metals-022	<0.1	[NT]	[NT]	[NT]	[NT]	97	[NT]
Chromium-Dissolved	µg/L	1	Metals-022	<1	[NT]	[NT]	[NT]	[NT]	98	[NT]
Copper-Dissolved	µg/L	1	Metals-022	<1	[NT]	[NT]	[NT]	[NT]	94	[NT]
Lead-Dissolved	µg/L	1	Metals-022	<1	[NT]	[NT]	[NT]	[NT]	98	[NT]
Mercury-Dissolved	µg/L	0.05	Metals-021	<0.05	[NT]	[NT]	[NT]	[NT]	92	[NT]
Nickel-Dissolved	µg/L	1	Metals-022	<1	[NT]	[NT]	[NT]	[NT]	95	[NT]
Zinc-Dissolved	µg/L	1	Metals-022	<1	[NT]	[NT]	[NT]	[NT]	94	[NT]

QUALITY CONTROL: Miscellaneous Inorganics						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-W1	[NT]
Date prepared	-			14/01/2019	[NT]	[NT]	[NT]	[NT]	14/01/2019	[NT]
Date analysed	-			14/01/2019	[NT]	[NT]	[NT]	[NT]	14/01/2019	[NT]
Ammonia as N in water	mg/L	0.005	Inorg-057	<0.005	[NT]	[NT]	[NT]	[NT]	97	[NT]

QUALITY CONTROL: PFAS in Waters Short						Duplicate			Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-W1	[NT]
Date prepared	-			14/01/2019	[NT]	[NT]	[NT]	[NT]	14/01/2019	[NT]
Date analysed	-			14/01/2019	[NT]	[NT]	[NT]	[NT]	14/01/2019	[NT]
Perfluorohexanesulfonic acid - PFHxS	µg/L	0.01	Org-035	<0.01	[NT]	[NT]	[NT]	[NT]	113	[NT]
Perfluorooctanesulfonic acid PFOS	µg/L	0.01	Org-035	<0.01	[NT]	[NT]	[NT]	[NT]	111	[NT]
Perfluorooctanoic acid PFOA	µg/L	0.01	Org-035	<0.01	[NT]	[NT]	[NT]	[NT]	109	[NT]
6:2 FTS	µg/L	0.01	Org-035	<0.01	[NT]	[NT]	[NT]	[NT]	105	[NT]
8:2 FTS	µg/L	0.01	Org-035	<0.01	[NT]	[NT]	[NT]	[NT]	102	[NT]
Surrogate $^{13}C_8$ *PFOS*	%		Org-035	100	[NT]	[NT]	[NT]	[NT]	102	[NT]
Surrogate $^{13}C_2$ *PFOA*	%		Org-035	92	[NT]	[NT]	[NT]	[NT]	98	[NT]
Extracted ISTD $^{18}O_2$ *PFHxS*	%		Org-035	99	[NT]	[NT]	[NT]	[NT]	98	[NT]
Extracted ISTD $^{13}C_4$ *PFOS*	%		Org-035	97	[NT]	[NT]	[NT]	[NT]	98	[NT]
Extracted ISTD $^{13}C_4$ *PFOA*	%		Org-035	100	[NT]	[NT]	[NT]	[NT]	97	[NT]
Extracted ISTD $^{13}C_2$ *6:2FTS*	%		Org-035	82	[NT]	[NT]	[NT]	[NT]	87	[NT]
Extracted ISTD $^{13}C_2$ *8:2FTS*	%		Org-035	73	[NT]	[NT]	[NT]	[NT]	81	[NT]

Result Definitions

NT	Not tested
NA	Test not required
INS	Insufficient sample for this test
PQL	Practical Quantitation Limit
<	Less than
>	Greater than
RPD	Relative Percent Difference
LCS	Laboratory Control Sample
NS	Not specified
NEPM	National Environmental Protection Measure
NR	Not Reported

Quality Control Definitions

Blank	This is the component of the analytical signal which is not derived from the sample but from reagents, glassware etc, can be determined by processing solvents and reagents in exactly the same manner as for samples.
Duplicate	This is the complete duplicate analysis of a sample from the process batch. If possible, the sample selected should be one where the analyte concentration is easily measurable.
Matrix Spike	A portion of the sample is spiked with a known concentration of target analyte. The purpose of the matrix spike is to monitor the performance of the analytical method used and to determine whether matrix interferences exist.
LCS (Laboratory Control Sample)	This comprises either a standard reference material or a control matrix (such as a blank sand or water) fortified with analytes representative of the analyte class. It is simply a check sample.
Surrogate Spike	Surrogates are known additions to each sample, blank, matrix spike and LCS in a batch, of compounds which are similar to the analyte of interest, however are not expected to be found in real samples.

Australian Drinking Water Guidelines recommend that Thermotolerant Coliform, Faecal Enterococci, & E.Coli levels are less than 1cfu/100mL. The recommended maximums are taken from "Australian Drinking Water Guidelines", published by NHMRC & ARMC 2011.

Laboratory Acceptance Criteria

Duplicate sample and matrix spike recoveries may not be reported on smaller jobs, however, were analysed at a frequency to meet or exceed NEPM requirements. All samples are tested in batches of 20. The duplicate sample RPD and matrix spike recoveries for the batch were within the laboratory acceptance criteria.

Filters, swabs, wipes, tubes and badges will not have duplicate data as the whole sample is generally extracted during sample extraction.

Spikes for Physical and Aggregate Tests are not applicable.

For VOCs in water samples, three vials are required for duplicate or spike analysis.

Duplicates: >10xPQL - RPD acceptance criteria will vary depending on the analytes and the analytical techniques but is typically in the range 20%-50% – see ELN-P05 QA/QC tables for details; <10xPQL - RPD are higher as the results approach PQL and the estimated measurement uncertainty will statistically increase.

Matrix Spikes, LCS and Surrogate recoveries: Generally 70-130% for inorganics/metals; 60-140% for organics (+/-50% surrogates) and 10-140% for labile SVOCs (including labile surrogates), ultra trace organics and speciated phenols is acceptable.

In circumstances where no duplicate and/or sample spike has been reported at 1 in 10 and/or 1 in 20 samples respectively, the sample volume submitted was insufficient in order to satisfy laboratory QA/QC protocols.

When samples are received where certain analytes are outside of recommended technical holding times (THTs), the analysis has proceeded. Where analytes are on the verge of breaching THTs, every effort will be made to analyse within the THT or as soon as practicable.

Where sampling dates are not provided, Envirolab are not in a position to comment on the validity of the analysis where recommended technical holding times may have been breached.

Measurement Uncertainty estimates are available for most tests upon request.

16/1/19

CHAIN OF CUSTODY

ALS Laboratory: please tick →

ADELAIDE 21 Burma Road Pooraka SA 5095 Ph: 08 8359 0390 E: adelaide@alsglobal.com
BRISBANE 32 Shand Street Stafford QLD 4053 Ph: 07 3243 7222 E: samples.brisbane@alsglobal.com
GLADSTONE 46 Callemondah Drive Clinton QLD 4680 Ph: 07 7471 5200 E: gladstone@alsglobal.com
MACKAY 78 Harbour Road Mackay QLD 4740 Ph: 07 4944 0177 E: mackay@alsglobal.com
MELBOURNE 24 Westall Road Springvale VIC 3171 Ph: 03 8549 9600 E: samples.melbourne@alsglobal.com
MUDGEE 27 Sydney Road Mudgee NSW 2850 Ph: 02 6372 5735 E: mudgee.mail@alsglobal.com
NEWCASTLE 5/585 Maitland Rd Mayfield West NSW 2304 Ph: 02 4014 2500 E: samples.newcastle@alsglobal.com
NOWRA 4/13 Geary Place North Nowra NSW 2541 Ph: 02 4423 2063 E: enviro@alsglobal.com
PERTH 10 Hod Way Malaga WA 6090 Ph: 08 9209 7655 E: samples.perth@alsglobal.com
SYDNEY 277-289 Woodpark Road Smithfield NSW 2164 Ph: 02 8784 8555 E: samples.sydney@alsglobal.com
TOWNSVILLE 14-15 Desma Court Bohle QLD 4818 Ph: 07 4796 0600 E: townsville.environmental@alsglobal.com
WOLLONGONG 99 Kenny Street Wollongong NSW 2500 Ph: 02 4225 3125 E: portkembla@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	TURNAROUND REQUIREMENTS : (Standard TAT may be longer for some tests e.g. Ultra Trace Organics)	☒ Standard TAT (List due date):	FOR LABORATORY USE ONLY (Circle)
OFFICE:		☐ Non Standard or urgent TAT (List due date):	Custody Seal Intact? Yes / No / N/A
PROJECT: King St North Carpark	ALS QUOTE NO.:	COC SEQUENCE NUMBER (Circle)	Free ice / frozen ice bricks present upon receipt? Yes / No / N/A
ORDER NUMBER: 10026439.1		COC: 1 2 3 4 5 6 7	Random Sample Temperature on Receipt: 6.8 °C
PROJECT MANAGER: Dean Stafford	CONTACT PH: 0434 657 155	OF: 1 2 3 4 5 6 7	Other comment: Rec'd

SAMPLER: Tom Keatley	SAMPLER MOBILE: 0429 948 897	RELINQUISHED BY:	RECEIVED BY:	RELINQUISHED BY:
COC emailed to ALS? (YES / NO)	EDD FORMAT (or default):	Caitlain Regena		
Email Reports to (will default to PM if no other addresses are listed):		DATE/TIME:	DATE/TIME:	DATE/TIME:
Email Invoice to (will default to PM if no other addresses are listed):		10/01/18		

RECEIVED BY:
mc
DATE/TIME: 10/1/19 11:00am

May ex 11/1/19 1358

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)			CONTAINER INFORMATION		ANALYSIS REQUIRED Including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).							Additional Information
LAB ID	SAMPLE ID	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	TOTAL CONTAINERS	W-23 (VOC and SVOC)	TRH	8 Metals	Ammonia	PFAS (Standard)	BTEX	VOCs	
1	MW01	08-01-18	W			x	x	x	x	x			Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
2	MW02	08-01-18	W			x	x	x	x	x			
3	MW03	08-01-18	W			x	x	x	x	x			
4	MW04	08-01-18	W			x	x	x	x	x			
5	MW05	08-01-18	W			x	x	x	x	x			
6	MW06	08-01-18	W			x	x	x	x	x			
7	MW07	08-01-18	W			x	x	x	x	x			
8	DUP	08-01-18	W			x	x	x	x	x			
—	TRIP (1)	08-01-18	W			x	x	x	x	x			Please send to Envirolab.
9	EB	10-01-18	W								x	x	

ENVIROLAB Services 12 Ashley St Chatswood NSW 2067 Ph: (02) 9910 6200
Job No: 209318
Date Received: 11/1/2019
Time Received: 13:58
Received by:
Temp: Cool/Ambient
Cooling: Ice/Icepack 16.2
Security: Intact/Broken/None

Environmental Division Sydney
Work Order Reference
ES1900690

Telephone : +61-2-8784 8555

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass;
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

ALS Environmental

CERTIFICATE OF ANALYSIS

Work Order	: **ES1900690**	Page	: 1 of 22
Client	: **ARCADIS AUSTRALIA PACIFIC PTY LTD**	Laboratory	: Environmental Division Sydney
Contact	: MR DEAN STAFFORD	Contact	: Larissa Burns
Address	: L16, 480 GEORGE STREET SYDNEY NSW 2000	Address	: 277-289 Woodpark Road Smithfield NSW Australia 2164
Telephone	: 02 9690 2555	Telephone	: +6138549 9644
Project	: King St North Carpark	Date Samples Received	: 10-Jan-2019 11:00
Order number	: 10026439.1	Date Analysis Commenced	: 10-Jan-2019
C-O-C number	: ----	Issue Date	: 16-Jan-2019 20:15
Sampler	: TOM KEATLEY		
Site	: ----		
Quote number	: EN-091-18 (Primary Work Only)		
No. of samples received	: 9		
No. of samples analysed	: 9		

Accreditation No. 825
Accredited for compliance with
ISO/IEC 17025 - Testing

This report supersedes any previous report(s) with this reference. Results apply to the sample(s) as submitted. This document shall not be reproduced, except in full.

This Certificate of Analysis contains the following information:

- General Comments
- Analytical Results
- Surrogate Control Limits

Additional information pertinent to this report will be found in the following separate attachments: Quality Control Report, QA/QC Compliance Assessment to assist with Quality Review and Sample Receipt Notification.

Signatories

This document has been electronically signed by the authorized signatories below. Electronic signing is carried out in compliance with procedures specified in 21 CFR Part 11.

Signatories	*Position*	*Accreditation Category*
Alex Rossi	Organic Chemist	Sydney Organics, Smithfield, NSW
Ankit Joshi	Inorganic Chemist	Sydney Inorganics, Smithfield, NSW
Celine Conceicao	Senior Spectroscopist	Sydney Inorganics, Smithfield, NSW
Edwandy Fadjar	Organic Coordinator	Sydney Organics, Smithfield, NSW

General Comments

The analytical procedures used by the Environmental Division have been developed from established internationally recognized procedures such as those published by the USEPA, APHA, AS and NEPM. In house developed procedures are employed in the absence of documented standards or by client request.

Where moisture determination has been performed, results are reported on a dry weight basis.

Where a reported less than (<) result is higher than the LOR, this may be due to primary sample extract/digestate dilution and/or insufficient sample for analysis.

Where the LOR of a reported result differs from standard LOR, this may be due to high moisture content, insufficient sample (reduced weight employed) or matrix interference.

When sampling time information is not provided by the client, sampling dates are shown without a time component. In these instances, the time component has been assumed by the laboratory for processing purposes.

Where a result is required to meet compliance limits the associated uncertainty must be considered. Refer to the ALS Contact for details.

Key : CAS Number = CAS registry number from database maintained by Chemical Abstracts Services. The Chemical Abstracts Service is a division of the American Chemical Society.
LOR = Limit of reporting
^ = This result is computed from individual analyte detections at or above the level of reporting
ø = ALS is not NATA accredited for these tests.
~ = Indicates an estimated value.

- EP080: Positive results for sample ES1900690_003 had been confirmed by re-analysis.
- EP075: 'Sum of PAH' is the sum of the USEPA 16 priority PAHs
- Benzo(a)pyrene Toxicity Equivalent Quotient (TEQ) is the sum total of the concentration of the eight carcinogenic PAHs multiplied by their Toxicity Equivalence Factor (TEF) relative to Benzo(a)pyrene. TEF values are provided in brackets as follows: Benz(a)anthracene (0.1), Chrysene (0.01), Benzo(b+j) & Benzo(k)fluoranthene (0.1), Benzo(a)pyrene (1.0), Indeno(1.2.3.cd)pyrene (0.1), Dibenz(a.h)anthracene (1.0), Benzo(g.h.i)perylene (0.01). Less than LOR results for 'TEQ Zero' are treated as zero.

Analytical Results

Sub-Matrix: WATER (Matrix: WATER)				Client sample ID	MW01	MW02	MW03	MW04	MW05
				Client sampling date / time	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00
Compound	CAS Number	LOR	Unit		ES1900690-001	ES1900690-002	ES1900690-003	ES1900690-004	ES1900690-005
					Result	Result	Result	Result	Result
EG020F: Dissolved Metals by ICP-MS									
Arsenic	7440-38-2	0.001	mg/L		<0.001	**0.027**	**0.001**	**0.008**	**0.004**
Cadmium	7440-43-9	0.0001	mg/L		<0.0001	<0.0001	<0.0001	<0.0001	**0.0007**
Chromium	7440-47-3	0.001	mg/L		<0.001	<0.001	<0.001	<0.001	<0.001
Copper	7440-50-8	0.001	mg/L		<0.001	<0.001	<0.001	<0.001	**0.001**
Nickel	7440-02-0	0.001	mg/L		**0.005**	**0.002**	**0.002**	**0.001**	**0.002**
Lead	7439-92-1	0.001	mg/L		<0.001	<0.001	<0.001	<0.001	**0.001**
Zinc	7440-66-6	0.005	mg/L		**1.18**	**0.020**	<0.005	**0.023**	**1.55**
EG035F: Dissolved Mercury by FIMS									
Mercury	7439-97-6	0.0001	mg/L		<0.0001	<0.0001	<0.0001	<0.0001	<0.0001
EK055G: Ammonia as N by Discrete Analyser									
Ammonia as N	7664-41-7	0.01	mg/L		**0.01**	**0.43**	**3.27**	**0.95**	**0.25**
EP074A: Monocyclic Aromatic Hydrocarbons									
Benzene	71-43-2	1	µg/L		<1	<1	<1	<1	<1
Toluene	108-88-3	2	µg/L		<2	<2	<2	<2	<2
Ethylbenzene	100-41-4	2	µg/L		<2	<2	<2	<2	<2
meta- & para-Xylene	108-38-3 106-42-3	2	µg/L		<2	<2	<2	<2	<2
Styrene	100-42-5	5	µg/L		<5	<5	<5	<5	<5
ortho-Xylene	95-47-6	2	µg/L		<2	<2	<2	<2	<2
Isopropylbenzene	98-82-8	5	µg/L		<5	<5	<5	<5	<5
n-Propylbenzene	103-65-1	5	µg/L		<5	<5	<5	<5	<5
1.3.5-Trimethylbenzene	108-67-8	5	µg/L		<5	<5	<5	<5	<5
sec-Butylbenzene	135-98-8	5	µg/L		<5	<5	<5	<5	<5
1.2.4-Trimethylbenzene	95-63-6	5	µg/L		<5	<5	<5	<5	<5
tert-Butylbenzene	98-06-6	5	µg/L		<5	<5	<5	<5	<5
p-Isopropyltoluene	99-87-6	5	µg/L		<5	<5	<5	<5	<5
n-Butylbenzene	104-51-8	5	µg/L		<5	<5	<5	<5	<5
EP074B: Oxygenated Compounds									
Vinyl Acetate	108-05-4	50	µg/L		<50	<50	<50	<50	<50
2-Butanone (MEK)	78-93-3	50	µg/L		<50	<50	<50	<50	<50
4-Methyl-2-pentanone (MIBK)	108-10-1	50	µg/L		<50	<50	<50	<50	<50
2-Hexanone (MBK)	591-78-6	50	µg/L		<50	<50	<50	<50	<50
EP074C: Sulfonated Compounds									
Carbon disulfide	75-15-0	5	µg/L		<5	<5	<5	<5	<5
EP074D: Fumigants									

Analytical Results

Sub-Matrix: WATER (Matrix: WATER)				Client sample ID	MW01	MW02	MW03	MW04	MW05
				Client sampling date / time	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00
Compound	CAS Number	LOR	Unit		ES1900690-001	ES1900690-002	ES1900690-003	ES1900690-004	ES1900690-005
					Result	Result	Result	Result	Result
EP074D: Fumigants - Continued									
2.2-Dichloropropane	594-20-7	5	µg/L		<5	<5	<5	<5	<5
1.2-Dichloropropane	78-87-5	5	µg/L		<5	<5	<5	<5	<5
cis-1.3-Dichloropropylene	10061-01-5	5	µg/L		<5	<5	<5	<5	<5
trans-1.3-Dichloropropylene	10061-02-6	5	µg/L		<5	<5	<5	<5	<5
1.2-Dibromoethane (EDB)	106-93-4	5	µg/L		<5	<5	<5	<5	<5
EP074E: Halogenated Aliphatic Compounds									
Dichlorodifluoromethane	75-71-8	50	µg/L		<50	<50	<50	<50	<50
Chloromethane	74-87-3	50	µg/L		<50	<50	<50	<50	<50
Vinyl chloride	75-01-4	50	µg/L		<50	<50	<50	<50	<50
Bromomethane	74-83-9	50	µg/L		<50	<50	<50	<50	<50
Chloroethane	75-00-3	50	µg/L		<50	<50	<50	<50	<50
Trichlorofluoromethane	75-69-4	50	µg/L		<50	<50	<50	<50	<50
1.1-Dichloroethene	75-35-4	5	µg/L		<5	<5	<5	<5	<5
Iodomethane	74-88-4	5	µg/L		<5	<5	<5	<5	<5
trans-1.2-Dichloroethene	156-60-5	5	µg/L		<5	<5	<5	<5	<5
1.1-Dichloroethane	75-34-3	5	µg/L		<5	<5	<5	<5	<5
cis-1.2-Dichloroethene	156-59-2	5	µg/L		<5	<5	18	<5	<5
1.1.1-Trichloroethane	71-55-6	5	µg/L		<5	<5	<5	<5	<5
1.1-Dichloropropylene	563-58-6	5	µg/L		<5	<5	<5	<5	<5
Carbon Tetrachloride	56-23-5	5	µg/L		<5	<5	<5	<5	<5
1.2-Dichloroethane	107-06-2	5	µg/L		<5	<5	<5	<5	<5
Trichloroethene	79-01-6	5	µg/L		<5	<5	<5	<5	<5
Dibromomethane	74-95-3	5	µg/L		<5	<5	<5	<5	<5
1.1.2-Trichloroethane	79-00-5	5	µg/L		<5	<5	<5	<5	<5
1.3-Dichloropropane	142-28-9	5	µg/L		<5	<5	<5	<5	<5
Tetrachloroethene	127-18-4	5	µg/L		<5	<5	<5	<5	<5
1.1.1.2-Tetrachloroethane	630-20-6	5	µg/L		<5	<5	<5	<5	<5
trans-1.4-Dichloro-2-butene	110-57-6	5	µg/L		<5	<5	<5	<5	<5
cis-1.4-Dichloro-2-butene	1476-11-5	5	µg/L		<5	<5	<5	<5	<5
1.1.2.2-Tetrachloroethane	79-34-5	5	µg/L		<5	<5	<5	<5	<5
1.2.3-Trichloropropane	96-18-4	5	µg/L		<5	<5	<5	<5	<5
Pentachloroethane	76-01-7	5	µg/L		<5	<5	<5	<5	<5
1.2-Dibromo-3-chloropropane	96-12-8	5	µg/L		<5	<5	<5	<5	<5
EP074F: Halogenated Aromatic Compounds									

Analytical Results

Sub-Matrix: WATER (Matrix: WATER)				Client sample ID	MW01	MW02	MW03	MW04	MW05
				Client sampling date / time	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00
Compound	CAS Number	LOR	Unit		ES1900690-001	ES1900690-002	ES1900690-003	ES1900690-004	ES1900690-005
					Result	Result	Result	Result	Result
EP074F: Halogenated Aromatic Compounds - Continued									
Chlorobenzene	108-90-7	5	µg/L		<5	<5	<5	<5	<5
Bromobenzene	108-86-1	5	µg/L		<5	<5	<5	<5	<5
2-Chlorotoluene	95-49-8	5	µg/L		<5	<5	<5	<5	<5
4-Chlorotoluene	106-43-4	5	µg/L		<5	<5	<5	<5	<5
1.2.3-Trichlorobenzene	87-61-6	5	µg/L		<5	<5	<5	<5	<5
EP074G: Trihalomethanes									
Chloroform	67-66-3	5	µg/L		<5	<5	<5	<5	<5
Bromodichloromethane	75-27-4	5	µg/L		<5	<5	<5	<5	<5
Dibromochloromethane	124-48-1	5	µg/L		<5	<5	<5	<5	<5
Bromoform	75-25-2	5	µg/L		<5	<5	<5	<5	<5
EP075A: Phenolic Compounds									
Phenol	108-95-2	2	µg/L		<2	<2	<2	<2	<2
2-Chlorophenol	95-57-8	2	µg/L		<2	<2	<2	<2	<2
2-Methylphenol	95-48-7	2	µg/L		<2	<2	<2	<2	<2
3- & 4-Methylphenol	1319-77-3	4	µg/L		<4	<4	<4	<4	<4
2-Nitrophenol	88-75-5	2	µg/L		<2	<2	<2	<2	<2
2.4-Dimethylphenol	105-67-9	2	µg/L		<2	<2	<2	<2	<2
2.4-Dichlorophenol	120-83-2	2	µg/L		<2	<2	<2	<2	<2
2.6-Dichlorophenol	87-65-0	2	µg/L		<2	<2	<2	<2	<2
4-Chloro-3-methylphenol	59-50-7	2	µg/L		<2	<2	<2	<2	<2
2.4.6-Trichlorophenol	88-06-2	2	µg/L		<2	<2	<2	<2	<2
2.4.5-Trichlorophenol	95-95-4	2	µg/L		<2	<2	<2	<2	<2
Pentachlorophenol	87-86-5	4	µg/L		<4	<4	<4	<4	<4
EP075B: Polynuclear Aromatic Hydrocarbons									
Naphthalene	91-20-3	2	µg/L		<2	<2	<2	<2	<2
2-Methylnaphthalene	91-57-6	2	µg/L		<2	<2	<2	<2	<2
2-Chloronaphthalene	91-58-7	2	µg/L		<2	<2	<2	<2	<2
Acenaphthylene	208-96-8	2	µg/L		<2	<2	<2	<2	<2
Acenaphthene	83-32-9	2	µg/L		<2	<2	<2	<2	<2
Fluorene	86-73-7	2	µg/L		<2	<2	<2	<2	<2
Phenanthrene	85-01-8	2	µg/L		<2	<2	<2	<2	<2
Anthracene	120-12-7	2	µg/L		<2	<2	<2	<2	<2
Fluoranthene	206-44-0	2	µg/L		<2	<2	<2	<2	<2
Pyrene	129-00-0	2	µg/L		<2	<2	<2	<2	<2

Analytical Results

Sub-Matrix: WATER (Matrix: WATER)				Client sample ID	MW01	MW02	MW03	MW04	MW05
				Client sampling date / time	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00
Compound	CAS Number	LOR	Unit		ES1900690-001	ES1900690-002	ES1900690-003	ES1900690-004	ES1900690-005
					Result	Result	Result	Result	Result
EP075B: Polynuclear Aromatic Hydrocarbons - Continued									
N-2-Fluorenyl Acetamide	53-96-3	2	µg/L		<2	<2	<2	<2	<2
Benz(a)anthracene	56-55-3	2	µg/L		<2	<2	<2	<2	<2
Chrysene	218-01-9	2	µg/L		<2	<2	<2	<2	<2
Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	4	µg/L		<4	<4	<4	<4	<4
7.12-Dimethylbenz(a)anthracene	57-97-6	2	µg/L		<2	<2	<2	<2	<2
Benzo(a)pyrene	50-32-8	2	µg/L		<2	<2	<2	<2	<2
3-Methylcholanthrene	56-49-5	2	µg/L		<2	<2	<2	<2	<2
Indeno(1.2.3.cd)pyrene	193-39-5	2	µg/L		<2	<2	<2	<2	<2
Dibenz(a.h)anthracene	53-70-3	2	µg/L		<2	<2	<2	<2	<2
Benzo(g.h.i)perylene	191-24-2	2	µg/L		<2	<2	<2	<2	<2
^ Sum of PAHs	----	2	µg/L		<2	<2	<2	<2	<2
^ Benzo(a)pyrene TEQ (zero)	----	2	µg/L		<2	<2	<2	<2	<2
EP075C: Phthalate Esters									
Dimethyl phthalate	131-11-3	2	µg/L		<2	<2	<2	<2	<2
Diethyl phthalate	84-66-2	2	µg/L		<2	<2	<2	<2	<2
Di-n-butyl phthalate	84-74-2	2	µg/L		<2	<2	<2	<2	<2
Butyl benzyl phthalate	85-68-7	2	µg/L		<2	<2	<2	<2	<2
bis(2-ethylhexyl) phthalate	117-81-7	10	µg/L		<10	<10	<10	<10	<10
Di-n-octylphthalate	117-84-0	2	µg/L		<2	<2	<2	<2	<2
EP075D: Nitrosamines									
N-Nitrosomethylethylamine	10595-95-6	2	µg/L		<2	<2	<2	<2	<2
N-Nitrosodiethylamine	55-18-5	2	µg/L		<2	<2	<2	<2	<2
N-Nitrosopyrrolidine	930-55-2	4	µg/L		<4	<4	<4	<4	<4
N-Nitrosomorpholine	59-89-2	2	µg/L		<2	<2	<2	<2	<2
N-Nitrosodi-n-propylamine	621-64-7	2	µg/L		<2	<2	<2	<2	<2
N-Nitrosopiperidine	100-75-4	2	µg/L		<2	<2	<2	<2	<2
N-Nitrosodibutylamine	924-16-3	2	µg/L		<2	<2	<2	<2	<2
N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	4	µg/L		<4	<4	<4	<4	<4
Methapyrilene	91-80-5	2	µg/L		<2	<2	<2	<2	<2
EP075E: Nitroaromatics and Ketones									
2-Picoline	109-06-8	2	µg/L		<2	<2	<2	<2	<2
Acetophenone	98-86-2	2	µg/L		<2	<2	<2	<2	<2
Nitrobenzene	98-95-3	2	µg/L		<2	<2	<2	<2	<2

Analytical Results

Sub-Matrix: WATER (Matrix: WATER)				Client sample ID	MW01	MW02	MW03	MW04	MW05
				Client sampling date / time	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00
Compound	CAS Number	LOR	Unit		ES1900690-001	ES1900690-002	ES1900690-003	ES1900690-004	ES1900690-005
					Result	Result	Result	Result	Result
EP075E: Nitroaromatics and Ketones - Continued									
Isophorone	78-59-1	2	µg/L		<2	<2	<2	<2	<2
2.6-Dinitrotoluene	606-20-2	4	µg/L		<4	<4	<4	<4	<4
2.4-Dinitrotoluene	121-14-2	4	µg/L		<4	<4	<4	<4	<4
1-Naphthylamine	134-32-7	2	µg/L		<2	<2	<2	<2	<2
4-Nitroquinoline-N-oxide	56-57-5	2	µg/L		<2	<2	<2	<2	<2
5-Nitro-o-toluidine	99-55-8	2	µg/L		<2	<2	<2	<2	<2
Azobenzene	103-33-3	2	µg/L		<2	<2	<2	<2	<2
1.3.5-Trinitrobenzene	99-35-4	2	µg/L		<2	<2	<2	<2	<2
Phenacetin	62-44-2	2	µg/L		<2	<2	<2	<2	<2
4-Aminobiphenyl	92-67-1	2	µg/L		<2	<2	<2	<2	<2
Pentachloronitrobenzene	82-68-8	2	µg/L		<2	<2	<2	<2	<2
Pronamide	23950-58-5	2	µg/L		<2	<2	<2	<2	<2
Dimethylaminoazobenzene	60-11-7	2	µg/L		<2	<2	<2	<2	<2
Chlorobenzilate	510-15-6	2	µg/L		<2	<2	<2	<2	<2
EP075F: Haloethers									
Bis(2-chloroethyl) ether	111-44-4	2	µg/L		<2	<2	<2	<2	<2
Bis(2-chloroethoxy) methane	111-91-1	2	µg/L		<2	<2	<2	<2	<2
4-Chlorophenyl phenyl ether	7005-72-3	2	µg/L		<2	<2	<2	<2	<2
4-Bromophenyl phenyl ether	101-55-3	2	µg/L		<2	<2	<2	<2	<2
EP075G: Chlorinated Hydrocarbons									
1.3-Dichlorobenzene	541-73-1	2	µg/L		<2	<2	<2	<2	<2
1.4-Dichlorobenzene	106-46-7	2	µg/L		<2	<2	<2	<2	<2
1.2-Dichlorobenzene	95-50-1	2	µg/L		<2	<2	<2	<2	<2
Hexachloroethane	67-72-1	2	µg/L		<2	<2	<2	<2	<2
1.2.4-Trichlorobenzene	120-82-1	2	µg/L		<2	<2	<2	<2	<2
Hexachloropropylene	1888-71-7	2	µg/L		<2	<2	<2	<2	<2
Hexachlorobutadiene	87-68-3	2	µg/L		<2	<2	<2	<2	<2
Hexachlorocyclopentadiene	77-47-4	10	µg/L		<10	<10	<10	<10	<10
Pentachlorobenzene	608-93-5	2	µg/L		<2	<2	<2	<2	<2
Hexachlorobenzene (HCB)	118-74-1	4	µg/L		<4	<4	<4	<4	<4
EP075H: Anilines and Benzidines									
Aniline	62-53-3	2	µg/L		<2	<2	<2	<2	<2
4-Chloroaniline	106-47-8	2	µg/L		<2	<2	<2	<2	<2
2-Nitroaniline	88-74-4	4	µg/L		<4	<4	<4	<4	<4

Analytical Results

Sub-Matrix: WATER (Matrix: WATER)				Client sample ID	MW01	MW02	MW03	MW04	MW05
				Client sampling date / time	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00
Compound	CAS Number	LOR	Unit		ES1900690-001	ES1900690-002	ES1900690-003	ES1900690-004	ES1900690-005
					Result	Result	Result	Result	Result
EP075H: Anilines and Benzidines - Continued									
3-Nitroaniline	99-09-2	4	µg/L		<4	<4	<4	<4	<4
Dibenzofuran	132-64-9	2	µg/L		<2	<2	<2	<2	<2
4-Nitroaniline	100-01-8	2	µg/L		<2	<2	<2	<2	<2
Carbazole	86-74-8	2	µg/L		<2	<2	<2	<2	<2
3.3`-Dichlorobenzidine	91-94-1	2	µg/L		<2	<2	<2	<2	<2
EP075I: Organochlorine Pesticides									
alpha-BHC	319-84-6	2	µg/L		<2	<2	<2	<2	<2
beta-BHC	319-85-7	2	µg/L		<2	<2	<2	<2	<2
gamma-BHC	58-89-9	2	µg/L		<2	<2	<2	<2	<2
delta-BHC	319-86-8	2	µg/L		<2	<2	<2	<2	<2
Heptachlor	76-44-8	2	µg/L		<2	<2	<2	<2	<2
Aldrin	309-00-2	2	µg/L		<2	<2	<2	<2	<2
Heptachlor epoxide	1024-57-3	2	µg/L		<2	<2	<2	<2	<2
alpha-Endosulfan	959-98-8	2	µg/L		<2	<2	<2	<2	<2
4.4`-DDE	72-55-9	2	µg/L		<2	<2	<2	<2	<2
Dieldrin	60-57-1	2	µg/L		<2	<2	<2	<2	<2
Endrin	72-20-8	2	µg/L		<2	<2	<2	<2	<2
beta-Endosulfan	33213-65-9	2	µg/L		<2	<2	<2	<2	<2
4.4`-DDD	72-54-8	2	µg/L		<2	<2	<2	<2	<2
Endosulfan sulfate	1031-07-8	2	µg/L		<2	<2	<2	<2	<2
4.4`-DDT	50-29-3	4	µg/L		<4	<4	<4	<4	<4
^ Sum of Aldrin + Dieldrin	309-00-2/60-57-1	4	µg/L		<4	<4	<4	<4	<4
^ Sum of DDD + DDE + DDT	72-54-8/72-55-9/50-2	4	µg/L		<4	<4	<4	<4	<4
EP075J: Organophosphorus Pesticides									
Dichlorvos	62-73-7	2	µg/L		<2	<2	<2	<2	<2
Dimethoate	60-51-5	2	µg/L		<2	<2	<2	<2	<2
Diazinon	333-41-5	2	µg/L		<2	<2	<2	<2	<2
Chlorpyrifos-methyl	5598-13-0	2	µg/L		<2	<2	<2	<2	<2
Malathion	121-75-5	2	µg/L		<2	<2	<2	<2	<2
Fenthion	55-38-9	2	µg/L		<2	<2	<2	<2	<2
Chlorpyrifos	2921-88-2	2	µg/L		<2	<2	<2	<2	<2
Pirimphos-ethyl	23505-41-1	2	µg/L		<2	<2	<2	<2	<2
Chlorfenvinphos	470-90-6	2	µg/L		<2	<2	<2	<2	<2
Prothiofos	34643-46-4	2	µg/L		<2	<2	<2	<2	<2

Analytical Results

Sub-Matrix: WATER (Matrix: WATER)				Client sample ID	MW01	MW02	MW03	MW04	MW05
				Client sampling date / time	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00
Compound	CAS Number	LOR	Unit		ES1900690-001	ES1900690-002	ES1900690-003	ES1900690-004	ES1900690-005
					Result	Result	Result	Result	Result
EP075J: Organophosphorus Pesticides - Continued									
Ethion	563-12-2	2	µg/L		<2	<2	<2	<2	<2
EP080/071: Total Petroleum Hydrocarbons									
C6 - C9 Fraction	----	20	µg/L		<20	<20	<20	<20	<20
C10 - C14 Fraction	----	50	µg/L		<50	<50	<50	<50	<50
C15 - C28 Fraction	----	100	µg/L		<100	<100	<100	<100	<100
C29 - C36 Fraction	----	50	µg/L		<50	<50	<50	<50	<50
^ **C10 - C36 Fraction (sum)**	----	50	µg/L		<50	<50	<50	<50	<50
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions									
C6 - C10 Fraction	C6_C10	20	µg/L		<20	<20	<20	<20	<20
^ **C6 - C10 Fraction minus BTEX (F1)**	C6_C10-BTEX	20	µg/L		<20	<20	<20	<20	<20
>C10 - C16 Fraction	----	100	µg/L		<100	<100	<100	<100	<100
>C16 - C34 Fraction	----	100	µg/L		<100	<100	<100	<100	<100
>C34 - C40 Fraction	----	100	µg/L		<100	<100	<100	<100	<100
^ **>C10 - C40 Fraction (sum)**	----	100	µg/L		<100	<100	<100	<100	<100
^ **>C10 - C16 Fraction minus Naphthalene (F2)**	----	100	µg/L		<100	<100	<100	<100	<100
EP080: BTEXN									
^ **Total Xylenes**	----	2	µg/L		<2	<2	<2	<2	<2
^ **Sum of BTEX**	----	1	µg/L		<1	<1	<1	<1	<1
Naphthalene	91-20-3	5	µg/L		<5	<5	<5	<5	<5
EP231A: Perfluoroalkyl Sulfonic Acids									
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L		<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L		<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.02	µg/L		<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L		<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L		**0.03**	**0.03**	<0.01	**0.02**	<0.01
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L		<0.02	<0.02	<0.02	<0.02	<0.02
EP231B: Perfluoroalkyl Carboxylic Acids									

Analytical Results

Sub-Matrix: WATER (Matrix: WATER)				Client sample ID	MW01	MW02	MW03	MW04	MW05
				Client sampling date / time	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00
Compound	CAS Number	LOR	Unit		ES1900690-001	ES1900690-002	ES1900690-003	ES1900690-004	ES1900690-005
					Result	Result	Result	Result	Result
EP231B: Perfluoroalkyl Carboxylic Acids - Continued									
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L		<0.1	<0.1	<0.1	<0.1	<0.1
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L		<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L		<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L		<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L		<0.01	<0.01	<0.01	<0.01	<0.01
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L		<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L		<0.02	<0.02	<0.02	<0.02	<0.02
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L		<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L		<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L		<0.02	<0.02	<0.02	<0.02	<0.02
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L		<0.05	<0.05	<0.05	<0.05	<0.05
EP231C: Perfluoroalkyl Sulfonamides									
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L		<0.02	<0.02	<0.02	<0.02	<0.02
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L		<0.05	<0.05	<0.05	<0.05	<0.05
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L		<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L		<0.05	<0.05	<0.05	<0.05	<0.05
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L		<0.05	<0.05	<0.05	<0.05	<0.05
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L		<0.02	<0.02	<0.02	<0.02	<0.02
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L		<0.02	<0.02	<0.02	<0.02	<0.02
EP231D: (n:2) Fluorotelomer Sulfonic Acids									
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L		<0.05	<0.05	<0.05	<0.05	<0.05

Analytical Results

Sub-Matrix: WATER (Matrix: WATER)				Client sample ID	MW01	MW02	MW03	MW04	MW05
				Client sampling date / time	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00
Compound	CAS Number	LOR	Unit		ES1900690-001	ES1900690-002	ES1900690-003	ES1900690-004	ES1900690-005
					Result	Result	Result	Result	Result
EP231D: (n:2) Fluorotelomer Sulfonic Acids - Continued									
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L		<0.05	<0.05	<0.05	<0.05	<0.05
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L		<0.05	<0.05	<0.05	<0.05	<0.05
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L		<0.05	<0.05	<0.05	<0.05	<0.05
EP231P: PFAS Sums									
Sum of PFAS	----	0.01	µg/L		**0.03**	**0.03**	<0.01	**0.02**	<0.01
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L		**0.03**	**0.03**	<0.01	**0.02**	<0.01
Sum of PFAS (WA DER List)	----	0.01	µg/L		**0.03**	**0.03**	<0.01	**0.02**	<0.01
EP074S: VOC Surrogates									
1.2-Dichloroethane-D4	17060-07-0	5	%		**101**	**94.2**	**106**	**106**	**100**
Toluene-D8	2037-26-5	5	%		**88.8**	**91.2**	**96.9**	**91.4**	**94.3**
4-Bromofluorobenzene	460-00-4	5	%		**87.3**	**92.0**	**93.9**	**92.4**	**89.7**
EP075S: Acid Extractable Surrogates									
2-Fluorophenol	367-12-4	2	%		**30.1**	**31.8**	**32.8**	**28.8**	**36.0**
Phenol-d6	13127-88-3	2	%		**20.8**	**22.7**	**23.4**	**18.4**	**24.5**
2-Chlorophenol-D4	93951-73-6	2	%		**45.0**	**46.2**	**47.4**	**40.6**	**50.9**
2.4.6-Tribromophenol	118-79-6	2	%		**50.2**	**53.0**	**56.4**	**48.1**	**49.9**
EP075T: Base/Neutral Extractable Surrogates									
Nitrobenzene-D5	4165-60-0	2	%		**45.2**	**48.1**	**49.8**	**42.2**	**52.6**
1.2-Dichlorobenzene-D4	2199-69-1	2	%		**44.8**	**48.0**	**50.5**	**42.8**	**51.6**
2-Fluorobiphenyl	321-60-8	2	%		**54.6**	**51.6**	**59.3**	**49.1**	**61.5**
Anthracene-d10	1719-06-8	2	%		**74.0**	**71.3**	**73.2**	**64.2**	**78.7**
4-Terphenyl-d14	1718-51-0	2	%		**80.0**	**83.9**	**79.9**	**68.8**	**83.1**
EP080S: TPH(V)/BTEX Surrogates									
1.2-Dichloroethane-D4	17060-07-0	2	%		**104**	**97.1**	**110**	**109**	**103**
Toluene-D8	2037-26-5	2	%		**94.1**	**96.2**	**102**	**96.5**	**100.0**
4-Bromofluorobenzene	460-00-4	2	%		**94.7**	**98.5**	**103**	**98.6**	**97.7**
EP231S: PFAS Surrogate									
13C4-PFOS	----	0.02	%		**99.1**	**94.5**	**93.3**	**92.4**	**101**
13C8-PFOA	----	0.02	%		**107**	**114**	**114**	**94.3**	**110**

Analytical Results

Sub-Matrix: WATER (Matrix: WATER)				Client sample ID	MW06	MW07	DUP	EB	----
				Client sampling date / time	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	----
Compound	CAS Number	LOR	Unit		ES1900690-006	ES1900690-007	ES1900690-008	ES1900690-009	--------
					Result	Result	Result	Result	----
EG020F: Dissolved Metals by ICP-MS									
Arsenic	7440-38-2	0.001	mg/L		<0.001	<0.001	<0.001	----	----
Cadmium	7440-43-9	0.0001	mg/L		<0.0001	<0.0001	<0.0001	----	----
Chromium	7440-47-3	0.001	mg/L		<0.001	<0.001	<0.001	----	----
Copper	7440-50-8	0.001	mg/L		**0.004**	<0.001	<0.001	----	----
Nickel	7440-02-0	0.001	mg/L		<0.001	<0.001	<0.001	----	----
Lead	7439-92-1	0.001	mg/L		<0.001	<0.001	<0.001	----	----
Zinc	7440-66-6	0.005	mg/L		**0.304**	**1.66**	<0.005	----	----
EG035F: Dissolved Mercury by FIMS									
Mercury	7439-97-6	0.0001	mg/L		<0.0001	<0.0001	<0.0001	----	----
EK055G: Ammonia as N by Discrete Analyser									
Ammonia as N	7664-41-7	0.01	mg/L		**0.05**	**0.02**	**3.18**	----	----
EP074A: Monocyclic Aromatic Hydrocarbons									
Benzene	71-43-2	1	µg/L		<1	<1	<1	<1	----
Toluene	108-88-3	2	µg/L		<2	<2	<2	<2	----
Ethylbenzene	100-41-4	2	µg/L		<2	<2	<2	<2	----
meta- & para-Xylene	108-38-3 106-42-3	2	µg/L		<2	<2	<2	<2	----
Styrene	100-42-5	5	µg/L		<5	<5	<5	<5	----
ortho-Xylene	95-47-6	2	µg/L		<2	<2	<2	<2	----
Isopropylbenzene	98-82-8	5	µg/L		<5	<5	<5	<5	----
n-Propylbenzene	103-65-1	5	µg/L		<5	<5	<5	<5	----
1.3.5-Trimethylbenzene	108-67-8	5	µg/L		<5	<5	<5	<5	----
sec-Butylbenzene	135-98-8	5	µg/L		<5	<5	<5	<5	----
1.2.4-Trimethylbenzene	95-63-6	5	µg/L		<5	<5	<5	<5	----
tert-Butylbenzene	98-06-6	5	µg/L		<5	<5	<5	<5	----
p-Isopropyltoluene	99-87-6	5	µg/L		<5	<5	<5	<5	----
n-Butylbenzene	104-51-8	5	µg/L		<5	<5	<5	<5	----
EP074B: Oxygenated Compounds									
Vinyl Acetate	108-05-4	50	µg/L		<50	<50	<50	<50	----
2-Butanone (MEK)	78-93-3	50	µg/L		<50	<50	<50	<50	----
4-Methyl-2-pentanone (MIBK)	108-10-1	50	µg/L		<50	<50	<50	<50	----
2-Hexanone (MBK)	591-78-6	50	µg/L		<50	<50	<50	<50	----
EP074C: Sulfonated Compounds									
Carbon disulfide	75-15-0	5	µg/L		<5	<5	<5	<5	----
EP074D: Fumigants									

Analytical Results

Sub-Matrix: WATER (Matrix: WATER)				Client sample ID	MW06	MW07	DUP	EB	----
				Client sampling date / time	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	----
Compound	CAS Number	LOR	Unit		ES1900690-006	ES1900690-007	ES1900690-008	ES1900690-009	--------
					Result	Result	Result	Result	----
EP074D: Fumigants - Continued									
2.2-Dichloropropane	594-20-7	5	µg/L		<5	<5	<5	<5	----
1.2-Dichloropropane	78-87-5	5	µg/L		<5	<5	<5	<5	----
cis-1.3-Dichloropropylene	10061-01-5	5	µg/L		<5	<5	<5	<5	----
trans-1.3-Dichloropropylene	10061-02-6	5	µg/L		<5	<5	<5	<5	----
1.2-Dibromoethane (EDB)	106-93-4	5	µg/L		<5	<5	<5	<5	----
EP074E: Halogenated Aliphatic Compounds									
Dichlorodifluoromethane	75-71-8	50	µg/L		<50	<50	<50	<50	----
Chloromethane	74-87-3	50	µg/L		<50	<50	<50	<50	----
Vinyl chloride	75-01-4	50	µg/L		<50	<50	<50	<50	----
Bromomethane	74-83-9	50	µg/L		<50	<50	<50	<50	----
Chloroethane	75-00-3	50	µg/L		<50	<50	<50	<50	----
Trichlorofluoromethane	75-69-4	50	µg/L		<50	<50	<50	<50	----
1.1-Dichloroethene	75-35-4	5	µg/L		<5	<5	<5	<5	----
Iodomethane	74-88-4	5	µg/L		<5	<5	<5	<5	----
trans-1.2-Dichloroethene	156-60-5	5	µg/L		<5	<5	<5	<5	----
1.1-Dichloroethane	75-34-3	5	µg/L		<5	<5	<5	<5	----
cis-1.2-Dichloroethene	156-59-2	5	µg/L		<5	<5	**19**	<5	----
1.1.1-Trichloroethane	71-55-6	5	µg/L		<5	<5	<5	<5	----
1.1-Dichloropropylene	563-58-6	5	µg/L		<5	<5	<5	<5	----
Carbon Tetrachloride	56-23-5	5	µg/L		<5	<5	<5	<5	----
1.2-Dichloroethane	107-06-2	5	µg/L		<5	<5	<5	<5	----
Trichloroethene	79-01-6	5	µg/L		<5	<5	<5	<5	----
Dibromomethane	74-95-3	5	µg/L		<5	<5	<5	<5	----
1.1.2-Trichloroethane	79-00-5	5	µg/L		<5	<5	<5	<5	----
1.3-Dichloropropane	142-28-9	5	µg/L		<5	<5	<5	<5	----
Tetrachloroethene	127-18-4	5	µg/L		<5	<5	<5	<5	----
1.1.1.2-Tetrachloroethane	630-20-6	5	µg/L		<5	<5	<5	<5	----
trans-1.4-Dichloro-2-butene	110-57-6	5	µg/L		<5	<5	<5	<5	----
cis-1.4-Dichloro-2-butene	1476-11-5	5	µg/L		<5	<5	<5	<5	----
1.1.2.2-Tetrachloroethane	79-34-5	5	µg/L		<5	<5	<5	<5	----
1.2.3-Trichloropropane	96-18-4	5	µg/L		<5	<5	<5	<5	----
Pentachloroethane	76-01-7	5	µg/L		<5	<5	<5	<5	----
1.2-Dibromo-3-chloropropane	96-12-8	5	µg/L		<5	<5	<5	<5	----
Hexachlorobutadiene	87-68-3	5	µg/L		----	----	----	<5	----

Analytical Results

Sub-Matrix: WATER (Matrix: WATER)				Client sample ID	MW06	MW07	DUP	EB	----
				Client sampling date / time	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	----
Compound	CAS Number	LOR	Unit		ES1900690-006	ES1900690-007	ES1900690-008	ES1900690-009	--------
					Result	Result	Result	Result	----
EP074F: Halogenated Aromatic Compounds									
Chlorobenzene	108-90-7	5	µg/L		<5	<5	<5	<5	----
Bromobenzene	108-86-1	5	µg/L		<5	<5	<5	<5	----
2-Chlorotoluene	95-49-8	5	µg/L		<5	<5	<5	<5	----
4-Chlorotoluene	106-43-4	5	µg/L		<5	<5	<5	<5	----
1.3-Dichlorobenzene	541-73-1	5	µg/L		----	----	----	<5	----
1.4-Dichlorobenzene	106-46-7	5	µg/L		----	----	----	<5	----
1.2-Dichlorobenzene	95-50-1	5	µg/L		----	----	----	<5	----
1.2.4-Trichlorobenzene	120-82-1	5	µg/L		----	----	----	<5	----
1.2.3-Trichlorobenzene	87-61-6	5	µg/L		<5	<5	<5	<5	----
EP074G: Trihalomethanes									
Chloroform	67-66-3	5	µg/L		<5	<5	<5	<5	----
Bromodichloromethane	75-27-4	5	µg/L		<5	<5	<5	<5	----
Dibromochloromethane	124-48-1	5	µg/L		<5	<5	<5	<5	----
Bromoform	75-25-2	5	µg/L		<5	<5	<5	<5	----
EP074H: Naphthalene									
Naphthalene	91-20-3	5	µg/L		----	----	----	<5	----
EP075A: Phenolic Compounds									
Phenol	108-95-2	2	µg/L		<2	<2	<2	----	----
2-Chlorophenol	95-57-8	2	µg/L		<2	<2	<2	----	----
2-Methylphenol	95-48-7	2	µg/L		<2	<2	<2	----	----
3- & 4-Methylphenol	1319-77-3	4	µg/L		<4	<4	<4	----	----
2-Nitrophenol	88-75-5	2	µg/L		<2	<2	<2	----	----
2.4-Dimethylphenol	105-67-9	2	µg/L		<2	<2	<2	----	----
2.4-Dichlorophenol	120-83-2	2	µg/L		<2	<2	<2	----	----
2.6-Dichlorophenol	87-65-0	2	µg/L		<2	<2	<2	----	----
4-Chloro-3-methylphenol	59-50-7	2	µg/L		<2	<2	<2	----	----
2.4.6-Trichlorophenol	88-06-2	2	µg/L		<2	<2	<2	----	----
2.4.5-Trichlorophenol	95-95-4	2	µg/L		<2	<2	<2	----	----
Pentachlorophenol	87-86-5	4	µg/L		<4	<4	<4	----	----
EP075B: Polynuclear Aromatic Hydrocarbons									
Naphthalene	91-20-3	2	µg/L		<2	<2	<2	----	----
2-Methylnaphthalene	91-57-6	2	µg/L		<2	<2	<2	----	----
2-Chloronaphthalene	91-58-7	2	µg/L		<2	<2	<2	----	----
Acenaphthylene	208-96-8	2	µg/L		<2	<2	<2	----	----

Analytical Results

Sub-Matrix: WATER (Matrix: WATER)				Client sample ID	MW06	MW07	DUP	EB	----
				Client sampling date / time	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	----
Compound	CAS Number	LOR	Unit		ES1900690-006	ES1900690-007	ES1900690-008	ES1900690-009	--------
					Result	Result	Result	Result	----
EP075B: Polynuclear Aromatic Hydrocarbons - Continued									
Acenaphthene	83-32-9	2	µg/L		<2	<2	<2	----	----
Fluorene	86-73-7	2	µg/L		<2	<2	<2	----	----
Phenanthrene	85-01-8	2	µg/L		<2	<2	<2	----	----
Anthracene	120-12-7	2	µg/L		<2	<2	<2	----	----
Fluoranthene	206-44-0	2	µg/L		<2	<2	<2	----	----
Pyrene	129-00-0	2	µg/L		<2	<2	<2	----	----
N-2-Fluorenyl Acetamide	53-96-3	2	µg/L		<2	<2	<2	----	----
Benz(a)anthracene	56-55-3	2	µg/L		<2	<2	<2	----	----
Chrysene	218-01-9	2	µg/L		<2	<2	<2	----	----
Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	4	µg/L		<4	<4	<4	----	----
7.12-Dimethylbenz(a)anthracene	57-97-6	2	µg/L		<2	<2	<2	----	----
Benzo(a)pyrene	50-32-8	2	µg/L		<2	<2	<2	----	----
3-Methylcholanthrene	56-49-5	2	µg/L		<2	<2	<2	----	----
Indeno(1.2.3.cd)pyrene	193-39-5	2	µg/L		<2	<2	<2	----	----
Dibenz(a.h)anthracene	53-70-3	2	µg/L		<2	<2	<2	----	----
Benzo(g.h.i)perylene	191-24-2	2	µg/L		<2	<2	<2	----	----
^ Sum of PAHs	----	2	µg/L		<2	<2	<2	----	----
^ Benzo(a)pyrene TEQ (zero)	----	2	µg/L		<2	<2	<2	----	----
EP075C: Phthalate Esters									
Dimethyl phthalate	131-11-3	2	µg/L		<2	<2	<2	----	----
Diethyl phthalate	84-66-2	2	µg/L		<2	<2	<2	----	----
Di-n-butyl phthalate	84-74-2	2	µg/L		<2	<2	<2	----	----
Butyl benzyl phthalate	85-68-7	2	µg/L		<2	<2	<2	----	----
bis(2-ethylhexyl) phthalate	117-81-7	10	µg/L		<10	<10	<10	----	----
Di-n-octylphthalate	117-84-0	2	µg/L		<2	<2	<2	----	----
EP075D: Nitrosamines									
N-Nitrosomethylethylamine	10595-95-6	2	µg/L		<2	<2	<2	----	----
N-Nitrosodiethylamine	55-18-5	2	µg/L		<2	<2	<2	----	----
N-Nitrosopyrrolidine	930-55-2	4	µg/L		<4	<4	<4	----	----
N-Nitrosomorpholine	59-89-2	2	µg/L		<2	<2	<2	----	----
N-Nitrosodi-n-propylamine	621-64-7	2	µg/L		<2	<2	<2	----	----
N-Nitrosopiperidine	100-75-4	2	µg/L		<2	<2	<2	----	----
N-Nitrosodibutylamine	924-16-3	2	µg/L		<2	<2	<2	----	----

Analytical Results

Sub-Matrix: WATER (Matrix: WATER)				Client sample ID	MW06	MW07	DUP	EB	----
				Client sampling date / time	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	----
Compound	CAS Number	LOR	Unit		ES1900690-006	ES1900690-007	ES1900690-008	ES1900690-009	--------
					Result	Result	Result	Result	----
EP075D: Nitrosamines - Continued									
N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	4	µg/L		<4	<4	<4	----	----
Methapyrilene	91-80-5	2	µg/L		<2	<2	<2	----	----
EP075E: Nitroaromatics and Ketones									
2-Picoline	109-06-8	2	µg/L		<2	<2	<2	----	----
Acetophenone	98-86-2	2	µg/L		<2	<2	<2	----	----
Nitrobenzene	98-95-3	2	µg/L		<2	<2	<2	----	----
Isophorone	78-59-1	2	µg/L		<2	<2	<2	----	----
2.6-Dinitrotoluene	606-20-2	4	µg/L		<4	<4	<4	----	----
2.4-Dinitrotoluene	121-14-2	4	µg/L		<4	<4	<4	----	----
1-Naphthylamine	134-32-7	2	µg/L		<2	<2	<2	----	----
4-Nitroquinoline-N-oxide	56-57-5	2	µg/L		<2	<2	<2	----	----
5-Nitro-o-toluidine	99-55-8	2	µg/L		<2	<2	<2	----	----
Azobenzene	103-33-3	2	µg/L		<2	<2	<2	----	----
1.3.5-Trinitrobenzene	99-35-4	2	µg/L		<2	<2	<2	----	----
Phenacetin	62-44-2	2	µg/L		<2	<2	<2	----	----
4-Aminobiphenyl	92-67-1	2	µg/L		<2	<2	<2	----	----
Pentachloronitrobenzene	82-68-8	2	µg/L		<2	<2	<2	----	----
Pronamide	23950-58-5	2	µg/L		<2	<2	<2	----	----
Dimethylaminoazobenzene	60-11-7	2	µg/L		<2	<2	<2	----	----
Chlorobenzilate	510-15-6	2	µg/L		<2	<2	<2	----	----
EP075F: Haloethers									
Bis(2-chloroethyl) ether	111-44-4	2	µg/L		<2	<2	<2	----	----
Bis(2-chloroethoxy) methane	111-91-1	2	µg/L		<2	<2	<2	----	----
4-Chlorophenyl phenyl ether	7005-72-3	2	µg/L		<2	<2	<2	----	----
4-Bromophenyl phenyl ether	101-55-3	2	µg/L		<2	<2	<2	----	----
EP075G: Chlorinated Hydrocarbons									
1.3-Dichlorobenzene	541-73-1	2	µg/L		<2	<2	<2	----	----
1.4-Dichlorobenzene	106-46-7	2	µg/L		<2	<2	<2	----	----
1.2-Dichlorobenzene	95-50-1	2	µg/L		<2	<2	<2	----	----
Hexachloroethane	67-72-1	2	µg/L		<2	<2	<2	----	----
1.2.4-Trichlorobenzene	120-82-1	2	µg/L		<2	<2	<2	----	----
Hexachloropropylene	1888-71-7	2	µg/L		<2	<2	<2	----	----
Hexachlorobutadiene	87-68-3	2	µg/L		<2	<2	<2	----	----

Analytical Results

Sub-Matrix: WATER (Matrix: WATER)				Client sample ID	MW06	MW07	DUP	EB	----
				Client sampling date / time	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	----
Compound	CAS Number	LOR	Unit		ES1900690-006	ES1900690-007	ES1900690-008	ES1900690-009	--------
					Result	Result	Result	Result	----
EP075G: Chlorinated Hydrocarbons - Continued									
Hexachlorocyclopentadiene	77-47-4	10	µg/L		<10	<10	<10	----	----
Pentachlorobenzene	608-93-5	2	µg/L		<2	<2	<2	----	----
Hexachlorobenzene (HCB)	118-74-1	4	µg/L		<4	<4	<4	----	----
EP075H: Anilines and Benzidines									
Aniline	62-53-3	2	µg/L		<2	<2	<2	----	----
4-Chloroaniline	106-47-8	2	µg/L		<2	<2	<2	----	----
2-Nitroaniline	88-74-4	4	µg/L		<4	<4	<4	----	----
3-Nitroaniline	99-09-2	4	µg/L		<4	<4	<4	----	----
Dibenzofuran	132-64-9	2	µg/L		<2	<2	<2	----	----
4-Nitroaniline	100-01-8	2	µg/L		<2	<2	<2	----	----
Carbazole	86-74-8	2	µg/L		<2	<2	<2	----	----
3.3`-Dichlorobenzidine	91-94-1	2	µg/L		<2	<2	<2	----	----
EP075I: Organochlorine Pesticides									
alpha-BHC	319-84-6	2	µg/L		<2	<2	<2	----	----
beta-BHC	319-85-7	2	µg/L		<2	<2	<2	----	----
gamma-BHC	58-89-9	2	µg/L		<2	<2	<2	----	----
delta-BHC	319-86-8	2	µg/L		<2	<2	<2	----	----
Heptachlor	76-44-8	2	µg/L		<2	<2	<2	----	----
Aldrin	309-00-2	2	µg/L		<2	<2	<2	----	----
Heptachlor epoxide	1024-57-3	2	µg/L		<2	<2	<2	----	----
alpha-Endosulfan	959-98-8	2	µg/L		<2	<2	<2	----	----
4.4`-DDE	72-55-9	2	µg/L		<2	<2	<2	----	----
Dieldrin	60-57-1	2	µg/L		<2	<2	<2	----	----
Endrin	72-20-8	2	µg/L		<2	<2	<2	----	----
beta-Endosulfan	33213-65-9	2	µg/L		<2	<2	<2	----	----
4.4`-DDD	72-54-8	2	µg/L		<2	<2	<2	----	----
Endosulfan sulfate	1031-07-8	2	µg/L		<2	<2	<2	----	----
4.4`-DDT	50-29-3	4	µg/L		<4	<4	<4	----	----
^ Sum of Aldrin + Dieldrin	309-00-2/60-57-1	4	µg/L		<4	<4	<4	----	----
^ Sum of DDD + DDE + DDT	72-54-8/72-55-9/50-2	4	µg/L		<4	<4	<4	----	----
EP075J: Organophosphorus Pesticides									
Dichlorvos	62-73-7	2	µg/L		<2	<2	<2	----	----
Dimethoate	60-51-5	2	µg/L		<2	<2	<2	----	----

Analytical Results

Sub-Matrix: WATER (Matrix: WATER)				Client sample ID	MW06	MW07	DUP	EB	----
				Client sampling date / time	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	----
Compound	CAS Number	LOR	Unit		ES1900690-006	ES1900690-007	ES1900690-008	ES1900690-009	--------
					Result	Result	Result	Result	----
EP075J: Organophosphorus Pesticides - Continued									
Diazinon	333-41-5	2	µg/L		<2	<2	<2	----	----
Chlorpyrifos-methyl	5598-13-0	2	µg/L		<2	<2	<2	----	----
Malathion	121-75-5	2	µg/L		<2	<2	<2	----	----
Fenthion	55-38-9	2	µg/L		<2	<2	<2	----	----
Chlorpyrifos	2921-88-2	2	µg/L		<2	<2	<2	----	----
Pirimphos-ethyl	23505-41-1	2	µg/L		<2	<2	<2	----	----
Chlorfenvinphos	470-90-6	2	µg/L		<2	<2	<2	----	----
Prothiofos	34643-46-4	2	µg/L		<2	<2	<2	----	----
Ethion	563-12-2	2	µg/L		<2	<2	<2	----	----
EP080/071: Total Petroleum Hydrocarbons									
C6 - C9 Fraction	----	20	µg/L		<20	<20	<20	----	----
C10 - C14 Fraction	----	50	µg/L		<50	<50	<50	----	----
C15 - C28 Fraction	----	100	µg/L		<100	<100	<100	----	----
C29 - C36 Fraction	----	50	µg/L		<50	<50	<50	----	----
^ **C10 - C36 Fraction (sum)**	----	50	µg/L		<50	<50	<50	----	----
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions									
C6 - C10 Fraction	C6_C10	20	µg/L		<20	<20	<20	----	----
^ **C6 - C10 Fraction minus BTEX (F1)**	C6_C10-BTEX	20	µg/L		<20	<20	<20	----	----
>C10 - C16 Fraction	----	100	µg/L		<100	<100	<100	----	----
>C16 - C34 Fraction	----	100	µg/L		<100	<100	<100	----	----
>C34 - C40 Fraction	----	100	µg/L		<100	<100	<100	----	----
^ **>C10 - C40 Fraction (sum)**	----	100	µg/L		<100	<100	<100	----	----
^ **>C10 - C16 Fraction minus Naphthalene (F2)**	----	100	µg/L		<100	<100	<100	----	----
EP080: BTEXN									
^ **Total Xylenes**	----	2	µg/L		<2	<2	<2	<2	----
^ **Sum of BTEX**	----	1	µg/L		<1	<1	<1	<1	----
Naphthalene	91-20-3	5	µg/L		<5	<5	<5	<5	----
EP231A: Perfluoroalkyl Sulfonic Acids									
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L		<0.02	<0.02	<0.02	----	----
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L		<0.02	<0.02	<0.02	----	----

Analytical Results

Sub-Matrix: WATER (Matrix: WATER)				Client sample ID	MW06	MW07	DUP	EB	----
				Client sampling date / time	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	----
Compound	CAS Number	LOR	Unit		ES1900690-006	ES1900690-007	ES1900690-008	ES1900690-009	--------
					Result	Result	Result	Result	----
EP231A: Perfluoroalkyl Sulfonic Acids - Continued									
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.02	µg/L		<0.02	<0.02	<0.02	----	----
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L		<0.02	<0.02	<0.02	----	----
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L		<0.01	<0.01	<0.01	----	----
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L		<0.02	<0.02	<0.02	----	----
EP231B: Perfluoroalkyl Carboxylic Acids									
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L		<0.1	<0.1	<0.1	----	----
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L		<0.02	<0.02	<0.02	----	----
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L		<0.02	<0.02	<0.02	----	----
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L		<0.02	<0.02	<0.02	----	----
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L		<0.01	<0.01	<0.01	----	----
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L		<0.02	<0.02	<0.02	----	----
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L		<0.02	<0.02	<0.02	----	----
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L		<0.02	<0.02	<0.02	----	----
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L		<0.02	<0.02	<0.02	----	----
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L		<0.02	<0.02	<0.02	----	----
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L		<0.05	<0.05	<0.05	----	----
EP231C: Perfluoroalkyl Sulfonamides									
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L		<0.02	<0.02	<0.02	----	----
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L		<0.05	<0.05	<0.05	----	----
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L		<0.05	<0.05	<0.05	----	----
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L		<0.05	<0.05	<0.05	----	----
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L		<0.05	<0.05	<0.05	----	----

Analytical Results

Sub-Matrix: WATER (Matrix: WATER)				Client sample ID	MW06	MW07	DUP	EB	----
				Client sampling date / time	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	----
Compound	CAS Number	LOR	Unit		ES1900690-006	ES1900690-007	ES1900690-008	ES1900690-009	--------
					Result	Result	Result	Result	----
EP231C: Perfluoroalkyl Sulfonamides - Continued									
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L		<0.02	<0.02	<0.02	----	----
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L		<0.02	<0.02	<0.02	----	----
EP231D: (n:2) Fluorotelomer Sulfonic Acids									
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L		<0.05	<0.05	<0.05	----	----
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L		<0.05	<0.05	<0.05	----	----
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L		<0.05	<0.05	<0.05	----	----
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L		<0.05	<0.05	<0.05	----	----
EP231P: PFAS Sums									
Sum of PFAS	----	0.01	µg/L		<0.01	<0.01	<0.01	----	----
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L		<0.01	<0.01	<0.01	----	----
Sum of PFAS (WA DER List)	----	0.01	µg/L		<0.01	<0.01	<0.01	----	----
EP074S: VOC Surrogates									
1.2-Dichloroethane-D4	17060-07-0	5	%		**108**	**107**	**115**	**102**	----
Toluene-D8	2037-26-5	5	%		**97.8**	**96.4**	**116**	**99.6**	----
4-Bromofluorobenzene	460-00-4	5	%		**97.1**	**96.5**	**113**	**100**	----
EP075S: Acid Extractable Surrogates									
2-Fluorophenol	367-12-4	2	%		**29.2**	**31.8**	**28.6**	----	----
Phenol-d6	13127-88-3	2	%		**20.7**	**22.4**	**20.1**	----	----
2-Chlorophenol-D4	93951-73-6	2	%		**40.7**	**44.5**	**40.7**	----	----
2.4.6-Tribromophenol	118-79-6	2	%		**42.5**	**37.4**	**47.1**	----	----
EP075T: Base/Neutral Extractable Surrogates									
Nitrobenzene-D5	4165-60-0	2	%		**41.5**	**45.6**	**42.9**	----	----
1.2-Dichlorobenzene-D4	2199-69-1	2	%		**42.3**	**44.9**	**40.0**	----	----
2-Fluorobiphenyl	321-60-8	2	%		**47.0**	**52.2**	**48.4**	----	----
Anthracene-d10	1719-06-8	2	%		**73.9**	**68.6**	**73.7**	----	----
4-Terphenyl-d14	1718-51-0	2	%		**79.1**	**69.2**	**80.5**	----	----

Analytical Results

Sub-Matrix: WATER (Matrix: WATER)				Client sample ID	MW06	MW07	DUP	EB	----
				Client sampling date / time	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	08-Jan-2019 00:00	----
Compound	CAS Number	LOR	Unit		ES1900690-006	ES1900690-007	ES1900690-008	ES1900690-009	--------
					Result	Result	Result	Result	----
EP080S: TPH(V)/BTEX Surrogates									
1.2-Dichloroethane-D4	17060-07-0	2	%		**112**	**110**	**126**	**106**	**----**
Toluene-D8	2037-26-5	2	%		**104**	**102**	**122**	**105**	**----**
4-Bromofluorobenzene	460-00-4	2	%		**103**	**105**	**124**	**110**	**----**
EP231S: PFAS Surrogate									
13C4-PFOS	----	0.02	%		**90.2**	**97.2**	**97.6**	**----**	**----**
13C8-PFOA	----	0.02	%		**104**	**103**	**93.5**	**----**	**----**

Surrogate Control Limits

Sub-Matrix: **WATER**

Compound	CAS Number	Recovery Limits (%) Low	High
EP074S: VOC Surrogates			
1.2-Dichloroethane-D4	17060-07-0	78	133
Toluene-D8	2037-26-5	79	129
4-Bromofluorobenzene	460-00-4	81	124
EP075S: Acid Extractable Surrogates			
2-Fluorophenol	367-12-4	10	117
Phenol-d6	13127-88-3	10	69
2-Chlorophenol-D4	93951-73-6	21	130
2.4.6-Tribromophenol	118-79-6	10	151
EP075T: Base/Neutral Extractable Surrogates			
Nitrobenzene-D5	4165-60-0	29	142
1.2-Dichlorobenzene-D4	2199-69-1	24	121
2-Fluorobiphenyl	321-60-8	27	135
Anthracene-d10	1719-06-8	27	113
4-Terphenyl-d14	1718-51-0	21	123
EP080S: TPH(V)/BTEX Surrogates			
1.2-Dichloroethane-D4	17060-07-0	71	137
Toluene-D8	2037-26-5	79	131
4-Bromofluorobenzene	460-00-4	70	128
EP231S: PFAS Surrogate			
13C4-PFOS	----	60	120
13C8-PFOA	----	60	120

ALS Environmental

QUALITY CONTROL REPORT

Work Order	: **ES1900690**	Page	: 1 of 16
Client	: **ARCADIS AUSTRALIA PACIFIC PTY LTD**	Laboratory	: Environmental Division Sydney
Contact	: MR DEAN STAFFORD	Contact	: Larissa Burns
Address	: L16, 480 GEORGE STREET SYDNEY NSW 2000	Address	: 277-289 Woodpark Road Smithfield NSW Australia 2164
Telephone	: 02 9690 2555	Telephone	: +6138549 9644
Project	: King St North Carpark	Date Samples Received	: 10-Jan-2019
Order number	: 10026439.1	Date Analysis Commenced	: 10-Jan-2019
C-O-C number	: ----	Issue Date	: 16-Jan-2019
Sampler	: TOM KEATLEY		
Site	: ----		
Quote number	: EN-091-18 (Primary Work Only)		
No. of samples received	: 9		
No. of samples analysed	: 9		

Accreditation No. 825
Accredited for compliance with ISO/IEC 17025 - Testing

This report supersedes any previous report(s) with this reference. Results apply to the sample(s) as submitted. This document shall not be reproduced, except in full.

This Quality Control Report contains the following information:

- Laboratory Duplicate (DUP) Report; Relative Percentage Difference (RPD) and Acceptance Limits
- Method Blank (MB) and Laboratory Control Spike (LCS) Report; Recovery and Acceptance Limits
- Matrix Spike (MS) Report; Recovery and Acceptance Limits

Signatories

This document has been electronically signed by the authorized signatories below. Electronic signing is carried out in compliance with procedures specified in 21 CFR Part 11.

Signatories	*Position*	*Accreditation Category*
Alex Rossi	Organic Chemist	Sydney Organics, Smithfield, NSW
Ankit Joshi	Inorganic Chemist	Sydney Inorganics, Smithfield, NSW
Celine Conceicao	Senior Spectroscopist	Sydney Inorganics, Smithfield, NSW
Edwandy Fadjar	Organic Coordinator	Sydney Organics, Smithfield, NSW

General Comments

The analytical procedures used by the Environmental Division have been developed from established internationally recognized procedures such as those published by the USEPA, APHA, AS and NEPM. In house developed procedures are employed in the absence of documented standards or by client request.

Where moisture determination has been performed, results are reported on a dry weight basis.

Where a reported less than (<) result is higher than the LOR, this may be due to primary sample extract/digestate dilution and/or insufficient sample for analysis. Where the LOR of a reported result differs from standard LOR, this may be due to high

Key : Anonymous = Refers to samples which are not specifically part of this work order but formed part of the QC process lot
CAS Number = CAS registry number from database maintained by Chemical Abstracts Services. The Chemical Abstracts Service is a division of the American Chemical Society.
LOR = Limit of reporting
RPD = Relative Percentage Difference
# = Indicates failed QC

Laboratory Duplicate (DUP) Report

The quality control term Laboratory Duplicate refers to a randomly selected intralaboratory split. Laboratory duplicates provide information regarding method precision and sample heterogeneity. The permitted ranges for the Relative Percent Deviation (RPD) of Laboratory Duplicates are specified in ALS Method QWI-EN/38 and are dependent on the magnitude of results in comparison to the level of reporting: Result < 10 times LOR: No Limit; Result between 10 and 20 times LOR: 0% - 50%; Result > 20 times LOR: 0% - 20%.

Sub-Matrix: **WATER**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EG020F: Dissolved Metals by ICP-MS (QC Lot: 2133748)									
ES1900690-001	MW01	EG020A-F: Cadmium	7440-43-9	0.0001	mg/L	<0.0001	<0.0001	0.00	No Limit
		EG020A-F: Arsenic	7440-38-2	0.001	mg/L	<0.001	0.002	67.1	No Limit
		EG020A-F: Chromium	7440-47-3	0.001	mg/L	<0.001	<0.001	0.00	No Limit
		EG020A-F: Copper	7440-50-8	0.001	mg/L	<0.001	<0.001	0.00	No Limit
		EG020A-F: Lead	7439-92-1	0.001	mg/L	<0.001	<0.001	0.00	No Limit
		EG020A-F: Nickel	7440-02-0	0.001	mg/L	0.005	0.002	71.1	No Limit
		EG020A-F: Zinc	7440-66-6	0.005	mg/L	1.18	1.15	2.41	0% - 20%
ES1900699-003	Anonymous	EG020A-F: Cadmium	7440-43-9	0.0001	mg/L	<0.0001	<0.0001	0.00	No Limit
		EG020A-F: Arsenic	7440-38-2	0.001	mg/L	0.004	0.003	36.2	No Limit
		EG020A-F: Chromium	7440-47-3	0.001	mg/L	<0.001	<0.001	0.00	No Limit
		EG020A-F: Copper	7440-50-8	0.001	mg/L	0.003	0.003	0.00	No Limit
		EG020A-F: Lead	7439-92-1	0.001	mg/L	0.006	0.007	0.00	No Limit
		EG020A-F: Nickel	7440-02-0	0.001	mg/L	<0.001	0.003	98.7	No Limit
		EG020A-F: Zinc	7440-66-6	0.005	mg/L	0.491	0.506	2.90	0% - 20%
EG035F: Dissolved Mercury by FIMS (QC Lot: 2133749)									
ES1900690-002	MW02	EG035F: Mercury	7439-97-6	0.0001	mg/L	<0.0001	<0.0001	0.00	No Limit
ES1900699-002	Anonymous	EG035F: Mercury	7439-97-6	0.0001	mg/L	<0.0001	<0.0001	0.00	No Limit
EK055G: Ammonia as N by Discrete Analyser (QC Lot: 2130613)									
ES1900690-006	MW06	EK055G: Ammonia as N	7664-41-7	0.01	mg/L	0.05	0.04	0.00	No Limit
ES1900661-003	Anonymous	EK055G: Ammonia as N	7664-41-7	0.01	mg/L	0.03	0.04	0.00	No Limit
EP074A: Monocyclic Aromatic Hydrocarbons (QC Lot: 2131567)									
ES1900690-001	MW01	EP074: Benzene	71-43-2	1	µg/L	<1	<1	0.00	No Limit
		EP074: Toluene	108-88-3	2	µg/L	<2	<2	0.00	No Limit
		EP074: Ethylbenzene	100-41-4	2	µg/L	<2	<2	0.00	No Limit

Sub-Matrix: **WATER**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP074A: Monocyclic Aromatic Hydrocarbons (QC Lot: 2131567) - continued									
ES1900690-001	MW01	EP074: meta- & para-Xylene	108-38-3 106-42-3	2	µg/L	<2	<2	0.00	No Limit
		EP074: ortho-Xylene	95-47-6	2	µg/L	<2	<2	0.00	No Limit
		EP074: Styrene	100-42-5	5	µg/L	<5	<5	0.00	No Limit
		EP074: Isopropylbenzene	98-82-8	5	µg/L	<5	<5	0.00	No Limit
		EP074: n-Propylbenzene	103-65-1	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.3.5-Trimethylbenzene	108-67-8	5	µg/L	<5	<5	0.00	No Limit
		EP074: sec-Butylbenzene	135-98-8	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.2.4-Trimethylbenzene	95-63-6	5	µg/L	<5	<5	0.00	No Limit
		EP074: tert-Butylbenzene	98-06-6	5	µg/L	<5	<5	0.00	No Limit
		EP074: p-Isopropyltoluene	99-87-6	5	µg/L	<5	<5	0.00	No Limit
		EP074: n-Butylbenzene	104-51-8	5	µg/L	<5	<5	0.00	No Limit
ES1900690-009	EB	EP074: Benzene	71-43-2	1	µg/L	<1	<1	0.00	No Limit
		EP074: Toluene	108-88-3	2	µg/L	<2	<2	0.00	No Limit
		EP074: Ethylbenzene	100-41-4	2	µg/L	<2	<2	0.00	No Limit
		EP074: meta- & para-Xylene	108-38-3 106-42-3	2	µg/L	<2	<2	0.00	No Limit
		EP074: ortho-Xylene	95-47-6	2	µg/L	<2	<2	0.00	No Limit
		EP074: Styrene	100-42-5	5	µg/L	<5	<5	0.00	No Limit
		EP074: Isopropylbenzene	98-82-8	5	µg/L	<5	<5	0.00	No Limit
		EP074: n-Propylbenzene	103-65-1	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.3.5-Trimethylbenzene	108-67-8	5	µg/L	<5	<5	0.00	No Limit
		EP074: sec-Butylbenzene	135-98-8	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.2.4-Trimethylbenzene	95-63-6	5	µg/L	<5	<5	0.00	No Limit
		EP074: tert-Butylbenzene	98-06-6	5	µg/L	<5	<5	0.00	No Limit
		EP074: p-Isopropyltoluene	99-87-6	5	µg/L	<5	<5	0.00	No Limit
		EP074: n-Butylbenzene	104-51-8	5	µg/L	<5	<5	0.00	No Limit
EP074B: Oxygenated Compounds (QC Lot: 2131567)									
ES1900690-001	MW01	EP074: Vinyl Acetate	108-05-4	50	µg/L	<50	<50	0.00	No Limit
		EP074: 2-Butanone (MEK)	78-93-3	50	µg/L	<50	<50	0.00	No Limit
		EP074: 4-Methyl-2-pentanone (MIBK)	108-10-1	50	µg/L	<50	<50	0.00	No Limit
		EP074: 2-Hexanone (MBK)	591-78-6	50	µg/L	<50	<50	0.00	No Limit
ES1900690-009	EB	EP074: Vinyl Acetate	108-05-4	50	µg/L	<50	<50	0.00	No Limit
		EP074: 2-Butanone (MEK)	78-93-3	50	µg/L	<50	<50	0.00	No Limit
		EP074: 4-Methyl-2-pentanone (MIBK)	108-10-1	50	µg/L	<50	<50	0.00	No Limit
		EP074: 2-Hexanone (MBK)	591-78-6	50	µg/L	<50	<50	0.00	No Limit
EP074C: Sulfonated Compounds (QC Lot: 2131567)									
ES1900690-001	MW01	EP074: Carbon disulfide	75-15-0	5	µg/L	<5	<5	0.00	No Limit
ES1900690-009	EB	EP074: Carbon disulfide	75-15-0	5	µg/L	<5	<5	0.00	No Limit
EP074D: Fumigants (QC Lot: 2131567)									

Sub-Matrix: **WATER**

Laboratory sample ID	Client sample ID	Method: Compound	CAS Number	Laboratory Duplicate (DUP) Report					
				LOR	Unit	Original Result	Duplicate Result	RPD (%)	Recovery Limits (%)
EP074D: Fumigants (QC Lot: 2131567) - continued									
ES1900690-001	MW01	EP074: 2.2-Dichloropropane	594-20-7	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.2-Dichloropropane	78-87-5	5	µg/L	<5	<5	0.00	No Limit
		EP074: cis-1.3-Dichloropropylene	10061-01-5	5	µg/L	<5	<5	0.00	No Limit
		EP074: trans-1.3-Dichloropropylene	10061-02-6	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.2-Dibromoethane (EDB)	106-93-4	5	µg/L	<5	<5	0.00	No Limit
ES1900690-009	EB	EP074: 2.2-Dichloropropane	594-20-7	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.2-Dichloropropane	78-87-5	5	µg/L	<5	<5	0.00	No Limit
		EP074: cis-1.3-Dichloropropylene	10061-01-5	5	µg/L	<5	<5	0.00	No Limit
		EP074: trans-1.3-Dichloropropylene	10061-02-6	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.2-Dibromoethane (EDB)	106-93-4	5	µg/L	<5	<5	0.00	No Limit
EP074E: Halogenated Aliphatic Compounds (QC Lot: 2131567)									
ES1900690-001	MW01	EP074: 1.1-Dichloroethene	75-35-4	5	µg/L	<5	<5	0.00	No Limit
		EP074: Iodomethane	74-88-4	5	µg/L	<5	<5	0.00	No Limit
		EP074: trans-1.2-Dichloroethene	156-60-5	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.1-Dichloroethane	75-34-3	5	µg/L	<5	<5	0.00	No Limit
		EP074: cis-1.2-Dichloroethene	156-59-2	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.1.1-Trichloroethane	71-55-6	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.1-Dichloropropylene	563-58-6	5	µg/L	<5	<5	0.00	No Limit
		EP074: Carbon Tetrachloride	56-23-5	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.2-Dichloroethane	107-06-2	5	µg/L	<5	<5	0.00	No Limit
		EP074: Trichloroethene	79-01-6	5	µg/L	<5	<5	0.00	No Limit
		EP074: Dibromomethane	74-95-3	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.1.2-Trichloroethane	79-00-5	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.3-Dichloropropane	142-28-9	5	µg/L	<5	<5	0.00	No Limit
		EP074: Tetrachloroethene	127-18-4	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.1.1.2-Tetrachloroethane	630-20-6	5	µg/L	<5	<5	0.00	No Limit
		EP074: trans-1.4-Dichloro-2-butene	110-57-6	5	µg/L	<5	<5	0.00	No Limit
		EP074: cis-1.4-Dichloro-2-butene	1476-11-5	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.1.2.2-Tetrachloroethane	79-34-5	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.2.3-Trichloropropane	96-18-4	5	µg/L	<5	<5	0.00	No Limit
		EP074: Pentachloroethane	76-01-7	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.2-Dibromo-3-chloropropane	96-12-8	5	µg/L	<5	<5	0.00	No Limit
		EP074: Hexachlorobutadiene	87-68-3	5	µg/L	<5	<5	0.00	No Limit
		EP074: Dichlorodifluoromethane	75-71-8	50	µg/L	<50	<50	0.00	No Limit
		EP074: Chloromethane	74-87-3	50	µg/L	<50	<50	0.00	No Limit
		EP074: Vinyl chloride	75-01-4	50	µg/L	<50	<50	0.00	No Limit
		EP074: Bromomethane	74-83-9	50	µg/L	<50	<50	0.00	No Limit
		EP074: Chloroethane	75-00-3	50	µg/L	<50	<50	0.00	No Limit
		EP074: Trichlorofluoromethane	75-69-4	50	µg/L	<50	<50	0.00	No Limit
ES1900690-009	EB	EP074: 1.1-Dichloroethene	75-35-4	5	µg/L	<5	<5	0.00	No Limit

Sub-Matrix: **WATER**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP074E: Halogenated Aliphatic Compounds (QC Lot: 2131567) - continued									
ES1900690-009	EB	EP074: Iodomethane	74-88-4	5	µg/L	<5	<5	0.00	No Limit
		EP074: trans-1.2-Dichloroethene	156-60-5	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.1-Dichloroethane	75-34-3	5	µg/L	<5	<5	0.00	No Limit
		EP074: cis-1.2-Dichloroethene	156-59-2	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.1.1-Trichloroethane	71-55-6	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.1-Dichloropropylene	563-58-6	5	µg/L	<5	<5	0.00	No Limit
		EP074: Carbon Tetrachloride	56-23-5	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.2-Dichloroethane	107-06-2	5	µg/L	<5	<5	0.00	No Limit
		EP074: Trichloroethene	79-01-6	5	µg/L	<5	<5	0.00	No Limit
		EP074: Dibromomethane	74-95-3	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.1.2-Trichloroethane	79-00-5	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.3-Dichloropropane	142-28-9	5	µg/L	<5	<5	0.00	No Limit
		EP074: Tetrachloroethene	127-18-4	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.1.1.2-Tetrachloroethane	630-20-6	5	µg/L	<5	<5	0.00	No Limit
		EP074: trans-1.4-Dichloro-2-butene	110-57-6	5	µg/L	<5	<5	0.00	No Limit
		EP074: cis-1.4-Dichloro-2-butene	1476-11-5	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.1.2.2-Tetrachloroethane	79-34-5	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.2.3-Trichloropropane	96-18-4	5	µg/L	<5	<5	0.00	No Limit
		EP074: Pentachloroethane	76-01-7	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.2-Dibromo-3-chloropropane	96-12-8	5	µg/L	<5	<5	0.00	No Limit
		EP074: Hexachlorobutadiene	87-68-3	5	µg/L	<5	<5	0.00	No Limit
		EP074: Dichlorodifluoromethane	75-71-8	50	µg/L	<50	<50	0.00	No Limit
		EP074: Chloromethane	74-87-3	50	µg/L	<50	<50	0.00	No Limit
		EP074: Vinyl chloride	75-01-4	50	µg/L	<50	<50	0.00	No Limit
		EP074: Bromomethane	74-83-9	50	µg/L	<50	<50	0.00	No Limit
		EP074: Chloroethane	75-00-3	50	µg/L	<50	<50	0.00	No Limit
		EP074: Trichlorofluoromethane	75-69-4	50	µg/L	<50	<50	0.00	No Limit
EP074F: Halogenated Aromatic Compounds (QC Lot: 2131567)									
ES1900690-001	MW01	EP074: Chlorobenzene	108-90-7	5	µg/L	<5	<5	0.00	No Limit
		EP074: Bromobenzene	108-86-1	5	µg/L	<5	<5	0.00	No Limit
		EP074: 2-Chlorotoluene	95-49-8	5	µg/L	<5	<5	0.00	No Limit
		EP074: 4-Chlorotoluene	106-43-4	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.3-Dichlorobenzene	541-73-1	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.4-Dichlorobenzene	106-46-7	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.2-Dichlorobenzene	95-50-1	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.2.4-Trichlorobenzene	120-82-1	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.2.3-Trichlorobenzene	87-61-6	5	µg/L	<5	<5	0.00	No Limit
ES1900690-009	EB	EP074: Chlorobenzene	108-90-7	5	µg/L	<5	<5	0.00	No Limit
		EP074: Bromobenzene	108-86-1	5	µg/L	<5	<5	0.00	No Limit
		EP074: 2-Chlorotoluene	95-49-8	5	µg/L	<5	<5	0.00	No Limit

Sub-Matrix: **WATER**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP074F: Halogenated Aromatic Compounds (QC Lot: 2131567) - continued									
ES1900690-009	EB	EP074: 4-Chlorotoluene	106-43-4	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.3-Dichlorobenzene	541-73-1	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.4-Dichlorobenzene	106-46-7	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.2-Dichlorobenzene	95-50-1	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.2.4-Trichlorobenzene	120-82-1	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.2.3-Trichlorobenzene	87-61-6	5	µg/L	<5	<5	0.00	No Limit
EP074G: Trihalomethanes (QC Lot: 2131567)									
ES1900690-001	MW01	EP074: Chloroform	67-66-3	5	µg/L	<5	<5	0.00	No Limit
		EP074: Bromodichloromethane	75-27-4	5	µg/L	<5	<5	0.00	No Limit
		EP074: Dibromochloromethane	124-48-1	5	µg/L	<5	<5	0.00	No Limit
		EP074: Bromoform	75-25-2	5	µg/L	<5	<5	0.00	No Limit
ES1900690-009	EB	EP074: Chloroform	67-66-3	5	µg/L	<5	<5	0.00	No Limit
		EP074: Bromodichloromethane	75-27-4	5	µg/L	<5	<5	0.00	No Limit
		EP074: Dibromochloromethane	124-48-1	5	µg/L	<5	<5	0.00	No Limit
		EP074: Bromoform	75-25-2	5	µg/L	<5	<5	0.00	No Limit
EP074H: Naphthalene (QC Lot: 2131567)									
ES1900690-001	MW01	EP074: Naphthalene	91-20-3	5	µg/L	<5	<5	0.00	No Limit
ES1900690-009	EB	EP074: Naphthalene	91-20-3	5	µg/L	<5	<5	0.00	No Limit
EP080/071: Total Petroleum Hydrocarbons (QC Lot: 2131566)									
ES1900690-001	MW01	EP080: C6 - C9 Fraction	----	20	µg/L	<20	<20	0.00	No Limit
ES1900690-009	EB	EP080: C6 - C9 Fraction	----	20	µg/L	<20	<20	0.00	No Limit
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QC Lot: 2131566)									
ES1900690-001	MW01	EP080: C6 - C10 Fraction	C6_C10	20	µg/L	<20	<20	0.00	No Limit
ES1900690-009	EB	EP080: C6 - C10 Fraction	C6_C10	20	µg/L	<20	<20	0.00	No Limit
EP080: BTEXN (QC Lot: 2131566)									
ES1900690-001	MW01	EP080: Naphthalene	91-20-3	5	µg/L	<5	<5	0.00	No Limit
ES1900690-009	EB	EP080: Naphthalene	91-20-3	5	µg/L	<5	<5	0.00	No Limit
EP231A: Perfluoroalkyl Sulfonic Acids (QC Lot: 2131272)									
ES1900690-001	MW01	EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	0.03	0.03	0.00	No Limit
		EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	<0.02	0.00	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	<0.02	0.00	No Limit
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.02	µg/L	<0.02	<0.02	0.00	No Limit
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	<0.02	0.00	No Limit
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	0.00	No Limit
EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 2131272)									
ES1900690-001	MW01	EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	<0.01	0.00	No Limit
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	0.00	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	<0.02	0.00	No Limit
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	0.00	No Limit

Sub-Matrix: **WATER**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 2131272) - continued									
ES1900690-001	MW01	EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	<0.02	0.00	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	0.00	No Limit
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	0.00	No Limit
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	0.00	No Limit
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	0.00	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	0.00	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	0.00	No Limit
EP231C: Perfluoroalkyl Sulfonamides (QC Lot: 2131272)									
ES1900690-001	MW01	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	0.00	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	0.00	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	0.00	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	0.00	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	0.00	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	0.00	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	0.00	No Limit
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QC Lot: 2131272)									
ES1900690-001	MW01	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	0.00	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	0.00	No Limit
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	0.00	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	0.00	No Limit
EP231P: PFAS Sums (QC Lot: 2131272)									
ES1900690-001	MW01	EP231X: Sum of PFAS	----	0.01	µg/L	0.03	0.03	0.00	No Limit

Method Blank (MB) and Laboratory Control Spike (LCS) Report

The quality control term Method / Laboratory Blank refers to an analyte free matrix to which all reagents are added in the same volumes or proportions as used in standard sample preparation. The purpose of this QC parameter is to monitor potential laboratory contamination. The quality control term Laboratory Control Spike (LCS) refers to a certified reference material, or a known interference free matrix spiked with target analytes. The purpose of this QC parameter is to monitor method precision and accuracy independent of sample matrix. Dynamic Recovery Limits are based on statistical evaluation of processed LCS.

Sub-Matrix: **WATER**

				Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
Method: Compound	CAS Number	LOR	Unit	Result	Concentration	LCS	Low	High
EG020F: Dissolved Metals by ICP-MS (QCLot: 2133748)								
EG020A-F: Arsenic	7440-38-2	0.001	mg/L	<0.001	0.1 mg/L	97.9	85	114
EG020A-F: Cadmium	7440-43-9	0.0001	mg/L	<0.0001	0.1 mg/L	94.2	84	110
EG020A-F: Chromium	7440-47-3	0.001	mg/L	<0.001	0.1 mg/L	100	85	111
EG020A-F: Copper	7440-50-8	0.001	mg/L	<0.001	0.1 mg/L	96.2	81	111
EG020A-F: Lead	7439-92-1	0.001	mg/L	<0.001	0.1 mg/L	94.8	83	111
EG020A-F: Nickel	7440-02-0	0.001	mg/L	<0.001	0.1 mg/L	100	82	112
EG020A-F: Zinc	7440-66-6	0.005	mg/L	<0.005	0.1 mg/L	95.1	81	117
EG035F: Dissolved Mercury by FIMS (QCLot: 2133749)								
EG035F: Mercury	7439-97-6	0.0001	mg/L	<0.0001	0.01 mg/L	96.1	83	105
EK055G: Ammonia as N by Discrete Analyser (QCLot: 2130613)								
EK055G: Ammonia as N	7664-41-7	0.01	mg/L	<0.01	1 mg/L	102	90	114
EP074A: Monocyclic Aromatic Hydrocarbons (QCLot: 2131567)								
EP074: Benzene	71-43-2	1	µg/L	<1	10 µg/L	99.7	77	119
EP074: Toluene	108-88-3	2	µg/L	<2	10 µg/L	97.9	69	129
EP074: Ethylbenzene	100-41-4	2	µg/L	<2	10 µg/L	102	76	118
EP074: meta- & para-Xylene	108-38-3 106-42-3	2	µg/L	<2	20 µg/L	100	77	119
EP074: Styrene	100-42-5	5	µg/L	<5	10 µg/L	98.9	73	119
EP074: ortho-Xylene	95-47-6	2	µg/L	<2	10 µg/L	101	79	117
EP074: Isopropylbenzene	98-82-8	5	µg/L	<5	10 µg/L	101	76	118
EP074: n-Propylbenzene	103-65-1	5	µg/L	<5	10 µg/L	98.0	69	119
EP074: 1.3.5-Trimethylbenzene	108-67-8	5	µg/L	<5	10 µg/L	96.0	74	116
EP074: sec-Butylbenzene	135-98-8	5	µg/L	<5	10 µg/L	95.3	73	119
EP074: 1.2.4-Trimethylbenzene	95-63-6	5	µg/L	<5	10 µg/L	96.4	74	116
EP074: tert-Butylbenzene	98-06-6	5	µg/L	<5	10 µg/L	97.0	72	116
EP074: p-Isopropyltoluene	99-87-6	5	µg/L	<5	10 µg/L	89.4	71	119
EP074: n-Butylbenzene	104-51-8	5	µg/L	<5	10 µg/L	91.8	65	123
EP074B: Oxygenated Compounds (QCLot: 2131567)								
EP074: Vinyl Acetate	108-05-4	50	µg/L	<50	100 µg/L	106	61	134
EP074: 2-Butanone (MEK)	78-93-3	50	µg/L	<50	100 µg/L	109	74	130
EP074: 4-Methyl-2-pentanone (MIBK)	108-10-1	50	µg/L	<50	100 µg/L	107	66	132
EP074: 2-Hexanone (MBK)	591-78-6	50	µg/L	<50	100 µg/L	106	65	137
EP074C: Sulfonated Compounds (QCLot: 2131567)								
EP074: Carbon disulfide	75-15-0	5	µg/L	<5	10 µg/L	99.2	73	127

Sub-Matrix: **WATER**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP074D: Fumigants (QCLot: 2131567)								
EP074: 2.2-Dichloropropane	594-20-7	5	µg/L	<5	10 µg/L	97.2	68	122
EP074: 1.2-Dichloropropane	78-87-5	5	µg/L	<5	10 µg/L	104	76	118
EP074: cis-1.3-Dichloropropylene	10061-01-5	5	µg/L	<5	10 µg/L	104	62	120
EP074: trans-1.3-Dichloropropylene	10061-02-6	5	µg/L	<5	10 µg/L	103	60	114
EP074: 1.2-Dibromoethane (EDB)	106-93-4	5	µg/L	<5	10 µg/L	106	69	117
EP074E: Halogenated Aliphatic Compounds (QCLot: 2131567)								
EP074: Dichlorodifluoromethane	75-71-8	50	µg/L	<50	100 µg/L	78.7	61	138
EP074: Chloromethane	74-87-3	50	µg/L	<50	100 µg/L	97.6	67	130
EP074: Vinyl chloride	75-01-4	50	µg/L	<50	100 µg/L	101	69	129
EP074: Bromomethane	74-83-9	50	µg/L	<50	100 µg/L	99.8	56	140
EP074: Chloroethane	75-00-3	50	µg/L	<50	100 µg/L	104	61	139
EP074: Trichlorofluoromethane	75-69-4	50	µg/L	<50	100 µg/L	96.1	69	131
EP074: 1.1-Dichloroethene	75-35-4	5	µg/L	<5	10 µg/L	98.1	70	124
EP074: Iodomethane	74-88-4	5	µg/L	<5	10 µg/L	79.1	70	128
EP074: trans-1.2-Dichloroethene	156-60-5	5	µg/L	<5	10 µg/L	98.3	74	118
EP074: 1.1-Dichloroethane	75-34-3	5	µg/L	<5	10 µg/L	105	74	120
EP074: cis-1.2-Dichloroethene	156-59-2	5	µg/L	<5	10 µg/L	103	77	119
EP074: 1.1.1-Trichloroethane	71-55-6	5	µg/L	<5	10 µg/L	98.5	67	119
EP074: 1.1-Dichloropropylene	563-58-6	5	µg/L	<5	10 µg/L	99.0	73	119
EP074: Carbon Tetrachloride	56-23-5	5	µg/L	<5	10 µg/L	97.2	62	120
EP074: 1.2-Dichloroethane	107-06-2	5	µg/L	<5	10 µg/L	107	73	123
EP074: Trichloroethene	79-01-6	5	µg/L	<5	10 µg/L	97.2	76	118
EP074: Dibromomethane	74-95-3	5	µg/L	<5	10 µg/L	102	73	119
EP074: 1.1.2-Trichloroethane	79-00-5	5	µg/L	<5	10 µg/L	104	72	126
EP074: 1.3-Dichloropropane	142-28-9	5	µg/L	<5	10 µg/L	104	71	129
EP074: Tetrachloroethene	127-18-4	5	µg/L	<5	10 µg/L	97.0	72	124
EP074: 1.1.1.2-Tetrachloroethane	630-20-6	5	µg/L	<5	10 µg/L	102	66	114
EP074: trans-1.4-Dichloro-2-butene	110-57-6	5	µg/L	<5	10 µg/L	103	60	120
EP074: cis-1.4-Dichloro-2-butene	1476-11-5	5	µg/L	<5	10 µg/L	99.3	71	128
EP074: 1.1.2.2-Tetrachloroethane	79-34-5	5	µg/L	<5	10 µg/L	107	70	124
EP074: 1.2.3-Trichloropropane	96-18-4	5	µg/L	<5	10 µg/L	108	74	126
EP074: Pentachloroethane	76-01-7	5	µg/L	<5	10 µg/L	102	72	126
EP074: 1.2-Dibromo-3-chloropropane	96-12-8	5	µg/L	<5	10 µg/L	103	66	136
EP074: Hexachlorobutadiene	87-68-3	5	µg/L	<5	10 µg/L	91.1	58	130
EP074F: Halogenated Aromatic Compounds (QCLot: 2131567)								
EP074: Chlorobenzene	108-90-7	5	µg/L	<5	10 µg/L	102	79	117
EP074: Bromobenzene	108-86-1	5	µg/L	<5	10 µg/L	101	76	116
EP074: 2-Chlorotoluene	95-49-8	5	µg/L	<5	10 µg/L	101	73	119
EP074: 4-Chlorotoluene	106-43-4	5	µg/L	<5	10 µg/L	98.4	73	119

Sub-Matrix: **WATER**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP074F: Halogenated Aromatic Compounds (QCLot: 2131567) - continued								
EP074: 1.3-Dichlorobenzene	541-73-1	5	µg/L	<5	10 µg/L	97.4	75	117
EP074: 1.4-Dichlorobenzene	106-46-7	5	µg/L	<5	10 µg/L	93.5	74	118
EP074: 1.2-Dichlorobenzene	95-50-1	5	µg/L	<5	10 µg/L	97.1	75	117
EP074: 1.2.4-Trichlorobenzene	120-82-1	5	µg/L	<5	10 µg/L	102	61	125
EP074: 1.2.3-Trichlorobenzene	87-61-6	5	µg/L	<5	10 µg/L	102	67	123
EP074G: Trihalomethanes (QCLot: 2131567)								
EP074: Chloroform	67-66-3	5	µg/L	<5	10 µg/L	104	72	120
EP074: Bromodichloromethane	75-27-4	5	µg/L	<5	10 µg/L	100	64	118
EP074: Dibromochloromethane	124-48-1	5	µg/L	<5	10 µg/L	100	65	115
EP074: Bromoform	75-25-2	5	µg/L	<5	10 µg/L	103	74	126
EP074H: Naphthalene (QCLot: 2131567)								
EP074: Naphthalene	91-20-3	5	µg/L	<5	10 µg/L	104	72	122
EP075A: Phenolic Compounds (QCLot: 2130614)								
EP075: Phenol	108-95-2	2	µg/L	<2	10 µg/L	42.4	26	64
EP075: 2-Chlorophenol	95-57-8	2	µg/L	<2	10 µg/L	60.8	52	88
EP075: 2-Methylphenol	95-48-7	2	µg/L	<2	10 µg/L	54.4	50	94
EP075: 3- & 4-Methylphenol	1319-77-3	2	µg/L	<2	10 µg/L	52.5	45	96
EP075: 2-Nitrophenol	88-75-5	2	µg/L	<2	10 µg/L	63.7	48	98
EP075: 2.4-Dimethylphenol	105-67-9	2	µg/L	<2	10 µg/L	63.2	50	94
EP075: 2.4-Dichlorophenol	120-83-2	2	µg/L	<2	10 µg/L	69.2	62	109
EP075: 2.6-Dichlorophenol	87-65-0	2	µg/L	<2	10 µg/L	68.7	62	108
EP075: 4-Chloro-3-methylphenol	59-50-7	2	µg/L	<2	10 µg/L	75.6	61	107
EP075: 2.4.6-Trichlorophenol	88-06-2	2	µg/L	<2	10 µg/L	74.5	58	112
EP075: 2.4.5-Trichlorophenol	95-95-4	2	µg/L	<2	10 µg/L	77.8	58	110
EP075: Pentachlorophenol	87-86-5	4	µg/L	<4	20 µg/L	74.6	13	95
EP075B: Polynuclear Aromatic Hydrocarbons (QCLot: 2130614)								
EP075: Naphthalene	91-20-3	2	µg/L	<2	10 µg/L	66.8	51	95
EP075: 2-Methylnaphthalene	91-57-6	2	µg/L	<2	10 µg/L	71.2	59	108
EP075: 2-Chloronaphthalene	91-58-7	2	µg/L	<2	10 µg/L	75.8	61	106
EP075: Acenaphthylene	208-96-8	2	µg/L	<2	10 µg/L	75.6	64	108
EP075: Acenaphthene	83-32-9	2	µg/L	<2	10 µg/L	77.6	65	108
EP075: Fluorene	86-73-7	2	µg/L	<2	10 µg/L	81.0	65	107
EP075: Phenanthrene	85-01-8	2	µg/L	<2	10 µg/L	84.7	67	108
EP075: Anthracene	120-12-7	2	µg/L	<2	10 µg/L	86.4	66	108
EP075: Fluoranthene	206-44-0	2	µg/L	<2	10 µg/L	88.0	65	109
EP075: Pyrene	129-00-0	2	µg/L	<2	10 µg/L	87.4	60	111
EP075: N-2-Fluorenyl Acetamide	53-96-3	2	µg/L	<2	10 µg/L	92.6	60	110
EP075: Benz(a)anthracene	56-55-3	2	µg/L	<2	10 µg/L	88.5	62	112

Sub-Matrix: **WATER**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP075B: Polynuclear Aromatic Hydrocarbons (QCLot: 2130614) - continued								
EP075: Chrysene	218-01-9	2	µg/L	<2	10 µg/L	85.7	59	114
EP075: Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	4	µg/L	<4	20 µg/L	87.9	60	111
EP075: 7.12-Dimethylbenz(a)anthracene	57-97-6	2	µg/L	<2	10 µg/L	88.5	50	108
EP075: Benzo(a)pyrene	50-32-8	2	µg/L	<2	10 µg/L	89.7	59	112
EP075: 3-Methylcholanthrene	56-49-5	2	µg/L	<2	10 µg/L	89.4	60	110
EP075: Indeno(1.2.3.cd)pyrene	193-39-5	2	µg/L	<2	10 µg/L	90.1	60	110
EP075: Dibenz(a.h)anthracene	53-70-3	2	µg/L	<2	10 µg/L	91.3	57	109
EP075: Benzo(g.h.i)perylene	191-24-2	2	µg/L	<2	10 µg/L	90.3	61	110
EP075: Benzo(a)pyrene TEQ (zero)	----	2	µg/L	<2	----	----	----	----
EP075C: Phthalate Esters (QCLot: 2130614)								
EP075: Dimethyl phthalate	131-11-3	2	µg/L	<2	10 µg/L	85.2	64	112
EP075: Diethyl phthalate	84-66-2	2	µg/L	<2	10 µg/L	91.9	67	111
EP075: Di-n-butyl phthalate	84-74-2	2	µg/L	<2	10 µg/L	97.4	68	122
EP075: Butyl benzyl phthalate	85-68-7	2	µg/L	<2	10 µg/L	91.0	61	114
EP075: bis(2-ethylhexyl) phthalate	117-81-7	----	µg/L	----	10 µg/L	99.8	60	132
EP075: Di-n-octylphthalate	117-84-0	2	µg/L	<2	10 µg/L	94.4	62	115
EP075D: Nitrosamines (QCLot: 2130614)								
EP075: N-Nitrosomethylethylamine	10595-95-6	2	µg/L	<2	10 µg/L	54.5	46	110
EP075: N-Nitrosodiethylamine	55-18-5	2	µg/L	<2	10 µg/L	# 60.9	61	113
EP075: N-Nitrosopyrrolidine	930-55-2	4	µg/L	<4	10 µg/L	61.5	45	91
EP075: N-Nitrosomorpholine	59-89-2	2	µg/L	<2	10 µg/L	48.7	42	100
EP075: N-Nitrosodi-n-propylamine	621-64-7	2	µg/L	<2	10 µg/L	71.8	64	108
EP075: N-Nitrosopiperidine	100-75-4	2	µg/L	<2	10 µg/L	69.7	62	107
EP075: N-Nitrosodibutylamine	924-16-3	2	µg/L	<2	10 µg/L	76.4	63	108
EP075: N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	4	µg/L	<4	20 µg/L	86.8	65	112
EP075: Methapyrilene	91-80-5	2	µg/L	<2	10 µg/L	93.2	23	125
EP075E: Nitroaromatics and Ketones (QCLot: 2130614)								
EP075: 2-Picoline	109-06-8	2	µg/L	<2	10 µg/L	# 39.2	41	109
EP075: Acetophenone	98-86-2	2	µg/L	<2	10 µg/L	70.8	68	112
EP075: Nitrobenzene	98-95-3	2	µg/L	<2	10 µg/L	73.7	68	112
EP075: Isophorone	78-59-1	2	µg/L	<2	10 µg/L	73.4	68	111
EP075: 2.6-Dinitrotoluene	606-20-2	4	µg/L	<4	10 µg/L	82.9	64	113
EP075: 2.4-Dinitrotoluene	121-14-2	4	µg/L	<4	10 µg/L	85.7	60	109
EP075: 1-Naphthylamine	134-32-7	2	µg/L	<2	10 µg/L	81.6	47	102
EP075: 4-Nitroquinoline-N-oxide	56-57-5	2	µg/L	<2	10 µg/L	76.6	40	96
EP075: 5-Nitro-o-toluidine	99-55-8	2	µg/L	<2	10 µg/L	89.2	58	106

Sub-Matrix: **WATER**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP075E: Nitroaromatics and Ketones (QCLot: 2130614) - continued								
EP075: Azobenzene	103-33-3	2	µg/L	<2	10 µg/L	86.4	66	112
EP075: 1.3.5-Trinitrobenzene	99-35-4	2	µg/L	<2	10 µg/L	80.8	46	108
EP075: Phenacetin	62-44-2	2	µg/L	<2	10 µg/L	88.5	58	101
EP075: 4-Aminobiphenyl	92-67-1	2	µg/L	<2	10 µg/L	90.2	60	112
EP075: Pentachloronitrobenzene	82-68-8	2	µg/L	<2	10 µg/L	87.4	59	109
EP075: Pronamide	23950-58-5	2	µg/L	<2	10 µg/L	89.6	63	109
EP075: Dimethylaminoazobenzene	60-11-7	2	µg/L	<2	10 µg/L	80.7	59	108
EP075: Chlorobenzilate	510-15-6	2	µg/L	<2	10 µg/L	89.6	58	110
EP075F: Haloethers (QCLot: 2130614)								
EP075: Bis(2-chloroethyl) ether	111-44-4	2	µg/L	<2	10 µg/L	# 55.4	69	112
EP075: Bis(2-chloroethoxy) methane	111-91-1	2	µg/L	<2	10 µg/L	73.7	66	111
EP075: 4-Chlorophenyl phenyl ether	7005-72-3	2	µg/L	<2	10 µg/L	80.6	65	109
EP075: 4-Bromophenyl phenyl ether	101-55-3	2	µg/L	<2	10 µg/L	80.9	62	108
EP075G: Chlorinated Hydrocarbons (QCLot: 2130614)								
EP075: 1.4-Dichlorobenzene	106-46-7	2	µg/L	<2	10 µg/L	59.5	41	97
EP075: 1.3-Dichlorobenzene	541-73-1	2	µg/L	<2	10 µg/L	56.1	40	96
EP075: 1.2-Dichlorobenzene	95-50-1	2	µg/L	<2	10 µg/L	59.3	41	95
EP075: Hexachloroethane	67-72-1	2	µg/L	<2	10 µg/L	58.6	46	88
EP075: 1.2.4-Trichlorobenzene	120-82-1	2	µg/L	<2	10 µg/L	63.5	46	96
EP075: Hexachloropropylene	1888-71-7	2	µg/L	<2	10 µg/L	64.3	34	96
EP075: Hexachlorobutadiene	87-68-3	2	µg/L	<2	10 µg/L	63.7	37	100
EP075: Hexachlorocyclopentadiene	77-47-4	10	µg/L	<10	10 µg/L	46.2	24	107
EP075: Pentachlorobenzene	608-93-5	2	µg/L	<2	10 µg/L	76.3	65	107
EP075: Hexachlorobenzene (HCB)	118-74-1	4	µg/L	<4	10 µg/L	83.3	66	110
EP075H: Anilines and Benzidines (QCLot: 2130614)								
EP075: Aniline	62-53-3	2	µg/L	<2	10 µg/L	51.8	50	104
EP075: 4-Chloroaniline	106-47-8	2	µg/L	<2	10 µg/L	72.3	42	106
EP075: 2-Nitroaniline	88-74-4	4	µg/L	<4	10 µg/L	80.6	61	110
EP075: 3-Nitroaniline	99-09-2	4	µg/L	<4	10 µg/L	87.1	52	97
EP075: Dibenzofuran	132-64-9	2	µg/L	<2	10 µg/L	78.5	65	108
EP075: 4-Nitroaniline	100-01-8	2	µg/L	<2	10 µg/L	88.5	49	100
EP075: Carbazole	86-74-8	2	µg/L	<2	10 µg/L	88.9	64	107
EP075: 3.3`-Dichlorobenzidine	91-94-1	2	µg/L	<2	10 µg/L	81.1	60	119
EP075I: Organochlorine Pesticides (QCLot: 2130614)								
EP075: alpha-BHC	319-84-6	2	µg/L	<2	10 µg/L	87.0	64	110
EP075: beta-BHC	319-85-7	2	µg/L	<2	10 µg/L	92.7	53	107
EP075: gamma-BHC	58-89-9	2	µg/L	<2	10 µg/L	87.3	51	111
EP075: delta-BHC	319-86-8	2	µg/L	<2	10 µg/L	92.0	57	111

Sub-Matrix: **WATER**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP075I: Organochlorine Pesticides (QCLot: 2130614) - continued								
EP075: Heptachlor	76-44-8	2	µg/L	<2	10 µg/L	83.6	58	108
EP075: Aldrin	309-00-2	2	µg/L	<2	10 µg/L	85.2	56	112
EP075: Heptachlor epoxide	1024-57-3	2	µg/L	<2	10 µg/L	89.0	50	118
EP075: alpha-Endosulfan	959-98-8	2	µg/L	<2	10 µg/L	93.5	59	111
EP075: 4.4`-DDE	72-55-9	2	µg/L	<2	10 µg/L	89.0	53	115
EP075: Dieldrin	60-57-1	2	µg/L	<2	10 µg/L	88.0	59	115
EP075: Endrin	72-20-8	2	µg/L	<2	10 µg/L	88.7	58	114
EP075: beta-Endosulfan	33213-65-9	2	µg/L	<2	10 µg/L	93.8	54	116
EP075: 4.4`-DDD	72-54-8	2	µg/L	<2	10 µg/L	88.4	55	115
EP075: Endosulfan sulfate	1031-07-8	2	µg/L	<2	10 µg/L	91.5	53	114
EP075: 4.4`-DDT	50-29-3	4	µg/L	<4	10 µg/L	89.2	56	114
EP075: Sum of Aldrin + Dieldrin	309-00-2/60-57-1	4	µg/L	<4	----	----	----	----
EP075: Sum of DDD + DDE + DDT	72-54-8/72-55-9/50-2	4	µg/L	<4	----	----	----	----
EP075J: Organophosphorus Pesticides (QCLot: 2130614)								
EP075: Dichlorvos	62-73-7	2	µg/L	<2	10 µg/L	83.2	51	113
EP075: Dimethoate	60-51-5	2	µg/L	<2	10 µg/L	87.8	43	109
EP075: Diazinon	333-41-5	2	µg/L	<2	10 µg/L	92.3	49	113
EP075: Chlorpyrifos-methyl	5598-13-0	2	µg/L	<2	10 µg/L	89.0	54	116
EP075: Malathion	121-75-5	2	µg/L	<2	10 µg/L	96.5	54	124
EP075: Fenthion	55-38-9	2	µg/L	<2	10 µg/L	87.3	57	115
EP075: Chlorpyrifos	2921-88-2	2	µg/L	<2	10 µg/L	90.5	53	109
EP075: Pirimphos-ethyl	23505-41-1	2	µg/L	<2	10 µg/L	92.0	55	111
EP075: Chlorfenvinphos	470-90-6	2	µg/L	<2	10 µg/L	93.1	50	116
EP075: Prothiofos	34643-46-4	2	µg/L	<2	10 µg/L	88.8	54	118
EP075: Ethion	563-12-2	2	µg/L	<2	10 µg/L	92.0	51	117
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2130615)								
EP071: C10 - C14 Fraction	----	50	µg/L	<50	2000 µg/L	97.7	76	116
EP071: C15 - C28 Fraction	----	100	µg/L	<100	3000 µg/L	94.7	83	109
EP071: C29 - C36 Fraction	----	50	µg/L	<50	2000 µg/L	98.4	75	113
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2131566)								
EP080: C6 - C9 Fraction	----	20	µg/L	<20	260 µg/L	85.7	75	127
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2130615)								
EP071: >C10 - C16 Fraction	----	100	µg/L	<100	2500 µg/L	96.7	76	114
EP071: >C16 - C34 Fraction	----	100	µg/L	<100	3500 µg/L	96.6	81	111
EP071: >C34 - C40 Fraction	----	100	µg/L	<100	1500 µg/L	98.7	77	119
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2131566)								

Sub-Matrix: **WATER**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2131566) - continued								
EP080: C6 - C10 Fraction	C6_C10	20	µg/L	<20	310 µg/L	87.4	75	127
EP080: BTEXN (QCLot: 2131566)								
EP080: Naphthalene	91-20-3	5	µg/L	<5	10 µg/L	97.5	70	120
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 2131272)								
EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	0.5 µg/L	80.0	70	130
EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	0.5 µg/L	83.2	70	130
EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.02	µg/L	<0.02	0.5 µg/L	96.0	70	130
EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	0.5 µg/L	77.6	70	130
EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	<0.01	0.5 µg/L	75.2	70	130
EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	0.5 µg/L	75.4	70	130
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 2131272)								
EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	2.5 µg/L	70.2	70	130
EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	0.5 µg/L	82.4	70	130
EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	0.5 µg/L	74.8	70	130
EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	0.5 µg/L	73.8	70	130
EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	0.5 µg/L	78.4	70	130
EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	0.5 µg/L	73.6	70	130
EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	0.5 µg/L	70.2	70	130
EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	0.5 µg/L	79.2	70	130
EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	0.5 µg/L	103	70	130
EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	0.5 µg/L	110	70	130
EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	1.25 µg/L	82.9	70	150
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 2131272)								
EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	0.5 µg/L	81.4	70	130
EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	1.25 µg/L	83.0	70	150
EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	1.25 µg/L	75.6	70	150
EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	1.25 µg/L	80.8	70	150
EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	1.25 µg/L	76.4	70	150
EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	0.5 µg/L	75.4	70	130
EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	0.5 µg/L	82.6	70	130
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 2131272)								
EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	0.5 µg/L	76.4	70	130
EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	0.5 µg/L	74.0	70	130
EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	0.5 µg/L	71.6	70	130

Sub-Matrix: **WATER**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report: Result	Laboratory Control Spike (LCS) Report: Spike Concentration	Spike Recovery (%): LCS	Recovery Limits (%): Low	Recovery Limits (%): High
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 2131272) - continued								
EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	0.5 µg/L	86.2	70	130

Matrix Spike (MS) Report

The quality control term Matrix Spike (MS) refers to an intralaboratory split sample spiked with a representative set of target analytes. The purpose of this QC parameter is to monitor potential matrix effects on analyte recoveries. Static Recovery Limits as per laboratory Data Quality Objectives (DQOs). Ideal recovery ranges stated may be waived in the event of sample matrix interference.

Sub-Matrix: **WATER**

Laboratory sample ID	Client sample ID	Method: Compound	CAS Number	Matrix Spike (MS) Report: Spike Concentration	SpikeRecovery(%): MS	Recovery Limits (%): Low	Recovery Limits (%): High
EG020F: Dissolved Metals by ICP-MS (QCLot: 2133748)							
ES1900690-002	MW02	EG020A-F: Arsenic	7440-38-2	1 mg/L	95.9	70	130
		EG020A-F: Cadmium	7440-43-9	0.25 mg/L	95.5	70	130
		EG020A-F: Chromium	7440-47-3	1 mg/L	101	70	130
		EG020A-F: Copper	7440-50-8	1 mg/L	96.5	70	130
		EG020A-F: Lead	7439-92-1	1 mg/L	99.3	70	130
		EG020A-F: Nickel	7440-02-0	1 mg/L	96.1	70	130
		EG020A-F: Zinc	7440-66-6	1 mg/L	92.1	70	130
EG035F: Dissolved Mercury by FIMS (QCLot: 2133749)							
ES1900690-001	MW01	EG035F: Mercury	7439-97-6	0.01 mg/L	93.6	70	130
EK055G: Ammonia as N by Discrete Analyser (QCLot: 2130613)							
ES1900661-003	Anonymous	EK055G: Ammonia as N	7664-41-7	1 mg/L	84.6	70	130
EP074A: Monocyclic Aromatic Hydrocarbons (QCLot: 2131567)							
ES1900690-001	MW01	EP074: Benzene	71-43-2	25 µg/L	105	70	130
		EP074: Toluene	108-88-3	25 µg/L	99.1	70	130
EP074E: Halogenated Aliphatic Compounds (QCLot: 2131567)							
ES1900690-001	MW01	EP074: 1.1-Dichloroethene	75-35-4	25 µg/L	102	70	130
		EP074: Trichloroethene	79-01-6	25 µg/L	100	70	130
EP074F: Halogenated Aromatic Compounds (QCLot: 2131567)							
ES1900690-001	MW01	EP074: Chlorobenzene	108-90-7	25 µg/L	101	70	130
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2131566)							
ES1900690-001	MW01	EP080: C6 - C9 Fraction	----	325 µg/L	87.5	70	130
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2131566)							
ES1900690-001	MW01	EP080: C6 - C10 Fraction	C6_C10	375 µg/L	88.3	70	130
EP080: BTEXN (QCLot: 2131566)							
ES1900690-001	MW01	EP080: Naphthalene	91-20-3	25 µg/L	97.5	70	130
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 2131272)							

Sub-Matrix: **WATER**

				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Recovery Limits (%)	
Laboratory sample ID	Client sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 2131272) - continued							
ES1900690-001	MW01	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.5 µg/L	89.4	50	130
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.5 µg/L	68.8	50	130
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.5 µg/L	99.2	50	130
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.5 µg/L	104	50	130
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.5 µg/L	97.4	50	130
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.5 µg/L	117	50	130
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 2131272)							
ES1900690-001	MW01	EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	2.5 µg/L	53.2	50	130
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.5 µg/L	118	50	130
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.5 µg/L	78.6	50	130
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.5 µg/L	112	50	130
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.5 µg/L	113	50	130
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.5 µg/L	91.4	50	130
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.5 µg/L	75.2	50	130
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.5 µg/L	99.4	50	130
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.5 µg/L	93.8	50	130
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.5 µg/L	89.8	50	130
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	1.25 µg/L	103	50	150
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 2131272)							
ES1900690-001	MW01	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.5 µg/L	103	50	130
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	1.25 µg/L	106	50	150
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	1.25 µg/L	96.2	50	150
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	1.25 µg/L	81.6	50	150
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	1.25 µg/L	89.7	50	150
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.5 µg/L	78.4	50	130
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.5 µg/L	108	50	130
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 2131272)							
ES1900690-001	MW01	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.5 µg/L	119	50	130
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.5 µg/L	83.0	50	130
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.5 µg/L	80.6	50	130
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.5 µg/L	73.2	50	130

ALS Environmental

QA/QC Compliance Assessment to assist with Quality Review

Work Order	: **ES1900690**	Page	: 1 of 10
Client	: **ARCADIS AUSTRALIA PACIFIC PTY LTD**	Laboratory	: Environmental Division Sydney
Contact	: MR DEAN STAFFORD	Telephone	: +6138549 9644
Project	: King St North Carpark	Date Samples Received	: 10-Jan-2019
Site	: ----	Issue Date	: 16-Jan-2019
Sampler	: TOM KEATLEY	No. of samples received	: 9
Order number	: 10026439.1	No. of samples analysed	: 9

This report is automatically generated by the ALS LIMS through interpretation of the ALS Quality Control Report and several Quality Assurance parameters measured by ALS. This automated reporting highlights any non-conformances, facilitates faster and more accurate data validation and is designed to assist internal expert and external Auditor review. Many components of this report contribute to the overall DQO assessment and reporting for guideline compliance.

Brief method summaries and references are also provided to assist in traceability.

Summary of Outliers

Outliers : Quality Control Samples

This report highlights outliers flagged in the Quality Control (QC) Report.

- **NO Method Blank value outliers occur.**
- **NO Duplicate outliers occur.**
- **NO Matrix Spike outliers occur.**
- **Laboratory Control outliers exist - please see following pages for full details.**
- **For all regular sample matrices, NO surrogate recovery outliers occur.**

Outliers : Analysis Holding Time Compliance

- **NO Analysis Holding Time Outliers exist.**

Outliers : Frequency of Quality Control Samples

- **Quality Control Sample Frequency Outliers exist - please see following pages for full details.**

Outliers : Quality Control Samples

Duplicates, Method Blanks, Laboratory Control Samples and Matrix Spikes

Matrix: **WATER**

Compound Group Name	Laboratory Sample ID	Client Sample ID	Analyte	CAS Number	Data	Limits	Comment
Laboratory Control Spike (LCS) Recoveries							
EP075D: Nitrosamines	QC-2130614-002	----	**N-Nitrosodiethylamine**	55-18-5	60.9 %	61-113%	**Recovery less than lower control limit**
EP075E: Nitroaromatics and Ketones	QC-2130614-002	----	**2-Picoline**	109-06-8	39.2 %	41-109%	**Recovery less than lower control limit**
EP075F: Haloethers	QC-2130614-002	----	**Bis(2-chloroethyl) ether**	111-44-4	55.4 %	69-112%	**Recovery less than lower control limit**

Outliers : Frequency of Quality Control Samples

Matrix: **WATER**

Quality Control Sample Type / Method	Count QC	Count Regular	Rate (%) Actual	Rate (%) Expected	Quality Control Specification
Laboratory Duplicates (DUP)					
Semivolatile Organic Compounds	0	8	0.00	10.00	NEPM 2013 B3 & ALS QC Standard
TRH - Semivolatile Fraction	0	8	0.00	10.00	NEPM 2013 B3 & ALS QC Standard
Matrix Spikes (MS)					
Semivolatile Organic Compounds	0	8	0.00	5.00	NEPM 2013 B3 & ALS QC Standard
TRH - Semivolatile Fraction	0	8	0.00	5.00	NEPM 2013 B3 & ALS QC Standard

Analysis Holding Time Compliance

If samples are identified below as having been analysed or extracted outside of recommended holding times, this should be taken into consideration when interpreting results.

This report summarizes extraction / preparation and analysis times and compares each with ALS recommended holding times (referencing USEPA SW 846, APHA, AS and NEPM) based on the sample container provided. Dates reported represent first date of extraction or analysis and preclude subsequent dilutions and reruns. A listing of breaches (if any) is provided herein.

Holding time for leachate methods (e.g. TCLP) vary according to the analytes reported. Assessment compares the leach date with the shortest analyte holding time for the equivalent soil method. These are: organics 14 days, mercury 28 days & other metals 180 days. A recorded breach does not guarantee a breach for all non-volatile parameters.

Holding times for ***VOC in soils*** vary according to analytes of interest. Vinyl Chloride and Styrene holding time is 7 days; others 14 days. A recorded breach does not guarantee a breach for all VOC analytes and should be verified in case the reported breach is a false positive or Vinyl Chloride and Styrene are not key analytes of interest/concern.

Matrix: **WATER**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation: Date extracted	Extraction / Preparation: Due for extraction	Extraction / Preparation: Evaluation	Analysis: Date analysed	Analysis: Due for analysis	Analysis: Evaluation
EG020F: Dissolved Metals by ICP-MS							
Clear Plastic Bottle - Nitric Acid; Filtered (EG020A-F)							
MW01, MW02, MW03, MW04, MW05, MW06, MW07, DUP	**08-Jan-2019**	**----**	----	----	**14-Jan-2019**	07-Jul-2019	✓
EG035F: Dissolved Mercury by FIMS							
Clear Plastic Bottle - Nitric Acid; Filtered (EG035F)							
MW01, MW02, MW03, MW04, MW05, MW06, MW07, DUP	**08-Jan-2019**	**----**	----	----	**14-Jan-2019**	05-Feb-2019	✓

Matrix: **WATER**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EK055G: Ammonia as N by Discrete Analyser							
Clear Plastic Bottle - Sulfuric Acid (EK055G)							
MW01, MW02, MW03, MW04, MW05, MW06, MW07, DUP	**08-Jan-2019**	**----**	----	----	**10-Jan-2019**	05-Feb-2019	✓
EP074A: Monocyclic Aromatic Hydrocarbons							
Amber VOC Vial - Sulfuric Acid (EP074)							
MW01, MW02, MW03, MW04, MW05, MW06, MW07, DUP, EB	**08-Jan-2019**	**11-Jan-2019**	22-Jan-2019	✓	**11-Jan-2019**	22-Jan-2019	✓
EP074B: Oxygenated Compounds							
Amber VOC Vial - Sulfuric Acid (EP074)							
MW01, MW02, MW03, MW04, MW05, MW06, MW07, DUP, EB	**08-Jan-2019**	**11-Jan-2019**	22-Jan-2019	✓	**11-Jan-2019**	22-Jan-2019	✓
EP074C: Sulfonated Compounds							
Amber VOC Vial - Sulfuric Acid (EP074)							
MW01, MW02, MW03, MW04, MW05, MW06, MW07, DUP, EB	**08-Jan-2019**	**11-Jan-2019**	22-Jan-2019	✓	**11-Jan-2019**	22-Jan-2019	✓
EP074D: Fumigants							
Amber VOC Vial - Sulfuric Acid (EP074)							
MW01, MW02, MW03, MW04, MW05, MW06, MW07, DUP, EB	**08-Jan-2019**	**11-Jan-2019**	22-Jan-2019	✓	**11-Jan-2019**	22-Jan-2019	✓
EP074E: Halogenated Aliphatic Compounds							
Amber VOC Vial - Sulfuric Acid (EP074)							
MW01, MW02, MW03, MW04, MW05, MW06, MW07, DUP, EB	**08-Jan-2019**	**11-Jan-2019**	22-Jan-2019	✓	**11-Jan-2019**	22-Jan-2019	✓

Matrix: **WATER**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP074F: Halogenated Aromatic Compounds							
Amber VOC Vial - Sulfuric Acid (EP074)							
MW01, MW02, MW03, MW04, MW05, MW06, MW07, DUP, EB	**08-Jan-2019**	**11-Jan-2019**	22-Jan-2019	✓	**11-Jan-2019**	22-Jan-2019	✓
EP074G: Trihalomethanes							
Amber VOC Vial - Sulfuric Acid (EP074)							
MW01, MW02, MW03, MW04, MW05, MW06, MW07, DUP, EB	**08-Jan-2019**	**11-Jan-2019**	22-Jan-2019	✓	**11-Jan-2019**	22-Jan-2019	✓
EP074H: Naphthalene							
Amber VOC Vial - Sulfuric Acid (EP074)							
EB	**08-Jan-2019**	**11-Jan-2019**	22-Jan-2019	✓	**11-Jan-2019**	22-Jan-2019	✓
EP075A: Phenolic Compounds							
Amber Glass Bottle - Unpreserved (EP075)							
MW01, MW02, MW03, MW04, MW05, MW06, MW07, DUP	**08-Jan-2019**	**11-Jan-2019**	15-Jan-2019	✓	**11-Jan-2019**	20-Feb-2019	✓
EP075B: Polynuclear Aromatic Hydrocarbons							
Amber Glass Bottle - Unpreserved (EP075)							
MW01, MW02, MW03, MW04, MW05, MW06, MW07, DUP	**08-Jan-2019**	**11-Jan-2019**	15-Jan-2019	✓	**11-Jan-2019**	20-Feb-2019	✓
EP075C: Phthalate Esters							
Amber Glass Bottle - Unpreserved (EP075)							
MW01, MW02, MW03, MW04, MW05, MW06, MW07, DUP	**08-Jan-2019**	**11-Jan-2019**	15-Jan-2019	✓	**11-Jan-2019**	20-Feb-2019	✓
EP075D: Nitrosamines							
Amber Glass Bottle - Unpreserved (EP075)							
MW01, MW02, MW03, MW04, MW05, MW06, MW07, DUP	**08-Jan-2019**	**11-Jan-2019**	15-Jan-2019	✓	**11-Jan-2019**	20-Feb-2019	✓

Matrix: **WATER**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP075E: Nitroaromatics and Ketones							
Amber Glass Bottle - Unpreserved (EP075)							
MW01, MW02, MW03, MW04, MW05, MW06, MW07, DUP	**08-Jan-2019**	**11-Jan-2019**	15-Jan-2019	✓	**11-Jan-2019**	20-Feb-2019	✓
EP075F: Haloethers							
Amber Glass Bottle - Unpreserved (EP075)							
MW01, MW02, MW03, MW04, MW05, MW06, MW07, DUP	**08-Jan-2019**	**11-Jan-2019**	15-Jan-2019	✓	**11-Jan-2019**	20-Feb-2019	✓
EP075G: Chlorinated Hydrocarbons							
Amber Glass Bottle - Unpreserved (EP075)							
MW01, MW02, MW03, MW04, MW05, MW06, MW07, DUP	**08-Jan-2019**	**11-Jan-2019**	15-Jan-2019	✓	**11-Jan-2019**	20-Feb-2019	✓
EP075H: Anilines and Benzidines							
Amber Glass Bottle - Unpreserved (EP075)							
MW01, MW02, MW03, MW04, MW05, MW06, MW07, DUP	**08-Jan-2019**	**11-Jan-2019**	15-Jan-2019	✓	**11-Jan-2019**	20-Feb-2019	✓
EP075I: Organochlorine Pesticides							
Amber Glass Bottle - Unpreserved (EP075)							
MW01, MW02, MW03, MW04, MW05, MW06, MW07, DUP	**08-Jan-2019**	**11-Jan-2019**	15-Jan-2019	✓	**11-Jan-2019**	20-Feb-2019	✓
EP075J: Organophosphorus Pesticides							
Amber Glass Bottle - Unpreserved (EP075)							
MW01, MW02, MW03, MW04, MW05, MW06, MW07, DUP	**08-Jan-2019**	**11-Jan-2019**	15-Jan-2019	✓	**11-Jan-2019**	20-Feb-2019	✓

Matrix: **WATER**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP080/071: Total Petroleum Hydrocarbons							
Amber Glass Bottle - Unpreserved (EP071)							
MW01, MW02, MW03, MW04, MW05, MW06, MW07, DUP	**08-Jan-2019**	**11-Jan-2019**	15-Jan-2019	✓	**11-Jan-2019**	20-Feb-2019	✓
Amber VOC Vial - Sulfuric Acid (EP080)							
MW01, MW02, MW03, MW04, MW05, MW06, MW07, DUP	**08-Jan-2019**	**11-Jan-2019**	22-Jan-2019	✓	**11-Jan-2019**	22-Jan-2019	✓
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions							
Amber Glass Bottle - Unpreserved (EP071)							
MW01, MW02, MW03, MW04, MW05, MW06, MW07, DUP	**08-Jan-2019**	**11-Jan-2019**	15-Jan-2019	✓	**11-Jan-2019**	20-Feb-2019	✓
Amber VOC Vial - Sulfuric Acid (EP080)							
MW01, MW02, MW03, MW04, MW05, MW06, MW07, DUP	**08-Jan-2019**	**11-Jan-2019**	22-Jan-2019	✓	**11-Jan-2019**	22-Jan-2019	✓
EP080: BTEXN							
Amber VOC Vial - Sulfuric Acid (EP080)							
MW01, MW02, MW03, MW04, MW05, MW06, MW07, DUP, EB	**08-Jan-2019**	**11-Jan-2019**	22-Jan-2019	✓	**11-Jan-2019**	22-Jan-2019	✓
EP231A: Perfluoroalkyl Sulfonic Acids							
HDPE (no PTFE) (EP231X)							
MW01, MW02, MW03, MW04, MW05, MW06, MW07, DUP	**08-Jan-2019**	**11-Jan-2019**	07-Jul-2019	✓	**11-Jan-2019**	07-Jul-2019	✓
EP231B: Perfluoroalkyl Carboxylic Acids							
HDPE (no PTFE) (EP231X)							
MW01, MW02, MW03, MW04, MW05, MW06, MW07, DUP	**08-Jan-2019**	**11-Jan-2019**	07-Jul-2019	✓	**11-Jan-2019**	07-Jul-2019	✓

Matrix: **WATER**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP231C: Perfluoroalkyl Sulfonamides							
HDPE (no PTFE) (EP231X)							
MW01, MW02, MW03, MW04, MW05, MW06, MW07, DUP	**08-Jan-2019**	**11-Jan-2019**	07-Jul-2019	✓	**11-Jan-2019**	07-Jul-2019	✓
EP231D: (n:2) Fluorotelomer Sulfonic Acids							
HDPE (no PTFE) (EP231X)							
MW01, MW02, MW03, MW04, MW05, MW06, MW07, DUP	**08-Jan-2019**	**11-Jan-2019**	07-Jul-2019	✓	**11-Jan-2019**	07-Jul-2019	✓
EP231P: PFAS Sums							
HDPE (no PTFE) (EP231X)							
MW01, MW02, MW03, MW04, MW05, MW06, MW07, DUP	**08-Jan-2019**	**11-Jan-2019**	07-Jul-2019	✓	**11-Jan-2019**	07-Jul-2019	✓

Quality Control Parameter Frequency Compliance

The following report summarises the frequency of laboratory QC samples analysed within the analytical lot(s) in which the submitted sample(s) was(were) processed. Actual rate should be greater than or equal to the expected rate. A listing of breaches is provided in the Summary of Outliers.

Matrix: **WATER**

Evaluation: × = Quality Control frequency not within specification ; ✓ = Quality Control frequency within specification.

Quality Control Sample Type		Count		Rate (%)			Quality Control Specification
Analytical Methods	*Method*	*QC*	*Regular*	***Actual***	***Expected***	*Evaluation*	
Laboratory Duplicates (DUP)							
Ammonia as N by Discrete analyser	EK055G	2	12	**16.67**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Dissolved Mercury by FIMS	EG035F	2	14	**14.29**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Dissolved Metals by ICP-MS - Suite A	EG020A-F	2	15	**13.33**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	1	8	**12.50**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Semivolatile Organic Compounds	EP075	0	8	**0.00**	**10.00**	×	NEPM 2013 B3 & ALS QC Standard
TRH - Semivolatile Fraction	EP071	0	8	**0.00**	**10.00**	×	NEPM 2013 B3 & ALS QC Standard
TRH Volatiles/BTEX	EP080	2	13	**15.38**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Volatile Organic Compounds	EP074	2	19	**10.53**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Laboratory Control Samples (LCS)							
Ammonia as N by Discrete analyser	EK055G	1	12	**8.33**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Dissolved Mercury by FIMS	EG035F	1	14	**7.14**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Dissolved Metals by ICP-MS - Suite A	EG020A-F	1	15	**6.67**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	1	8	**12.50**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Semivolatile Organic Compounds	EP075	1	8	**12.50**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH - Semivolatile Fraction	EP071	1	8	**12.50**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH Volatiles/BTEX	EP080	1	13	**7.69**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Volatile Organic Compounds	EP074	1	19	**5.26**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Method Blanks (MB)							
Ammonia as N by Discrete analyser	EK055G	1	12	**8.33**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Dissolved Mercury by FIMS	EG035F	1	14	**7.14**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Dissolved Metals by ICP-MS - Suite A	EG020A-F	1	15	**6.67**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	1	8	**12.50**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Semivolatile Organic Compounds	EP075	1	8	**12.50**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH - Semivolatile Fraction	EP071	1	8	**12.50**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH Volatiles/BTEX	EP080	1	13	**7.69**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Volatile Organic Compounds	EP074	1	19	**5.26**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Matrix Spikes (MS)							
Ammonia as N by Discrete analyser	EK055G	1	12	**8.33**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Dissolved Mercury by FIMS	EG035F	1	14	**7.14**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Dissolved Metals by ICP-MS - Suite A	EG020A-F	1	15	**6.67**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	1	8	**12.50**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Semivolatile Organic Compounds	EP075	0	8	**0.00**	**5.00**	×	NEPM 2013 B3 & ALS QC Standard
TRH - Semivolatile Fraction	EP071	0	8	**0.00**	**5.00**	×	NEPM 2013 B3 & ALS QC Standard
TRH Volatiles/BTEX	EP080	1	13	**7.69**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Volatile Organic Compounds	EP074	1	19	**5.26**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard

Brief Method Summaries

The analytical procedures used by the Environmental Division have been developed from established internationally recognized procedures such as those published by the US EPA, APHA, AS and NEPM. In house developed procedures are employed in the absence of documented standards or by client request. The following report provides brief descriptions of the analytical procedures employed for results reported in the Certificate of Analysis. Sources from which ALS methods have been developed are provided within the Method Descriptions.

Analytical Methods	Method	Matrix	Method Descriptions
Dissolved Metals by ICP-MS - Suite A	EG020A-F	WATER	In house: Referenced to APHA 3125; USEPA SW846 - 6020, ALS QWI-EN/EG020. Samples are 0.45µm filtered prior to analysis. The ICPMS technique utilizes a highly efficient argon plasma to ionize selected elements. Ions are then passed into a high vacuum mass spectrometer, which separates the analytes based on their distinct mass to charge ratios prior to their measurement by a discrete dynode ion detector.
Dissolved Mercury by FIMS	EG035F	WATER	In house: Referenced to AS 3550, APHA 3112 Hg - B (Flow-injection (SnCl2)(Cold Vapour generation) AAS) Samples are 0.45µm filtered prior to analysis. FIM-AAS is an automated flameless atomic absorption technique. A bromate/bromide reagent is used to oxidise any organic mercury compounds in the filtered sample. The ionic mercury is reduced online to atomic mercury vapour by SnCl2 which is then purged into a heated quartz cell. Quantification is by comparing absorbance against a calibration curve. This method is compliant with NEPM (2013) Schedule B(3)
Ammonia as N by Discrete analyser	EK055G	WATER	In house: Referenced to APHA 4500-NH3 G Ammonia is determined by direct colorimetry by Discrete Analyser. This method is compliant with NEPM (2013) Schedule B(3)
TRH - Semivolatile Fraction	EP071	WATER	In house: Referenced to USEPA SW 846 - 8015A The sample extract is analysed by Capillary GC/FID and quantification is by comparison against an established 5 point calibration curve of n-Alkane standards. This method is compliant with the QC requirements of NEPM (2013) Schedule B(3)
Volatile Organic Compounds	EP074	WATER	In house: Referenced to USEPA SW 846 - 8260B Water samples are directly purged prior to analysis by Capillary GC/MS and quantification is by comparison against an established 5 point calibration curve. This method is compliant with NEPM (2013) Schedule B(3)
Semivolatile Organic Compounds	EP075	WATER	In house: Referenced to USEPA SW 846 - 8270D Sample extracts are analysed by Capillary GC/MS and quantification is by comparison against an established 5 point calibration curve. This method is compliant with NEPM (2013) Schedule B(3)
TRH Volatiles/BTEX	EP080	WATER	In house: Referenced to USEPA SW 846 - 8260B Water samples are directly purged prior to analysis by Capillary GC/MS and quantification is by comparison against an established 5 point calibration curve. Alternatively, a sample is equilibrated in a headspace vial and a portion of the headspace determined by GCMS analysis. This method is compliant with the QC requirements of NEPM (2013) Schedule B(3)
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	WATER	In house: Direct injection analysis of fresh waters after dilution (1:1) with methanol. Analysis by LC-Electrospray-MS-MS, Negative Mode using MRM. Where commercially available, isotopically labelled analogues of the target analytes are used as internal standards for quantification. Where a labelled analogue is not commercially available, the internal standard with similar chemistry and the closest retention time to the target is used for quantification. The DQO for internal standard response is 50-150% of that established at initial calibration. PFOS is quantified using a certified, traceable standard consisting of linear and branched PFOS isomers. This method complies with the quality control definitions as stated in QSM 5.1. Data is reviewed in line with the DQOs as stated in QSM5.1

Preparation Methods	Method	Matrix	Method Descriptions
Preparation for PFAS in water.	EP231-PR	WATER	Method presumes direct injection without workup. Preparation includes addition of internal standard and surrogate, and filtration prior to anaylsis.

Preparation Methods	Method	Matrix	Method Descriptions
Separatory Funnel Extraction of Liquids	ORG14	WATER	In house: Referenced to USEPA SW 846 - 3510B 100 mL to 1L of sample is transferred to a separatory funnel and serially extracted three times using DCM for each extract. The resultant extracts are combined, dehydrated and concentrated for analysis. This method is compliant with NEPM (2013) Schedule B(3) . ALS default excludes sediment which may be resident in the container.
Volatiles Water Preparation	ORG16-W	WATER	A 5 mL aliquot or 5 mL of a diluted sample is added to a 40 mL VOC vial for sparging.

16/1/19

CHAIN OF CUSTODY

ALS Laboratory: please tick →

☐ADELAIDE 21 Burma Road Pooraka SA 5095 Ph: 08 8359 0890 E: adelaide@alsglobal.com
☐BRISBANE 32 Shand Street Stafford QLD 4053 Ph: 07 3243 7222 E: samples.brisbane@alsglobal.com
☐GLADSTONE 46 Callemondah Drive Clinton QLD 4680 Ph: 07 7471 5600 E: gladstone@alsglobal.com
☐MACKAY 78 Harbour Road Mackay QLD 4740 Ph: 07 4944 0177 E: mackay@alsglobal.com
☐MELBOURNE 2-4 Westall Road Springvale VIC 3171 Ph: 03 8549 9600 E: samples.melbourne@alsglobal.com
☐MUDGEE 27 Sydney Road Mudgee NSW 2850 Ph: 02 6372 6735 E: mudgee.mail@alsglobal.com
☐NEWCASTLE 5/585 Maitland Rd Mayfield West NSW 2304 Ph: 02 4014 2500 E: samples.newcastle@alsglobal.com
☐NOWRA 4/13 Geary Place North Nowra NSW 2541 Ph: 024423 2063 E: nowra@alsglobal.com
☐PERTH 10 Hod Way Malaga WA 6090 Ph: 08 9209 7655 E: samples.perth@alsglobal.com
☐SYDNEY 277-289 Woodpark Road Smithfield NSW 2164 Ph: 02 8784 8555 E: samples.sydney@alsglobal.com
☐TOWNSVILLE 14-15 Desma Court Bohle QLD 4818 Ph: 07 4796 0600 E: townsville.environmental@alsglobal.com
☐WOLLONGONG 99 Kenny Street Wollongong NSW 2500 Ph: 02 4225 3125 E: portkembla@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	**TURNAROUND REQUIREMENTS :** (Standard TAT may be longer for some tests e.g.. Ultra Trace Organics)	☒ Standard TAT **(List due date):**	**FOR LABORATORY USE ONLY (Circle)**
OFFICE: Level 16, 680 George St., Sydney, NSW 2000		☐ Non Standard or urgent TAT **(List due date):**	Custody Seal Intact? Yes No N/A
PROJECT: King St North Carpark	**ALS QUOTE NO.:**	**COC SEQUENCE NUMBER (Circle)**	Free ice / frozen ice bricks present upon receipt? Yes No N/A
ORDER NUMBER: 10026439.1		COC: 1 2 3 4 5 6 7	Random Sample Temperature on Receipt: 5.8 °C
PROJECT MANAGER: Dean Stafford	**CONTACT PH:** 0434 657 155	OF: 1 2 3 4 5 6 7	Other comment:

SAMPLER: Tom Keatley	**SAMPLER MOBILE:** 0429 948 897	**RELINQUISHED BY:**	**RECEIVED BY:**	**RELINQUISHED BY:**	**RECEIVED BY:**
COC emailed to ALS? (YES / NO)	**EDD FORMAT (or default):**	*Caitlain Regena*			mc
Email Reports to (will default to PM if no other addresses are listed):		DATE/TIME:	DATE/TIME:	DATE/TIME:	DATE/TIME:
Email Invoice to (will default to PM if no other addresses are listed):		10/01/18			10/1/19 11:00am

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)			CONTAINER INFORMATION		ANALYSIS REQUIRED including SUITES (NB. Suite Codes must be listed to attract suite price) Where **Metals** are required, specify **Total** (unfiltered bottle required) or **Dissolved** (field filtered bottle required).							Additional Information
LAB ID	SAMPLE ID	DATE / TIME	MATRIX	TYPE & PRESERVATIVE *(refer to codes below)*	TOTAL CONTAINERS	W-23 (VOC and SVOC)	TRH	8 Metals	Ammonia	PFAS (Standard)	BTEX	VOCs	Comments on likely contaminant levels, dilutions, or samples requiring specific QC analysis etc.
1	MW01	08-01-18	W			x	x	x	x	x			
2	MW02	08-01-18	W			x	x	x	x	x			
3	MW03	08-01-18	W			x	x	x	x	x			
4	MW04	08-01-18	W			x	x	x	x	x			
5	MW05	08-01-18	W			x	x	x	x	x			
6	MW06	08-01-18	W			x	x	x	x	x			
7	MW07	08-01-18	W			x	x	x	x	x			
8	DUP	08-01-18	W			x	x	x	x	x			
—	TRIP	08-01-18	W			x	x	x	x	x			Please send to Envirolab.
9	EB	10-01-18	W								x	x	
				TOTAL									

Environmental Division Sydney
Work Order Reference
ES1900690

Telephone : + 61-2-6784 8555

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass;
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

ALS Environmental

CERTIFICATE OF ANALYSIS

Work Order	: **ES1905103**	Page	: 1 of 13
Client	: **ARCADIS AUSTRALIA PACIFIC PTY LTD**	Laboratory	: Environmental Division Sydney
Contact	: MR GREG BARTLETT	Contact	: Larissa Burns
Address	: L16, 480 GEORGE STREET SYDNEY NSW 2000	Address	: 277-289 Woodpark Road Smithfield NSW Australia 2164
Telephone	: ----	Telephone	: +6138549 9644
Project	: King St North ESA	Date Samples Received	: 19-Feb-2019 13:00
Order number	: 10026439.6	Date Analysis Commenced	: 19-Feb-2019
C-O-C number	: ----	Issue Date	: 21-Feb-2019 18:11
Sampler	: CAITLAIN REGENA		
Site	: ----		
Quote number	: EN-091-18 (Primary Work Only)		
No. of samples received	: 4		
No. of samples analysed	: 4		

Accreditation No. 825
Accredited for compliance with
ISO/IEC 17025 - Testing

This report supersedes any previous report(s) with this reference. Results apply to the sample(s) as submitted. This document shall not be reproduced, except in full.

This Certificate of Analysis contains the following information:

- General Comments
- Analytical Results
- Surrogate Control Limits

Additional information pertinent to this report will be found in the following separate attachments: Quality Control Report, QA/QC Compliance Assessment to assist with Quality Review and Sample Receipt Notification.

Signatories

This document has been electronically signed by the authorized signatories below. Electronic signing is carried out in compliance with procedures specified in 21 CFR Part 11.

Signatories	*Position*	*Accreditation Category*
Dian Dao		Sydney Inorganics, Smithfield, NSW
Edwandy Fadjar	Organic Coordinator	Sydney Organics, Smithfield, NSW
Franco Lentini		Sydney Organics, Smithfield, NSW
Ivan Taylor	Analyst	Sydney Inorganics, Smithfield, NSW

General Comments

The analytical procedures used by the Environmental Division have been developed from established internationally recognized procedures such as those published by the USEPA, APHA, AS and NEPM. In house developed procedures are employed in the absence of documented standards or by client request.

Where moisture determination has been performed, results are reported on a dry weight basis.

Where a reported less than (<) result is higher than the LOR, this may be due to primary sample extract/digestate dilution and/or insufficient sample for analysis.

Where the LOR of a reported result differs from standard LOR, this may be due to high moisture content, insufficient sample (reduced weight employed) or matrix interference.

When sampling time information is not provided by the client, sampling dates are shown without a time component. In these instances, the time component has been assumed by the laboratory for processing purposes.

Where a result is required to meet compliance limits the associated uncertainty must be considered. Refer to the ALS Contact for details.

Key : CAS Number = CAS registry number from database maintained by Chemical Abstracts Services. The Chemical Abstracts Service is a division of the American Chemical Society.
LOR = Limit of reporting
^ = This result is computed from individual analyte detections at or above the level of reporting
ø = ALS is not NATA accredited for these tests.
~ = Indicates an estimated value.

- EP231X: Positive PFNA results in samples#1,#2,#3,#4 confirme by re-extraction and re-analysis.
- EP075: 'Sum of PAH' is the sum of the USEPA 16 priority PAHs
- Benzo(a)pyrene Toxicity Equivalent Quotient (TEQ) is the sum total of the concentration of the eight carcinogenic PAHs multiplied by their Toxicity Equivalence Factor (TEF) relative to Benzo(a)pyrene. TEF values are provided in brackets as follows: Benz(a)anthracene (0.1), Chrysene (0.01), Benzo(b+j) & Benzo(k)fluoranthene (0.1), Benzo(a)pyrene (1.0), Indeno(1.2.3.cd)pyrene (0.1), Dibenz(a.h)anthracene (1.0), Benzo(g.h.i)perylene (0.01). Less than LOR results for 'TEQ Zero' are treated as zero.

Analytical Results

Sub-Matrix: WATER (Matrix: WATER)				Client sample ID	MW1	MW2	MW3	MW4	----
				Client sampling date / time	19-Feb-2019 00:00	19-Feb-2019 00:00	19-Feb-2019 00:00	19-Feb-2019 00:00	----
Compound	CAS Number	LOR	Unit		ES1905103-001	ES1905103-002	ES1905103-003	ES1905103-004	--------
					Result	Result	Result	Result	----
EG020F: Dissolved Metals by ICP-MS									
Arsenic	7440-38-2	0.001	mg/L		<0.001	<0.001	<0.001	**0.004**	----
Cadmium	7440-43-9	0.0001	mg/L		<0.0001	<0.0001	<0.0001	<0.0001	----
Chromium	7440-47-3	0.001	mg/L		<0.001	**0.001**	**0.001**	**0.003**	----
Copper	7440-50-8	0.001	mg/L		<0.001	<0.001	**0.001**	<0.001	----
Nickel	7440-02-0	0.001	mg/L		<0.001	<0.001	**0.002**	**0.002**	----
Lead	7439-92-1	0.001	mg/L		<0.001	<0.001	**0.002**	<0.001	----
Zinc	7440-66-6	0.005	mg/L		<0.005	**0.006**	**0.010**	<0.005	----
EG035F: Dissolved Mercury by FIMS									
Mercury	7439-97-6	0.0001	mg/L		<0.0001	<0.0001	<0.0001	<0.0001	----
EK055G: Ammonia as N by Discrete Analyser									
Ammonia as N	7664-41-7	0.01	mg/L		**6.60**	**3.90**	**3.20**	**9.00**	----
EP074A: Monocyclic Aromatic Hydrocarbons									
Benzene	71-43-2	1	µg/L		<1	**1**	<1	<1	----
Toluene	108-88-3	2	µg/L		<2	<2	<2	<2	----
Ethylbenzene	100-41-4	2	µg/L		<2	<2	<2	<2	----
meta- & para-Xylene	108-38-3 106-42-3	2	µg/L		<2	<2	<2	<2	----
Styrene	100-42-5	5	µg/L		<5	<5	<5	<5	----
ortho-Xylene	95-47-6	2	µg/L		<2	<2	<2	<2	----
Isopropylbenzene	98-82-8	5	µg/L		<5	<5	<5	**10**	----
n-Propylbenzene	103-65-1	5	µg/L		<5	<5	<5	<5	----
1.3.5-Trimethylbenzene	108-67-8	5	µg/L		<5	<5	<5	<5	----
sec-Butylbenzene	135-98-8	5	µg/L		<5	<5	<5	<5	----
1.2.4-Trimethylbenzene	95-63-6	5	µg/L		<5	<5	<5	<5	----
tert-Butylbenzene	98-06-6	5	µg/L		<5	<5	<5	<5	----
p-Isopropyltoluene	99-87-6	5	µg/L		<5	<5	<5	<5	----
n-Butylbenzene	104-51-8	5	µg/L		<5	<5	<5	<5	----
EP074B: Oxygenated Compounds									
Vinyl Acetate	108-05-4	50	µg/L		<50	<50	<50	<50	----
2-Butanone (MEK)	78-93-3	50	µg/L		<50	<50	<50	<50	----
4-Methyl-2-pentanone (MIBK)	108-10-1	50	µg/L		<50	<50	<50	<50	----
2-Hexanone (MBK)	591-78-6	50	µg/L		<50	<50	<50	<50	----
EP074C: Sulfonated Compounds									
Carbon disulfide	75-15-0	5	µg/L		<5	<5	<5	<5	----
EP074D: Fumigants									

Analytical Results

Sub-Matrix: WATER (Matrix: WATER)				Client sample ID	MW1	MW2	MW3	MW4	----
				Client sampling date / time	19-Feb-2019 00:00	19-Feb-2019 00:00	19-Feb-2019 00:00	19-Feb-2019 00:00	----
Compound	CAS Number	LOR	Unit		ES1905103-001	ES1905103-002	ES1905103-003	ES1905103-004	--------
					Result	Result	Result	Result	----
EP074D: Fumigants - Continued									
2.2-Dichloropropane	594-20-7	5	µg/L		<5	<5	<5	<5	----
1.2-Dichloropropane	78-87-5	5	µg/L		<5	<5	<5	<5	----
cis-1.3-Dichloropropylene	10061-01-5	5	µg/L		<5	<5	<5	<5	----
trans-1.3-Dichloropropylene	10061-02-6	5	µg/L		<5	<5	<5	<5	----
1.2-Dibromoethane (EDB)	106-93-4	5	µg/L		<5	<5	<5	<5	----
EP074E: Halogenated Aliphatic Compounds									
Dichlorodifluoromethane	75-71-8	50	µg/L		<50	<50	<50	<50	----
Chloromethane	74-87-3	50	µg/L		<50	<50	<50	<50	----
Vinyl chloride	75-01-4	50	µg/L		<50	<50	<50	<50	----
Bromomethane	74-83-9	50	µg/L		<50	<50	<50	<50	----
Chloroethane	75-00-3	50	µg/L		<50	<50	<50	<50	----
Trichlorofluoromethane	75-69-4	50	µg/L		<50	<50	<50	<50	----
1.1-Dichloroethene	75-35-4	5	µg/L		<5	<5	<5	<5	----
Iodomethane	74-88-4	5	µg/L		<5	<5	<5	<5	----
trans-1.2-Dichloroethene	156-60-5	5	µg/L		<5	<5	<5	<5	----
1.1-Dichloroethane	75-34-3	5	µg/L		<5	<5	<5	<5	----
cis-1.2-Dichloroethene	156-59-2	5	µg/L		<5	<5	<5	<5	----
1.1.1-Trichloroethane	71-55-6	5	µg/L		<5	<5	<5	<5	----
1.1-Dichloropropylene	563-58-6	5	µg/L		<5	<5	<5	<5	----
Carbon Tetrachloride	56-23-5	5	µg/L		<5	<5	<5	<5	----
1.2-Dichloroethane	107-06-2	5	µg/L		<5	<5	<5	<5	----
Trichloroethene	79-01-6	5	µg/L		<5	<5	<5	<5	----
Dibromomethane	74-95-3	5	µg/L		<5	<5	<5	<5	----
1.1.2-Trichloroethane	79-00-5	5	µg/L		<5	<5	<5	<5	----
1.3-Dichloropropane	142-28-9	5	µg/L		<5	<5	<5	<5	----
Tetrachloroethene	127-18-4	5	µg/L		<5	<5	<5	<5	----
1.1.1.2-Tetrachloroethane	630-20-6	5	µg/L		<5	<5	<5	<5	----
trans-1.4-Dichloro-2-butene	110-57-6	5	µg/L		<5	<5	<5	<5	----
cis-1.4-Dichloro-2-butene	1476-11-5	5	µg/L		<5	<5	<5	<5	----
1.1.2.2-Tetrachloroethane	79-34-5	5	µg/L		<5	<5	<5	<5	----
1.2.3-Trichloropropane	96-18-4	5	µg/L		<5	<5	<5	<5	----
Pentachloroethane	76-01-7	5	µg/L		<5	<5	<5	<5	----
1.2-Dibromo-3-chloropropane	96-12-8	5	µg/L		<5	<5	<5	<5	----
EP074F: Halogenated Aromatic Compounds									

Analytical Results

Sub-Matrix: WATER (Matrix: WATER)				Client sample ID	MW1	MW2	MW3	MW4	----
				Client sampling date / time	19-Feb-2019 00:00	19-Feb-2019 00:00	19-Feb-2019 00:00	19-Feb-2019 00:00	----
Compound	CAS Number	LOR	Unit		ES1905103-001	ES1905103-002	ES1905103-003	ES1905103-004	--------
					Result	Result	Result	Result	----
EP074F: Halogenated Aromatic Compounds - Continued									
Chlorobenzene	108-90-7	5	µg/L		<5	<5	<5	<5	----
Bromobenzene	108-86-1	5	µg/L		<5	<5	<5	<5	----
2-Chlorotoluene	95-49-8	5	µg/L		<5	<5	<5	<5	----
4-Chlorotoluene	106-43-4	5	µg/L		<5	<5	<5	<5	----
1.2.3-Trichlorobenzene	87-61-6	5	µg/L		<5	<5	<5	<5	----
EP074G: Trihalomethanes									
Chloroform	67-66-3	5	µg/L		<5	<5	<5	<5	----
Bromodichloromethane	75-27-4	5	µg/L		<5	<5	<5	<5	----
Dibromochloromethane	124-48-1	5	µg/L		<5	<5	<5	<5	----
Bromoform	75-25-2	5	µg/L		<5	<5	<5	<5	----
EP075A: Phenolic Compounds									
Phenol	108-95-2	2	µg/L		<2	<2	<2	<2	----
2-Chlorophenol	95-57-8	2	µg/L		<2	<2	<2	<2	----
2-Methylphenol	95-48-7	2	µg/L		<2	<2	<2	<2	----
3- & 4-Methylphenol	1319-77-3	4	µg/L		<4	<4	<4	<4	----
2-Nitrophenol	88-75-5	2	µg/L		<2	<2	<2	<2	----
2.4-Dimethylphenol	105-67-9	2	µg/L		<2	<2	<2	<2	----
2.4-Dichlorophenol	120-83-2	2	µg/L		<2	<2	<2	<2	----
2.6-Dichlorophenol	87-65-0	2	µg/L		<2	<2	<2	<2	----
4-Chloro-3-methylphenol	59-50-7	2	µg/L		<2	<2	<2	<2	----
2.4.6-Trichlorophenol	88-06-2	2	µg/L		<2	<2	<2	<2	----
2.4.5-Trichlorophenol	95-95-4	2	µg/L		<2	<2	<2	<2	----
Pentachlorophenol	87-86-5	4	µg/L		<4	<4	<4	<4	----
EP075B: Polynuclear Aromatic Hydrocarbons									
Naphthalene	91-20-3	2	µg/L		<2	<2	<2	<2	----
2-Methylnaphthalene	91-57-6	2	µg/L		<2	<2	<2	<2	----
2-Chloronaphthalene	91-58-7	2	µg/L		<2	<2	<2	<2	----
Acenaphthylene	208-96-8	2	µg/L		<2	<2	<2	<2	----
Acenaphthene	83-32-9	2	µg/L		<2	<2	<2	<2	----
Fluorene	86-73-7	2	µg/L		<2	<2	<2	<2	----
Phenanthrene	85-01-8	2	µg/L		<2	<2	<2	<2	----
Anthracene	120-12-7	2	µg/L		<2	<2	<2	<2	----
Fluoranthene	206-44-0	2	µg/L		<2	<2	<2	<2	----
Pyrene	129-00-0	2	µg/L		<2	<2	<2	<2	----

Analytical Results

Sub-Matrix: WATER (Matrix: WATER)				Client sample ID	MW1	MW2	MW3	MW4	----
				Client sampling date / time	19-Feb-2019 00:00	19-Feb-2019 00:00	19-Feb-2019 00:00	19-Feb-2019 00:00	----
Compound	CAS Number	LOR	Unit		ES1905103-001	ES1905103-002	ES1905103-003	ES1905103-004	--------
					Result	Result	Result	Result	----
EP075B: Polynuclear Aromatic Hydrocarbons - Continued									
N-2-Fluorenyl Acetamide	53-96-3	2	µg/L		<2	<2	<2	<2	----
Benz(a)anthracene	56-55-3	2	µg/L		<2	<2	<2	<2	----
Chrysene	218-01-9	2	µg/L		<2	<2	<2	<2	----
Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	4	µg/L		<4	<4	<4	<4	----
7.12-Dimethylbenz(a)anthracene	57-97-6	2	µg/L		<2	<2	<2	<2	----
Benzo(a)pyrene	50-32-8	2	µg/L		<2	<2	<2	<2	----
3-Methylcholanthrene	56-49-5	2	µg/L		<2	<2	<2	<2	----
Indeno(1.2.3.cd)pyrene	193-39-5	2	µg/L		<2	<2	<2	<2	----
Dibenz(a.h)anthracene	53-70-3	2	µg/L		<2	<2	<2	<2	----
Benzo(g.h.i)perylene	191-24-2	2	µg/L		<2	<2	<2	<2	----
^ Sum of PAHs	----	2	µg/L		<2	<2	<2	<2	----
^ Benzo(a)pyrene TEQ (zero)	----	2	µg/L		<2	<2	<2	<2	----
EP075C: Phthalate Esters									
Dimethyl phthalate	131-11-3	2	µg/L		<2	<2	<2	<2	----
Diethyl phthalate	84-66-2	2	µg/L		<2	<2	<2	<2	----
Di-n-butyl phthalate	84-74-2	2	µg/L		<2	<2	<2	<2	----
Butyl benzyl phthalate	85-68-7	2	µg/L		<2	<2	<2	<2	----
bis(2-ethylhexyl) phthalate	117-81-7	10	µg/L		<10	<10	<10	<10	----
Di-n-octylphthalate	117-84-0	2	µg/L		<2	<2	<2	<2	----
EP075D: Nitrosamines									
N-Nitrosomethylethylamine	10595-95-6	2	µg/L		<2	<2	<2	<2	----
N-Nitrosodiethylamine	55-18-5	2	µg/L		<2	<2	<2	<2	----
N-Nitrosopyrrolidine	930-55-2	4	µg/L		<4	<4	<4	<4	----
N-Nitrosomorpholine	59-89-2	2	µg/L		<2	<2	<2	<2	----
N-Nitrosodi-n-propylamine	621-64-7	2	µg/L		<2	<2	<2	<2	----
N-Nitrosopiperidine	100-75-4	2	µg/L		<2	<2	<2	<2	----
N-Nitrosodibutylamine	924-16-3	2	µg/L		<2	<2	<2	<2	----
N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	4	µg/L		<4	<4	<4	<4	----
Methapyrilene	91-80-5	2	µg/L		<2	<2	<2	<2	----
EP075E: Nitroaromatics and Ketones									
2-Picoline	109-06-8	2	µg/L		<2	<2	<2	<2	----
Acetophenone	98-86-2	2	µg/L		<2	<2	<2	<2	----
Nitrobenzene	98-95-3	2	µg/L		<2	<2	<2	<2	----

Analytical Results

Sub-Matrix: WATER (Matrix: WATER)				Client sample ID	MW1	MW2	MW3	MW4	----
				Client sampling date / time	19-Feb-2019 00:00	19-Feb-2019 00:00	19-Feb-2019 00:00	19-Feb-2019 00:00	----
Compound	CAS Number	LOR	Unit		ES1905103-001	ES1905103-002	ES1905103-003	ES1905103-004	--------
					Result	Result	Result	Result	----
EP075E: Nitroaromatics and Ketones - Continued									
Isophorone	78-59-1	2	µg/L		<2	<2	<2	<2	----
2.6-Dinitrotoluene	606-20-2	4	µg/L		<4	<4	<4	<4	----
2.4-Dinitrotoluene	121-14-2	4	µg/L		<4	<4	<4	<4	----
1-Naphthylamine	134-32-7	2	µg/L		<2	<2	<2	<2	----
4-Nitroquinoline-N-oxide	56-57-5	2	µg/L		<2	<2	<2	<2	----
5-Nitro-o-toluidine	99-55-8	2	µg/L		<2	<2	<2	<2	----
Azobenzene	103-33-3	2	µg/L		<2	<2	<2	<2	----
1.3.5-Trinitrobenzene	99-35-4	2	µg/L		<2	<2	<2	<2	----
Phenacetin	62-44-2	2	µg/L		<2	<2	<2	<2	----
4-Aminobiphenyl	92-67-1	2	µg/L		<2	<2	<2	<2	----
Pentachloronitrobenzene	82-68-8	2	µg/L		<2	<2	<2	<2	----
Pronamide	23950-58-5	2	µg/L		<2	<2	<2	<2	----
Dimethylaminoazobenzene	60-11-7	2	µg/L		<2	<2	<2	<2	----
Chlorobenzilate	510-15-6	2	µg/L		<2	<2	<2	<2	----
EP075F: Haloethers									
Bis(2-chloroethyl) ether	111-44-4	2	µg/L		<2	<2	<2	<2	----
Bis(2-chloroethoxy) methane	111-91-1	2	µg/L		<2	<2	<2	<2	----
4-Chlorophenyl phenyl ether	7005-72-3	2	µg/L		<2	<2	<2	<2	----
4-Bromophenyl phenyl ether	101-55-3	2	µg/L		<2	<2	<2	<2	----
EP075G: Chlorinated Hydrocarbons									
1.3-Dichlorobenzene	541-73-1	2	µg/L		<2	<2	<2	<2	----
1.4-Dichlorobenzene	106-46-7	2	µg/L		<2	<2	<2	<2	----
1.2-Dichlorobenzene	95-50-1	2	µg/L		<2	<2	<2	<2	----
Hexachloroethane	67-72-1	2	µg/L		<2	<2	<2	<2	----
1.2.4-Trichlorobenzene	120-82-1	2	µg/L		<2	<2	<2	<2	----
Hexachloropropylene	1888-71-7	2	µg/L		<2	<2	<2	<2	----
Hexachlorobutadiene	87-68-3	2	µg/L		<2	<2	<2	<2	----
Hexachlorocyclopentadiene	77-47-4	10	µg/L		<10	<10	<10	<10	----
Pentachlorobenzene	608-93-5	2	µg/L		<2	<2	<2	<2	----
Hexachlorobenzene (HCB)	118-74-1	4	µg/L		<4	<4	<4	<4	----
EP075H: Anilines and Benzidines									
Aniline	62-53-3	2	µg/L		<2	<2	<2	<2	----
4-Chloroaniline	106-47-8	2	µg/L		<2	<2	<2	<2	----
2-Nitroaniline	88-74-4	4	µg/L		<4	<4	<4	<4	----

Analytical Results

Sub-Matrix: WATER (Matrix: WATER)				Client sample ID	MW1	MW2	MW3	MW4	----
				Client sampling date / time	19-Feb-2019 00:00	19-Feb-2019 00:00	19-Feb-2019 00:00	19-Feb-2019 00:00	----
Compound	CAS Number	LOR	Unit		ES1905103-001	ES1905103-002	ES1905103-003	ES1905103-004	--------
					Result	Result	Result	Result	----
EP075H: Anilines and Benzidines - Continued									
3-Nitroaniline	99-09-2	4	µg/L		<4	<4	<4	<4	----
Dibenzofuran	132-64-9	2	µg/L		<2	<2	<2	<2	----
4-Nitroaniline	100-01-8	2	µg/L		<2	<2	<2	<2	----
Carbazole	86-74-8	2	µg/L		<2	<2	<2	<2	----
3.3`-Dichlorobenzidine	91-94-1	2	µg/L		<2	<2	<2	<2	----
EP075I: Organochlorine Pesticides									
alpha-BHC	319-84-6	2	µg/L		<2	<2	<2	<2	----
beta-BHC	319-85-7	2	µg/L		<2	<2	<2	<2	----
gamma-BHC	58-89-9	2	µg/L		<2	<2	<2	<2	----
delta-BHC	319-86-8	2	µg/L		<2	<2	<2	<2	----
Heptachlor	76-44-8	2	µg/L		<2	<2	<2	<2	----
Aldrin	309-00-2	2	µg/L		<2	<2	<2	<2	----
Heptachlor epoxide	1024-57-3	2	µg/L		<2	<2	<2	<2	----
alpha-Endosulfan	959-98-8	2	µg/L		<2	<2	<2	<2	----
4.4`-DDE	72-55-9	2	µg/L		<2	<2	<2	<2	----
Dieldrin	60-57-1	2	µg/L		<2	<2	<2	<2	----
Endrin	72-20-8	2	µg/L		<2	<2	<2	<2	----
beta-Endosulfan	33213-65-9	2	µg/L		<2	<2	<2	<2	----
4.4`-DDD	72-54-8	2	µg/L		<2	<2	<2	<2	----
Endosulfan sulfate	1031-07-8	2	µg/L		<2	<2	<2	<2	----
4.4`-DDT	50-29-3	4	µg/L		<4	<4	<4	<4	----
^ Sum of Aldrin + Dieldrin	309-00-2/60-57-1	4	µg/L		<4	<4	<4	<4	----
^ Sum of DDD + DDE + DDT	72-54-8/72-55-9/50-2	4	µg/L		<4	<4	<4	<4	----
EP075J: Organophosphorus Pesticides									
Dichlorvos	62-73-7	2	µg/L		<2	<2	<2	<2	----
Dimethoate	60-51-5	2	µg/L		<2	<2	<2	<2	----
Diazinon	333-41-5	2	µg/L		<2	<2	<2	<2	----
Chlorpyrifos-methyl	5598-13-0	2	µg/L		<2	<2	<2	<2	----
Malathion	121-75-5	2	µg/L		<2	<2	<2	<2	----
Fenthion	55-38-9	2	µg/L		<2	<2	<2	<2	----
Chlorpyrifos	2921-88-2	2	µg/L		<2	<2	<2	<2	----
Pirimphos-ethyl	23505-41-1	2	µg/L		<2	<2	<2	<2	----
Chlorfenvinphos	470-90-6	2	µg/L		<2	<2	<2	<2	----
Prothiofos	34643-46-4	2	µg/L		<2	<2	<2	<2	----

Analytical Results

Sub-Matrix: WATER (Matrix: WATER)				Client sample ID	MW1	MW2	MW3	MW4	----
				Client sampling date / time	19-Feb-2019 00:00	19-Feb-2019 00:00	19-Feb-2019 00:00	19-Feb-2019 00:00	----
Compound	CAS Number	LOR	Unit		ES1905103-001	ES1905103-002	ES1905103-003	ES1905103-004	--------
					Result	Result	Result	Result	----
EP075J: Organophosphorus Pesticides - Continued									
Ethion	563-12-2	2	µg/L		<2	<2	<2	<2	----
EP080/071: Total Petroleum Hydrocarbons									
C6 - C9 Fraction	----	20	µg/L		<20	<20	<20	**60**	----
C10 - C14 Fraction	----	50	µg/L		**270**	<50	<50	<50	----
C15 - C28 Fraction	----	100	µg/L		**860**	<100	**140**	<100	----
C29 - C36 Fraction	----	50	µg/L		<50	<50	<50	<50	----
^ **C10 - C36 Fraction (sum)**	----	50	µg/L		**1130**	<50	**140**	<50	----
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions									
C6 - C10 Fraction	C6_C10	20	µg/L		<20	<20	<20	**60**	----
^ **C6 - C10 Fraction minus BTEX (F1)**	C6_C10-BTEX	20	µg/L		<20	<20	<20	**60**	----
>C10 - C16 Fraction	----	100	µg/L		**500**	<100	<100	<100	----
>C16 - C34 Fraction	----	100	µg/L		**620**	<100	**110**	<100	----
>C34 - C40 Fraction	----	100	µg/L		<100	<100	<100	<100	----
^ **>C10 - C40 Fraction (sum)**	----	100	µg/L		**1120**	<100	**110**	<100	----
^ **>C10 - C16 Fraction minus Naphthalene (F2)**	----	100	µg/L		**500**	<100	<100	<100	----
EP080: BTEXN									
Benzene	71-43-2	1	µg/L		<1	**1**	<1	<1	----
Toluene	108-88-3	2	µg/L		<2	<2	<2	<2	----
Ethylbenzene	100-41-4	2	µg/L		<2	<2	<2	<2	----
meta- & para-Xylene	108-38-3 106-42-3	2	µg/L		<2	<2	<2	<2	----
ortho-Xylene	95-47-6	2	µg/L		<2	<2	<2	<2	----
^ **Total Xylenes**	----	2	µg/L		<2	<2	<2	<2	----
^ **Sum of BTEX**	----	1	µg/L		<1	**1**	<1	<1	----
Naphthalene	91-20-3	5	µg/L		<5	<5	<5	<5	----
EP231A: Perfluoroalkyl Sulfonic Acids									
Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L		<0.02	<0.02	<0.02	<0.02	----
Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L		<0.02	<0.02	<0.02	<0.02	----
Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.02	µg/L		<0.02	<0.02	<0.02	**0.05**	----
Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L		<0.02	<0.02	<0.02	<0.02	----

Analytical Results

Sub-Matrix: WATER (Matrix: WATER)				Client sample ID	MW1	MW2	MW3	MW4	----
				Client sampling date / time	19-Feb-2019 00:00	19-Feb-2019 00:00	19-Feb-2019 00:00	19-Feb-2019 00:00	----
Compound	CAS Number	LOR	Unit		ES1905103-001	ES1905103-002	ES1905103-003	ES1905103-004	--------
					Result	Result	Result	Result	----
EP231A: Perfluoroalkyl Sulfonic Acids - Continued									
Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L		<0.01	<0.01	**0.02**	**0.03**	----
Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L		<0.02	<0.02	<0.02	<0.02	----
EP231B: Perfluoroalkyl Carboxylic Acids									
Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L		<0.1	<0.1	<0.1	<0.1	----
Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L		<0.02	<0.02	<0.02	**0.03**	----
Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L		<0.02	<0.02	<0.02	**0.03**	----
Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L		<0.02	<0.02	<0.02	<0.02	----
Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L		<0.01	<0.01	**0.01**	**0.01**	----
Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L		**0.04**	**0.07**	**0.08**	<0.02	----
Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L		<0.02	<0.02	<0.02	<0.02	----
Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L		<0.02	<0.02	<0.02	<0.02	----
Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L		<0.02	<0.02	<0.02	<0.02	----
Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L		<0.02	<0.02	<0.02	<0.02	----
Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L		<0.05	<0.05	<0.05	<0.05	----
EP231C: Perfluoroalkyl Sulfonamides									
Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L		<0.02	<0.02	<0.02	<0.02	----
N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L		<0.05	<0.05	<0.05	<0.05	----
N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L		<0.05	<0.05	<0.05	<0.05	----
N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L		<0.05	<0.05	<0.05	<0.05	----
N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L		<0.05	<0.05	<0.05	<0.05	----
N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L		<0.02	<0.02	<0.02	<0.02	----

Analytical Results

Sub-Matrix: WATER (Matrix: WATER)				Client sample ID	MW1	MW2	MW3	MW4	----
				Client sampling date / time	19-Feb-2019 00:00	19-Feb-2019 00:00	19-Feb-2019 00:00	19-Feb-2019 00:00	----
Compound	CAS Number	LOR	Unit		ES1905103-001	ES1905103-002	ES1905103-003	ES1905103-004	--------
					Result	Result	Result	Result	----
EP231C: Perfluoroalkyl Sulfonamides - Continued									
N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L		<0.02	<0.02	<0.02	<0.02	----
EP231D: (n:2) Fluorotelomer Sulfonic Acids									
4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L		<0.05	<0.05	<0.05	<0.05	----
6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L		<0.05	<0.05	<0.05	<0.05	----
8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L		<0.05	<0.05	<0.05	<0.05	----
10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L		<0.05	<0.05	<0.05	<0.05	----
EP231P: PFAS Sums									
Sum of PFAS	----	0.01	µg/L		**0.04**	**0.07**	**0.11**	**0.15**	----
Sum of PFHxS and PFOS	355-46-4/1763-23-1	0.01	µg/L		<0.01	<0.01	**0.02**	**0.08**	----
Sum of PFAS (WA DER List)	----	0.01	µg/L		<0.01	<0.01	**0.03**	**0.15**	----
EP074S: VOC Surrogates									
1.2-Dichloroethane-D4	17060-07-0	5	%		**108**	**116**	**115**	**124**	----
Toluene-D8	2037-26-5	5	%		**116**	**118**	**116**	**126**	----
4-Bromofluorobenzene	460-00-4	5	%		**108**	**112**	**112**	**120**	----
EP075S: Acid Extractable Surrogates									
2-Fluorophenol	367-12-4	2	%		**38.4**	**29.6**	**24.3**	**28.2**	----
Phenol-d6	13127-88-3	2	%		**26.2**	**19.5**	**16.6**	**25.7**	----
2-Chlorophenol-D4	93951-73-6	2	%		**57.4**	**49.2**	**42.4**	**46.1**	----
2.4.6-Tribromophenol	118-79-6	2	%		**64.0**	**55.5**	**48.7**	**42.6**	----
EP075T: Base/Neutral Extractable Surrogates									
Nitrobenzene-D5	4165-60-0	2	%		**53.6**	**53.9**	**55.6**	**55.0**	----
1.2-Dichlorobenzene-D4	2199-69-1	2	%		**68.2**	**58.4**	**50.4**	**50.3**	----
2-Fluorobiphenyl	321-60-8	2	%		**70.1**	**62.5**	**48.8**	**60.1**	----
Anthracene-d10	1719-06-8	2	%		**91.3**	**89.3**	**83.8**	**78.1**	----
4-Terphenyl-d14	1718-51-0	2	%		**100**	**87.4**	**87.3**	**75.5**	----
EP080S: TPH(V)/BTEX Surrogates									
1.2-Dichloroethane-D4	17060-07-0	2	%		**112**	**119**	**119**	**128**	----
Toluene-D8	2037-26-5	2	%		**116**	**118**	**116**	**126**	----

Analytical Results

Sub-Matrix: WATER (Matrix: WATER)				Client sample ID	MW1	MW2	MW3	MW4	----
				Client sampling date / time	19-Feb-2019 00:00	19-Feb-2019 00:00	19-Feb-2019 00:00	19-Feb-2019 00:00	----
Compound	CAS Number	LOR	Unit		ES1905103-001	ES1905103-002	ES1905103-003	ES1905103-004	--------
					Result	Result	Result	Result	----
EP080S: TPH(V)/BTEX Surrogates - Continued									
4-Bromofluorobenzene	460-00-4	2	%		**110**	**116**	**114**	**124**	**----**
EP231S: PFAS Surrogate									
13C4-PFOS	----	0.02	%		**114**	**114**	**104**	**105**	**----**
13C8-PFOA	----	0.02	%		**116**	**113**	**115**	**113**	**----**

Surrogate Control Limits

Sub-Matrix: **WATER**		Recovery Limits (%)	
Compound	*CAS Number*	*Low*	*High*
EP074S: VOC Surrogates			
1.2-Dichloroethane-D4	17060-07-0	78	133
Toluene-D8	2037-26-5	79	129
4-Bromofluorobenzene	460-00-4	81	124
EP075S: Acid Extractable Surrogates			
2-Fluorophenol	367-12-4	10	117
Phenol-d6	13127-88-3	10	69
2-Chlorophenol-D4	93951-73-6	21	130
2.4.6-Tribromophenol	118-79-6	10	151
EP075T: Base/Neutral Extractable Surrogates			
Nitrobenzene-D5	4165-60-0	29	142
1.2-Dichlorobenzene-D4	2199-69-1	24	121
2-Fluorobiphenyl	321-60-8	27	135
Anthracene-d10	1719-06-8	27	113
4-Terphenyl-d14	1718-51-0	21	123
EP080S: TPH(V)/BTEX Surrogates			
1.2-Dichloroethane-D4	17060-07-0	71	137
Toluene-D8	2037-26-5	79	131
4-Bromofluorobenzene	460-00-4	70	128
EP231S: PFAS Surrogate			
13C4-PFOS	----	60	120
13C8-PFOA	----	60	120

ALS Environmental

QUALITY CONTROL REPORT

Work Order	: **ES1905103**	Page	: 1 of 14
Client	: **ARCADIS AUSTRALIA PACIFIC PTY LTD**	Laboratory	: Environmental Division Sydney
Contact	: MR GREG BARTLETT	Contact	: Larissa Burns
Address	: L16, 480 GEORGE STREET SYDNEY NSW 2000	Address	: 277-289 Woodpark Road Smithfield NSW Australia 2164
Telephone	: ----	Telephone	: +6138549 9644
Project	: King St North ESA	Date Samples Received	: 19-Feb-2019
Order number	: 10026439.6	Date Analysis Commenced	: 19-Feb-2019
C-O-C number	: ----	Issue Date	: 21-Feb-2019
Sampler	: CAITLAIN REGENA		
Site	: ----		
Quote number	: EN-091-18 (Primary Work Only)		
No. of samples received	: 4		
No. of samples analysed	: 4		

Accreditation No. 825
Accredited for compliance with ISO/IEC 17025 - Testing

This report supersedes any previous report(s) with this reference. Results apply to the sample(s) as submitted. This document shall not be reproduced, except in full.

This Quality Control Report contains the following information:

- Laboratory Duplicate (DUP) Report; Relative Percentage Difference (RPD) and Acceptance Limits
- Method Blank (MB) and Laboratory Control Spike (LCS) Report; Recovery and Acceptance Limits
- Matrix Spike (MS) Report; Recovery and Acceptance Limits

Signatories

This document has been electronically signed by the authorized signatories below. Electronic signing is carried out in compliance with procedures specified in 21 CFR Part 11.

Signatories	*Position*	*Accreditation Category*
Dian Dao		Sydney Inorganics, Smithfield, NSW
Edwandy Fadjar	Organic Coordinator	Sydney Organics, Smithfield, NSW
Franco Lentini		Sydney Organics, Smithfield, NSW
Ivan Taylor	Analyst	Sydney Inorganics, Smithfield, NSW

General Comments

The analytical procedures used by the Environmental Division have been developed from established internationally recognized procedures such as those published by the USEPA, APHA, AS and NEPM. In house developed procedures are employed in the absence of documented standards or by client request.

Where moisture determination has been performed, results are reported on a dry weight basis.

Where a reported less than (<) result is higher than the LOR, this may be due to primary sample extract/digestate dilution and/or insufficient sample for analysis. Where the LOR of a reported result differs from standard LOR, this may be due to high

Key : Anonymous = Refers to samples which are not specifically part of this work order but formed part of the QC process lot
CAS Number = CAS registry number from database maintained by Chemical Abstracts Services. The Chemical Abstracts Service is a division of the American Chemical Society.
LOR = Limit of reporting
RPD = Relative Percentage Difference
# = Indicates failed QC

Laboratory Duplicate (DUP) Report

The quality control term Laboratory Duplicate refers to a randomly selected intralaboratory split. Laboratory duplicates provide information regarding method precision and sample heterogeneity. The permitted ranges for the Relative Percent Deviation (RPD) of Laboratory Duplicates are specified in ALS Method QWI-EN/38 and are dependent on the magnitude of results in comparison to the level of reporting: Result < 10 times LOR: No Limit; Result between 10 and 20 times LOR: 0% - 50%; Result > 20 times LOR: 0% - 20%.

Sub-Matrix: **WATER**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EG020F: Dissolved Metals by ICP-MS (QC Lot: 2195041)									
ES1905103-001	MW1	EG020A-F: Cadmium	7440-43-9	0.0001	mg/L	<0.0001	<0.0001	0.00	No Limit
		EG020A-F: Arsenic	7440-38-2	0.001	mg/L	<0.001	<0.001	0.00	No Limit
		EG020A-F: Chromium	7440-47-3	0.001	mg/L	<0.001	0.001	0.00	No Limit
		EG020A-F: Copper	7440-50-8	0.001	mg/L	<0.001	<0.001	0.00	No Limit
		EG020A-F: Lead	7439-92-1	0.001	mg/L	<0.001	<0.001	0.00	No Limit
		EG020A-F: Nickel	7440-02-0	0.001	mg/L	<0.001	<0.001	0.00	No Limit
		EG020A-F: Zinc	7440-66-6	0.005	mg/L	<0.005	<0.005	0.00	No Limit
EG035F: Dissolved Mercury by FIMS (QC Lot: 2195042)									
ES1905103-003	MW3	EG035F: Mercury	7439-97-6	0.0001	mg/L	<0.0001	<0.0001	0.00	No Limit
EK055G: Ammonia as N by Discrete Analyser (QC Lot: 2194843)									
ES1905103-001	MW1	EK055G: Ammonia as N	7664-41-7	0.01	mg/L	6.60	6.80	2.98	0% - 20%
EP074A: Monocyclic Aromatic Hydrocarbons (QC Lot: 2194300)									
ES1905173-001	Anonymous	EP074: Benzene	71-43-2	1	µg/L	<1	<1	0.00	No Limit
		EP074: Toluene	108-88-3	2	µg/L	<2	<2	0.00	No Limit
		EP074: Ethylbenzene	100-41-4	2	µg/L	<2	<2	0.00	No Limit
		EP074: meta- & para-Xylene	108-38-3 106-42-3	2	µg/L	<2	<2	0.00	No Limit
		EP074: ortho-Xylene	95-47-6	2	µg/L	<2	<2	0.00	No Limit
		EP074: Styrene	100-42-5	5	µg/L	<5	<5	0.00	No Limit
		EP074: Isopropylbenzene	98-82-8	5	µg/L	<5	<5	0.00	No Limit
		EP074: n-Propylbenzene	103-65-1	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.3.5-Trimethylbenzene	108-67-8	5	µg/L	<5	<5	0.00	No Limit
		EP074: sec-Butylbenzene	135-98-8	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.2.4-Trimethylbenzene	95-63-6	5	µg/L	<5	<5	0.00	No Limit

Sub-Matrix: **WATER**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP074A: Monocyclic Aromatic Hydrocarbons (QC Lot: 2194300) - continued									
ES1905173-001	Anonymous	EP074: tert-Butylbenzene	98-06-6	5	µg/L	<5	<5	0.00	No Limit
		EP074: p-Isopropyltoluene	99-87-6	5	µg/L	<5	<5	0.00	No Limit
		EP074: n-Butylbenzene	104-51-8	5	µg/L	<5	<5	0.00	No Limit
EP074B: Oxygenated Compounds (QC Lot: 2194300)									
ES1905173-001	Anonymous	EP074: Vinyl Acetate	108-05-4	50	µg/L	<50	<50	0.00	No Limit
		EP074: 2-Butanone (MEK)	78-93-3	50	µg/L	<50	<50	0.00	No Limit
		EP074: 4-Methyl-2-pentanone (MIBK)	108-10-1	50	µg/L	<50	<50	0.00	No Limit
		EP074: 2-Hexanone (MBK)	591-78-6	50	µg/L	<50	<50	0.00	No Limit
EP074C: Sulfonated Compounds (QC Lot: 2194300)									
ES1905173-001	Anonymous	EP074: Carbon disulfide	75-15-0	5	µg/L	<5	<5	0.00	No Limit
EP074D: Fumigants (QC Lot: 2194300)									
ES1905173-001	Anonymous	EP074: 2.2-Dichloropropane	594-20-7	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.2-Dichloropropane	78-87-5	5	µg/L	<5	<5	0.00	No Limit
		EP074: cis-1.3-Dichloropropylene	10061-01-5	5	µg/L	<5	<5	0.00	No Limit
		EP074: trans-1.3-Dichloropropylene	10061-02-6	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.2-Dibromoethane (EDB)	106-93-4	5	µg/L	<5	<5	0.00	No Limit
EP074E: Halogenated Aliphatic Compounds (QC Lot: 2194300)									
ES1905173-001	Anonymous	EP074: 1.1-Dichloroethene	75-35-4	5	µg/L	<5	<5	0.00	No Limit
		EP074: Iodomethane	74-88-4	5	µg/L	<5	<5	0.00	No Limit
		EP074: trans-1.2-Dichloroethene	156-60-5	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.1-Dichloroethane	75-34-3	5	µg/L	<5	<5	0.00	No Limit
		EP074: cis-1.2-Dichloroethene	156-59-2	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.1.1-Trichloroethane	71-55-6	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.1-Dichloropropylene	563-58-6	5	µg/L	<5	<5	0.00	No Limit
		EP074: Carbon Tetrachloride	56-23-5	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.2-Dichloroethane	107-06-2	5	µg/L	<5	<5	0.00	No Limit
		EP074: Trichloroethene	79-01-6	5	µg/L	<5	<5	0.00	No Limit
		EP074: Dibromomethane	74-95-3	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.1.2-Trichloroethane	79-00-5	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.3-Dichloropropane	142-28-9	5	µg/L	<5	<5	0.00	No Limit
		EP074: Tetrachloroethene	127-18-4	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.1.1.2-Tetrachloroethane	630-20-6	5	µg/L	<5	<5	0.00	No Limit
		EP074: trans-1.4-Dichloro-2-butene	110-57-6	5	µg/L	<5	<5	0.00	No Limit
		EP074: cis-1.4-Dichloro-2-butene	1476-11-5	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.1.2.2-Tetrachloroethane	79-34-5	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.2.3-Trichloropropane	96-18-4	5	µg/L	<5	<5	0.00	No Limit
		EP074: Pentachloroethane	76-01-7	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.2-Dibromo-3-chloropropane	96-12-8	5	µg/L	<5	<5	0.00	No Limit
		EP074: Dichlorodifluoromethane	75-71-8	50	µg/L	<50	<50	0.00	No Limit

Sub-Matrix: **WATER**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP074E: Halogenated Aliphatic Compounds (QC Lot: 2194300) - continued									
ES1905173-001	Anonymous	EP074: Chloromethane	74-87-3	50	µg/L	<50	<50	0.00	No Limit
		EP074: Vinyl chloride	75-01-4	50	µg/L	<50	<50	0.00	No Limit
		EP074: Bromomethane	74-83-9	50	µg/L	<50	<50	0.00	No Limit
		EP074: Chloroethane	75-00-3	50	µg/L	<50	<50	0.00	No Limit
		EP074: Trichlorofluoromethane	75-69-4	50	µg/L	<50	<50	0.00	No Limit
EP074F: Halogenated Aromatic Compounds (QC Lot: 2194300)									
ES1905173-001	Anonymous	EP074: Chlorobenzene	108-90-7	5	µg/L	<5	<5	0.00	No Limit
		EP074: Bromobenzene	108-86-1	5	µg/L	<5	<5	0.00	No Limit
		EP074: 2-Chlorotoluene	95-49-8	5	µg/L	<5	<5	0.00	No Limit
		EP074: 4-Chlorotoluene	106-43-4	5	µg/L	<5	<5	0.00	No Limit
		EP074: 1.2.3-Trichlorobenzene	87-61-6	5	µg/L	<5	<5	0.00	No Limit
EP074G: Trihalomethanes (QC Lot: 2194300)									
ES1905173-001	Anonymous	EP074: Chloroform	67-66-3	5	µg/L	16	16	0.00	No Limit
		EP074: Bromodichloromethane	75-27-4	5	µg/L	24	24	0.00	No Limit
		EP074: Dibromochloromethane	124-48-1	5	µg/L	29	30	0.00	No Limit
		EP074: Bromoform	75-25-2	5	µg/L	10	10	0.00	No Limit
EP080/071: Total Petroleum Hydrocarbons (QC Lot: 2194301)									
ES1905173-001	Anonymous	EP080: C6 - C9 Fraction	----	20	µg/L	30	30	0.00	No Limit
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QC Lot: 2194301)									
ES1905173-001	Anonymous	EP080: C6 - C10 Fraction	C6_C10	20	µg/L	40	40	0.00	No Limit
EP080: BTEXN (QC Lot: 2194301)									
ES1905173-001	Anonymous	EP080: Benzene	71-43-2	1	µg/L	<1	<1	0.00	No Limit
		EP080: Toluene	108-88-3	2	µg/L	<2	<2	0.00	No Limit
		EP080: Ethylbenzene	100-41-4	2	µg/L	<2	<2	0.00	No Limit
		EP080: meta- & para-Xylene	108-38-3 106-42-3	2	µg/L	<2	<2	0.00	No Limit
		EP080: ortho-Xylene	95-47-6	2	µg/L	<2	<2	0.00	No Limit
		EP080: Naphthalene	91-20-3	5	µg/L	<5	<5	0.00	No Limit
EP231A: Perfluoroalkyl Sulfonic Acids (QC Lot: 2195447)									
ES1905103-001	MW1	EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	<0.01	<0.01	0.00	No Limit
		EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	<0.02	0.00	No Limit
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	<0.02	0.00	No Limit
		EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.02	µg/L	<0.02	<0.02	0.00	No Limit
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	<0.02	0.00	No Limit
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	<0.02	0.00	No Limit
EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 2195447)									
ES1905103-001	MW1	EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	<0.01	0.00	No Limit
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	<0.02	0.00	No Limit
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	<0.02	0.00	No Limit

Sub-Matrix: **WATER**

				Laboratory Duplicate (DUP) Report					
Laboratory sample ID	*Client sample ID*	*Method: Compound*	*CAS Number*	*LOR*	*Unit*	*Original Result*	*Duplicate Result*	*RPD (%)*	*Recovery Limits (%)*
EP231B: Perfluoroalkyl Carboxylic Acids (QC Lot: 2195447) - continued									
ES1905103-001	MW1	EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	<0.02	0.00	No Limit
		EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	0.04	0.04	0.00	No Limit
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	<0.02	0.00	No Limit
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	<0.02	0.00	No Limit
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	<0.02	0.00	No Limit
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	<0.02	0.00	No Limit
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	<0.05	0.00	No Limit
		EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	<0.1	0.00	No Limit
EP231C: Perfluoroalkyl Sulfonamides (QC Lot: 2195447)									
ES1905103-001	MW1	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	<0.02	0.00	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	<0.02	0.00	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	<0.02	0.00	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	<0.05	0.00	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	<0.05	0.00	No Limit
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	<0.05	0.00	No Limit
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	<0.05	0.00	No Limit
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QC Lot: 2195447)									
ES1905103-001	MW1	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	<0.05	0.00	No Limit
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	<0.05	0.00	No Limit
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	<0.05	0.00	No Limit
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	<0.05	0.00	No Limit
EP231P: PFAS Sums (QC Lot: 2195447)									
ES1905103-001	MW1	EP231X: Sum of PFAS	----	0.01	µg/L	0.04	0.04	0.00	No Limit

Method Blank (MB) and Laboratory Control Spike (LCS) Report

The quality control term Method / Laboratory Blank refers to an analyte free matrix to which all reagents are added in the same volumes or proportions as used in standard sample preparation. The purpose of this QC parameter is to monitor potential laboratory contamination. The quality control term Laboratory Control Spike (LCS) refers to a certified reference material, or a known interference free matrix spiked with target analytes. The purpose of this QC parameter is to monitor method precision and accuracy independent of sample matrix. Dynamic Recovery Limits are based on statistical evaluation of processed LCS.

Sub-Matrix: **WATER**

				Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
Method: Compound	CAS Number	LOR	Unit	Result	Concentration	LCS	Low	High
EG020F: Dissolved Metals by ICP-MS (QCLot: 2195041)								
EG020A-F: Arsenic	7440-38-2	0.001	mg/L	<0.001	0.1 mg/L	92.6	85	114
EG020A-F: Cadmium	7440-43-9	0.0001	mg/L	<0.0001	0.1 mg/L	94.5	84	110
EG020A-F: Chromium	7440-47-3	0.001	mg/L	<0.001	0.1 mg/L	97.2	85	111
EG020A-F: Copper	7440-50-8	0.001	mg/L	<0.001	0.1 mg/L	93.3	81	111
EG020A-F: Lead	7439-92-1	0.001	mg/L	<0.001	0.1 mg/L	91.5	83	111
EG020A-F: Nickel	7440-02-0	0.001	mg/L	<0.001	0.1 mg/L	95.9	82	112
EG020A-F: Zinc	7440-66-6	0.005	mg/L	<0.005	0.1 mg/L	100	81	117
EG035F: Dissolved Mercury by FIMS (QCLot: 2195042)								
EG035F: Mercury	7439-97-6	0.0001	mg/L	<0.0001	0.01 mg/L	88.1	83	105
EK055G: Ammonia as N by Discrete Analyser (QCLot: 2194843)								
EK055G: Ammonia as N	7664-41-7	0.01	mg/L	<0.01	1 mg/L	95.0	90	114
EP074A: Monocyclic Aromatic Hydrocarbons (QCLot: 2194300)								
EP074: Benzene	71-43-2	1	µg/L	<1	10 µg/L	98.1	77	119
EP074: Toluene	108-88-3	2	µg/L	<2	10 µg/L	103	69	129
EP074: Ethylbenzene	100-41-4	2	µg/L	<2	10 µg/L	101	76	118
EP074: meta- & para-Xylene	108-38-3 106-42-3	2	µg/L	<2	20 µg/L	99.5	77	119
EP074: Styrene	100-42-5	5	µg/L	<5	10 µg/L	95.0	73	119
EP074: ortho-Xylene	95-47-6	2	µg/L	<2	10 µg/L	98.9	79	117
EP074: Isopropylbenzene	98-82-8	5	µg/L	<5	10 µg/L	98.6	76	118
EP074: n-Propylbenzene	103-65-1	5	µg/L	<5	10 µg/L	99.3	69	119
EP074: 1.3.5-Trimethylbenzene	108-67-8	5	µg/L	<5	10 µg/L	100	74	116
EP074: sec-Butylbenzene	135-98-8	5	µg/L	<5	10 µg/L	99.4	73	119
EP074: 1.2.4-Trimethylbenzene	95-63-6	5	µg/L	<5	10 µg/L	100	74	116
EP074: tert-Butylbenzene	98-06-6	5	µg/L	<5	10 µg/L	99.9	72	116
EP074: p-Isopropyltoluene	99-87-6	5	µg/L	<5	10 µg/L	97.9	71	119
EP074: n-Butylbenzene	104-51-8	5	µg/L	<5	10 µg/L	101	65	123
EP074B: Oxygenated Compounds (QCLot: 2194300)								
EP074: Vinyl Acetate	108-05-4	50	µg/L	<50	100 µg/L	86.0	61	134
EP074: 2-Butanone (MEK)	78-93-3	50	µg/L	<50	100 µg/L	99.6	74	130
EP074: 4-Methyl-2-pentanone (MIBK)	108-10-1	50	µg/L	<50	100 µg/L	90.4	66	132
EP074: 2-Hexanone (MBK)	591-78-6	50	µg/L	<50	100 µg/L	90.0	65	137
EP074C: Sulfonated Compounds (QCLot: 2194300)								
EP074: Carbon disulfide	75-15-0	5	µg/L	<5	10 µg/L	91.5	73	127

Sub-Matrix: **WATER**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP074D: Fumigants (QCLot: 2194300)								
EP074: 2.2-Dichloropropane	594-20-7	5	µg/L	<5	10 µg/L	101	68	122
EP074: 1.2-Dichloropropane	78-87-5	5	µg/L	<5	10 µg/L	101	76	118
EP074: cis-1.3-Dichloropropylene	10061-01-5	5	µg/L	<5	10 µg/L	94.7	62	120
EP074: trans-1.3-Dichloropropylene	10061-02-6	5	µg/L	<5	10 µg/L	93.3	60	114
EP074: 1.2-Dibromoethane (EDB)	106-93-4	5	µg/L	<5	10 µg/L	98.2	69	117
EP074E: Halogenated Aliphatic Compounds (QCLot: 2194300)								
EP074: Dichlorodifluoromethane	75-71-8	50	µg/L	<50	100 µg/L	109	61	138
EP074: Chloromethane	74-87-3	50	µg/L	<50	100 µg/L	105	67	130
EP074: Vinyl chloride	75-01-4	50	µg/L	<50	100 µg/L	106	69	129
EP074: Bromomethane	74-83-9	50	µg/L	<50	100 µg/L	97.5	56	140
EP074: Chloroethane	75-00-3	50	µg/L	<50	100 µg/L	98.2	61	139
EP074: Trichlorofluoromethane	75-69-4	50	µg/L	<50	100 µg/L	104	69	131
EP074: 1.1-Dichloroethene	75-35-4	5	µg/L	<5	10 µg/L	102	70	124
EP074: Iodomethane	74-88-4	5	µg/L	<5	10 µg/L	73.0	70	128
EP074: trans-1.2-Dichloroethene	156-60-5	5	µg/L	<5	10 µg/L	99.4	74	118
EP074: 1.1-Dichloroethane	75-34-3	5	µg/L	<5	10 µg/L	97.6	74	120
EP074: cis-1.2-Dichloroethene	156-59-2	5	µg/L	<5	10 µg/L	98.4	77	119
EP074: 1.1.1-Trichloroethane	71-55-6	5	µg/L	<5	10 µg/L	99.2	67	119
EP074: 1.1-Dichloropropylene	563-58-6	5	µg/L	<5	10 µg/L	101	73	119
EP074: Carbon Tetrachloride	56-23-5	5	µg/L	<5	10 µg/L	88.2	62	120
EP074: 1.2-Dichloroethane	107-06-2	5	µg/L	<5	10 µg/L	101	73	123
EP074: Trichloroethene	79-01-6	5	µg/L	<5	10 µg/L	101	76	118
EP074: Dibromomethane	74-95-3	5	µg/L	<5	10 µg/L	97.8	73	119
EP074: 1.1.2-Trichloroethane	79-00-5	5	µg/L	<5	10 µg/L	97.9	72	126
EP074: 1.3-Dichloropropane	142-28-9	5	µg/L	<5	10 µg/L	98.7	71	129
EP074: Tetrachloroethene	127-18-4	5	µg/L	<5	10 µg/L	95.4	72	124
EP074: 1.1.1.2-Tetrachloroethane	630-20-6	5	µg/L	<5	10 µg/L	97.3	66	114
EP074: trans-1.4-Dichloro-2-butene	110-57-6	5	µg/L	<5	10 µg/L	99.2	60	120
EP074: cis-1.4-Dichloro-2-butene	1476-11-5	5	µg/L	<5	10 µg/L	89.2	71	128
EP074: 1.1.2.2-Tetrachloroethane	79-34-5	5	µg/L	<5	10 µg/L	95.7	70	124
EP074: 1.2.3-Trichloropropane	96-18-4	5	µg/L	<5	10 µg/L	99.5	74	126
EP074: Pentachloroethane	76-01-7	5	µg/L	<5	10 µg/L	104	72	126
EP074: 1.2-Dibromo-3-chloropropane	96-12-8	5	µg/L	<5	10 µg/L	83.6	66	136
EP074F: Halogenated Aromatic Compounds (QCLot: 2194300)								
EP074: Chlorobenzene	108-90-7	5	µg/L	<5	10 µg/L	103	79	117
EP074: Bromobenzene	108-86-1	5	µg/L	<5	10 µg/L	100	76	116
EP074: 2-Chlorotoluene	95-49-8	5	µg/L	<5	10 µg/L	101	73	119
EP074: 4-Chlorotoluene	106-43-4	5	µg/L	<5	10 µg/L	101	73	119
EP074: 1.2.3-Trichlorobenzene	87-61-6	5	µg/L	<5	10 µg/L	104	67	123

Sub-Matrix: **WATER**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP074G: Trihalomethanes (QCLot: 2194300)								
EP074: Chloroform	67-66-3	5	µg/L	<5	10 µg/L	99.4	72	120
EP074: Bromodichloromethane	75-27-4	5	µg/L	<5	10 µg/L	93.1	64	118
EP074: Dibromochloromethane	124-48-1	5	µg/L	<5	10 µg/L	92.1	65	115
EP074: Bromoform	75-25-2	5	µg/L	<5	10 µg/L	88.8	74	126
EP075A: Phenolic Compounds (QCLot: 2193848)								
EP075: Phenol	108-95-2	2	µg/L	<2	10 µg/L	34.3	26	64
EP075: 2-Chlorophenol	95-57-8	2	µg/L	<2	10 µg/L	70.8	52	88
EP075: 2-Methylphenol	95-48-7	2	µg/L	<2	10 µg/L	62.6	50	94
EP075: 3- & 4-Methylphenol	1319-77-3	2	µg/L	<2	10 µg/L	67.2	45	96
EP075: 2-Nitrophenol	88-75-5	2	µg/L	<2	10 µg/L	86.3	48	98
EP075: 2.4-Dimethylphenol	105-67-9	2	µg/L	<2	10 µg/L	62.7	50	94
EP075: 2.4-Dichlorophenol	120-83-2	2	µg/L	<2	10 µg/L	83.2	62	109
EP075: 2.6-Dichlorophenol	87-65-0	2	µg/L	<2	10 µg/L	81.4	62	108
EP075: 4-Chloro-3-methylphenol	59-50-7	2	µg/L	<2	10 µg/L	76.6	61	107
EP075: 2.4.6-Trichlorophenol	88-06-2	2	µg/L	<2	10 µg/L	79.2	58	112
EP075: 2.4.5-Trichlorophenol	95-95-4	2	µg/L	<2	10 µg/L	82.2	58	110
EP075: Pentachlorophenol	87-86-5	4	µg/L	<4	20 µg/L	33.9	13	95
EP075B: Polynuclear Aromatic Hydrocarbons (QCLot: 2193848)								
EP075: Naphthalene	91-20-3	2	µg/L	<2	10 µg/L	84.0	51	95
EP075: 2-Methylnaphthalene	91-57-6	2	µg/L	<2	10 µg/L	88.2	59	108
EP075: 2-Chloronaphthalene	91-58-7	2	µg/L	<2	10 µg/L	86.7	61	106
EP075: Acenaphthylene	208-96-8	2	µg/L	<2	10 µg/L	87.5	64	108
EP075: Acenaphthene	83-32-9	2	µg/L	<2	10 µg/L	86.1	65	108
EP075: Fluorene	86-73-7	2	µg/L	<2	10 µg/L	85.7	65	107
EP075: Phenanthrene	85-01-8	2	µg/L	<2	10 µg/L	86.7	67	108
EP075: Anthracene	120-12-7	2	µg/L	<2	10 µg/L	86.5	66	108
EP075: Fluoranthene	206-44-0	2	µg/L	<2	10 µg/L	80.2	65	109
EP075: Pyrene	129-00-0	2	µg/L	<2	10 µg/L	79.8	60	111
EP075: N-2-Fluorenyl Acetamide	53-96-3	2	µg/L	<2	10 µg/L	77.1	60	110
EP075: Benz(a)anthracene	56-55-3	2	µg/L	<2	10 µg/L	71.2	62	112
EP075: Chrysene	218-01-9	2	µg/L	<2	10 µg/L	71.0	59	114
EP075: Benzo(b+j) & Benzo(k)fluoranthene	205-99-2 207-08-9	4	µg/L	<4	20 µg/L	73.7	60	111
EP075: 7.12-Dimethylbenz(a)anthracene	57-97-6	2	µg/L	<2	10 µg/L	82.6	50	108
EP075: Benzo(a)pyrene	50-32-8	2	µg/L	<2	10 µg/L	77.5	59	112
EP075: 3-Methylcholanthrene	56-49-5	2	µg/L	<2	10 µg/L	81.2	60	110
EP075: Indeno(1.2.3.cd)pyrene	193-39-5	2	µg/L	<2	10 µg/L	74.8	60	110
EP075: Dibenz(a.h)anthracene	53-70-3	2	µg/L	<2	10 µg/L	77.2	57	109
EP075: Benzo(g.h.i)perylene	191-24-2	2	µg/L	<2	10 µg/L	82.3	61	110

Sub-Matrix: **WATER**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP075B: Polynuclear Aromatic Hydrocarbons (QCLot: 2193848) - continued								
EP075: Benzo(a)pyrene TEQ (zero)	----	2	µg/L	<2	----	----	----	----
EP075C: Phthalate Esters (QCLot: 2193848)								
EP075: Dimethyl phthalate	131-11-3	2	µg/L	<2	10 µg/L	91.8	64	112
EP075: Diethyl phthalate	84-66-2	2	µg/L	<2	10 µg/L	88.1	67	111
EP075: Di-n-butyl phthalate	84-74-2	2	µg/L	<2	10 µg/L	87.6	68	122
EP075: Butyl benzyl phthalate	85-68-7	2	µg/L	<2	10 µg/L	73.1	61	114
EP075: bis(2-ethylhexyl) phthalate	117-81-7	----	µg/L	----	10 µg/L	89.7	60	132
EP075: Di-n-octylphthalate	117-84-0	2	µg/L	<2	10 µg/L	77.5	62	115
EP075D: Nitrosamines (QCLot: 2193848)								
EP075: N-Nitrosomethylethylamine	10595-95-6	2	µg/L	<2	10 µg/L	54.7	46	110
EP075: N-Nitrosodiethylamine	55-18-5	2	µg/L	<2	10 µg/L	68.9	61	113
EP075: N-Nitrosopyrrolidine	930-55-2	4	µg/L	<4	10 µg/L	59.1	45	91
EP075: N-Nitrosomorpholine	59-89-2	2	µg/L	<2	10 µg/L	56.8	42	100
EP075: N-Nitrosodi-n-propylamine	621-64-7	2	µg/L	<2	10 µg/L	84.3	64	108
EP075: N-Nitrosopiperidine	100-75-4	2	µg/L	<2	10 µg/L	77.6	62	107
EP075: N-Nitrosodibutylamine	924-16-3	2	µg/L	<2	10 µg/L	96.2	63	108
EP075: N-Nitrosodiphenyl & Diphenylamine	86-30-6 122-39-4	4	µg/L	<4	20 µg/L	84.0	65	112
EP075: Methapyrilene	91-80-5	2	µg/L	<2	10 µg/L	31.5	23	125
EP075E: Nitroaromatics and Ketones (QCLot: 2193848)								
EP075: 2-Picoline	109-06-8	2	µg/L	<2	10 µg/L	57.8	41	109
EP075: Acetophenone	98-86-2	2	µg/L	<2	10 µg/L	82.3	68	112
EP075: Nitrobenzene	98-95-3	2	µg/L	<2	10 µg/L	75.0	68	112
EP075: Isophorone	78-59-1	2	µg/L	<2	10 µg/L	89.5	68	111
EP075: 2.6-Dinitrotoluene	606-20-2	4	µg/L	<4	10 µg/L	88.8	64	113
EP075: 2.4-Dinitrotoluene	121-14-2	4	µg/L	<4	10 µg/L	81.4	60	109
EP075: 1-Naphthylamine	134-32-7	2	µg/L	<2	10 µg/L	92.2	47	102
EP075: 4-Nitroquinoline-N-oxide	56-57-5	2	µg/L	<2	10 µg/L	54.7	40	96
EP075: 5-Nitro-o-toluidine	99-55-8	2	µg/L	<2	10 µg/L	84.4	58	106
EP075: Azobenzene	103-33-3	2	µg/L	<2	10 µg/L	87.2	66	112
EP075: 1.3.5-Trinitrobenzene	99-35-4	2	µg/L	<2	10 µg/L	75.9	46	108
EP075: Phenacetin	62-44-2	2	µg/L	<2	10 µg/L	83.6	58	101
EP075: 4-Aminobiphenyl	92-67-1	2	µg/L	<2	10 µg/L	90.2	60	112
EP075: Pentachloronitrobenzene	82-68-8	2	µg/L	<2	10 µg/L	81.1	59	109
EP075: Pronamide	23950-58-5	2	µg/L	<2	10 µg/L	86.5	63	109
EP075: Dimethylaminoazobenzene	60-11-7	2	µg/L	<2	10 µg/L	73.7	59	108
EP075: Chlorobenzilate	510-15-6	2	µg/L	<2	10 µg/L	75.8	58	110
EP075F: Haloethers (QCLot: 2193848)								

Sub-Matrix: **WATER**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP075F: Haloethers (QCLot: 2193848) - continued								
EP075: Bis(2-chloroethyl) ether	111-44-4	2	µg/L	<2	10 µg/L	75.9	69	112
EP075: Bis(2-chloroethoxy) methane	111-91-1	2	µg/L	<2	10 µg/L	87.3	66	111
EP075: 4-Chlorophenyl phenyl ether	7005-72-3	2	µg/L	<2	10 µg/L	86.7	65	109
EP075: 4-Bromophenyl phenyl ether	101-55-3	2	µg/L	<2	10 µg/L	89.5	62	108
EP075G: Chlorinated Hydrocarbons (QCLot: 2193848)								
EP075: 1.4-Dichlorobenzene	106-46-7	2	µg/L	<2	10 µg/L	89.7	41	97
EP075: 1.3-Dichlorobenzene	541-73-1	2	µg/L	<2	10 µg/L	86.5	40	96
EP075: 1.2-Dichlorobenzene	95-50-1	2	µg/L	<2	10 µg/L	85.7	41	95
EP075: Hexachloroethane	67-72-1	2	µg/L	<2	10 µg/L	72.8	46	88
EP075: 1.2.4-Trichlorobenzene	120-82-1	2	µg/L	<2	10 µg/L	85.6	46	96
EP075: Hexachloropropylene	1888-71-7	2	µg/L	<2	10 µg/L	84.3	34	96
EP075: Hexachlorobutadiene	87-68-3	2	µg/L	<2	10 µg/L	83.5	37	100
EP075: Hexachlorocyclopentadiene	77-47-4	10	µg/L	<10	10 µg/L	# 23.5	24	107
EP075: Pentachlorobenzene	608-93-5	2	µg/L	<2	10 µg/L	85.2	65	107
EP075: Hexachlorobenzene (HCB)	118-74-1	4	µg/L	<4	10 µg/L	83.0	66	110
EP075H: Anilines and Benzidines (QCLot: 2193848)								
EP075: Aniline	62-53-3	2	µg/L	<2	10 µg/L	76.8	50	104
EP075: 4-Chloroaniline	106-47-8	2	µg/L	<2	10 µg/L	84.2	42	106
EP075: 2-Nitroaniline	88-74-4	4	µg/L	<4	10 µg/L	86.1	61	110
EP075: 3-Nitroaniline	99-09-2	4	µg/L	<4	10 µg/L	81.2	52	97
EP075: Dibenzofuran	132-64-9	2	µg/L	<2	10 µg/L	86.3	65	108
EP075: 4-Nitroaniline	100-01-8	2	µg/L	<2	10 µg/L	79.6	49	100
EP075: Carbazole	86-74-8	2	µg/L	<2	10 µg/L	84.3	64	107
EP075: 3.3`-Dichlorobenzidine	91-94-1	2	µg/L	<2	10 µg/L	68.3	60	119
EP075I: Organochlorine Pesticides (QCLot: 2193848)								
EP075: alpha-BHC	319-84-6	2	µg/L	<2	10 µg/L	86.6	64	110
EP075: beta-BHC	319-85-7	2	µg/L	<2	10 µg/L	82.2	53	107
EP075: gamma-BHC	58-89-9	2	µg/L	<2	10 µg/L	82.9	51	111
EP075: delta-BHC	319-86-8	2	µg/L	<2	10 µg/L	85.8	57	111
EP075: Heptachlor	76-44-8	2	µg/L	<2	10 µg/L	83.8	58	108
EP075: Aldrin	309-00-2	2	µg/L	<2	10 µg/L	81.9	56	112
EP075: Heptachlor epoxide	1024-57-3	2	µg/L	<2	10 µg/L	81.5	50	118
EP075: alpha-Endosulfan	959-98-8	2	µg/L	<2	10 µg/L	74.1	59	111
EP075: 4.4`-DDE	72-55-9	2	µg/L	<2	10 µg/L	79.4	53	115
EP075: Dieldrin	60-57-1	2	µg/L	<2	10 µg/L	79.0	59	115
EP075: Endrin	72-20-8	2	µg/L	<2	10 µg/L	81.8	58	114
EP075: beta-Endosulfan	33213-65-9	2	µg/L	<2	10 µg/L	77.3	54	116
EP075: 4.4`-DDD	72-54-8	2	µg/L	<2	10 µg/L	76.7	55	115

Sub-Matrix: **WATER**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP075I: Organochlorine Pesticides (QCLot: 2193848) - continued								
EP075: Endosulfan sulfate	1031-07-8	2	µg/L	<2	10 µg/L	77.0	53	114
EP075: 4.4`-DDT	50-29-3	4	µg/L	<4	10 µg/L	75.2	56	114
EP075: Sum of Aldrin + Dieldrin	309-00-2/60-57-1	4	µg/L	<4	----	----	----	----
EP075: Sum of DDD + DDE + DDT	72-54-8/72-5 5-9/50-2	4	µg/L	<4	----	----	----	----
EP075J: Organophosphorus Pesticides (QCLot: 2193848)								
EP075: Dichlorvos	62-73-7	2	µg/L	<2	10 µg/L	91.9	51	113
EP075: Dimethoate	60-51-5	2	µg/L	<2	10 µg/L	77.7	43	109
EP075: Diazinon	333-41-5	2	µg/L	<2	10 µg/L	88.2	49	113
EP075: Chlorpyrifos-methyl	5598-13-0	2	µg/L	<2	10 µg/L	87.6	54	116
EP075: Malathion	121-75-5	2	µg/L	<2	10 µg/L	102	54	124
EP075: Fenthion	55-38-9	2	µg/L	<2	10 µg/L	84.3	57	115
EP075: Chlorpyrifos	2921-88-2	2	µg/L	<2	10 µg/L	83.1	53	109
EP075: Pirimphos-ethyl	23505-41-1	2	µg/L	<2	10 µg/L	82.6	55	111
EP075: Chlorfenvinphos	470-90-6	2	µg/L	<2	10 µg/L	80.3	50	116
EP075: Prothiofos	34643-46-4	2	µg/L	<2	10 µg/L	83.4	54	118
EP075: Ethion	563-12-2	2	µg/L	<2	10 µg/L	76.4	51	117
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2193849)								
EP071: C10 - C14 Fraction	----	50	µg/L	<50	2000 µg/L	80.7	76	116
EP071: C15 - C28 Fraction	----	100	µg/L	<100	3000 µg/L	96.4	83	109
EP071: C29 - C36 Fraction	----	50	µg/L	<50	2000 µg/L	99.6	75	113
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2194301)								
EP080: C6 - C9 Fraction	----	20	µg/L	<20	260 µg/L	75.8	75	127
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2193849)								
EP071: >C10 - C16 Fraction	----	100	µg/L	<100	2500 µg/L	86.1	76	114
EP071: >C16 - C34 Fraction	----	100	µg/L	<100	3500 µg/L	100	81	111
EP071: >C34 - C40 Fraction	----	100	µg/L	<100	1500 µg/L	103	77	119
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2194301)								
EP080: C6 - C10 Fraction	C6_C10	20	µg/L	<20	310 µg/L	79.3	75	127
EP080: BTEXN (QCLot: 2194301)								
EP080: Benzene	71-43-2	1	µg/L	<1	10 µg/L	86.3	70	122
EP080: Toluene	108-88-3	2	µg/L	<2	10 µg/L	89.4	69	123
EP080: Ethylbenzene	100-41-4	2	µg/L	<2	10 µg/L	91.5	70	120
EP080: meta- & para-Xylene	108-38-3 106-42-3	2	µg/L	<2	10 µg/L	88.4	69	121
EP080: ortho-Xylene	95-47-6	2	µg/L	<2	10 µg/L	93.7	72	122
EP080: Naphthalene	91-20-3	5	µg/L	<5	10 µg/L	104	70	120

Sub-Matrix: **WATER**

Method: Compound	CAS Number	LOR	Unit	Method Blank (MB) Report	Laboratory Control Spike (LCS) Report			
					Spike	Spike Recovery (%)	Recovery Limits (%)	
				Result	Concentration	LCS	Low	High
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 2195447)								
EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.02	µg/L	<0.02	0.5 µg/L	96.2	70	130
EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.02	µg/L	<0.02	0.5 µg/L	81.0	70	130
EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.02	µg/L	<0.02	0.5 µg/L	92.4	70	130
EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.02	µg/L	<0.02	0.5 µg/L	95.0	70	130
EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.01	µg/L	<0.01	0.5 µg/L	87.6	70	130
EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.02	µg/L	<0.02	0.5 µg/L	98.0	70	130
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 2195447)								
EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	0.1	µg/L	<0.1	2.5 µg/L	95.7	70	130
EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.02	µg/L	<0.02	0.5 µg/L	98.0	70	130
EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.02	µg/L	<0.02	0.5 µg/L	102	70	130
EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.02	µg/L	<0.02	0.5 µg/L	101	70	130
EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.01	µg/L	<0.01	0.5 µg/L	99.2	70	130
EP231X: Perfluorononanoic acid (PFNA)	375-95-1	0.02	µg/L	<0.02	0.5 µg/L	94.4	70	130
EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.02	µg/L	<0.02	0.5 µg/L	101	70	130
EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.02	µg/L	<0.02	0.5 µg/L	106	70	130
EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.02	µg/L	<0.02	0.5 µg/L	113	70	130
EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.02	µg/L	<0.02	0.5 µg/L	111	70	130
EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	0.05	µg/L	<0.05	1.25 µg/L	97.0	70	150
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 2195447)								
EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.02	µg/L	<0.02	0.5 µg/L	95.6	70	130
EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	0.05	µg/L	<0.05	1.25 µg/L	105	70	150
EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	0.05	µg/L	<0.05	1.25 µg/L	99.0	70	150
EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	0.05	µg/L	<0.05	1.25 µg/L	95.2	70	150
EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	0.05	µg/L	<0.05	1.25 µg/L	102	70	150
EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.02	µg/L	<0.02	0.5 µg/L	97.6	70	130
EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.02	µg/L	<0.02	0.5 µg/L	106	70	130
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 2195447)								
EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.05	µg/L	<0.05	0.5 µg/L	96.2	70	130
EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.05	µg/L	<0.05	0.5 µg/L	93.2	70	130
EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.05	µg/L	<0.05	0.5 µg/L	99.8	70	130
EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.05	µg/L	<0.05	0.5 µg/L	107	70	130

Matrix Spike (MS) Report

The quality control term Matrix Spike (MS) refers to an intralaboratory split sample spiked with a representative set of target analytes. The purpose of this QC parameter is to monitor potential matrix effects on analyte recoveries. Static Recovery Limits as per laboratory Data Quality Objectives (DQOs). Ideal recovery ranges stated may be waived in the event of sample matrix interference.

Sub-Matrix: **WATER**

				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Recovery Limits (%)	
Laboratory sample ID	Client sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EG020F: Dissolved Metals by ICP-MS (QCLot: 2195041)							
ES1905103-004	MW4	EG020A-F: Arsenic	7440-38-2	1 mg/L	96.5	70	130
		EG020A-F: Cadmium	7440-43-9	0.25 mg/L	99.3	70	130
		EG020A-F: Chromium	7440-47-3	1 mg/L	103	70	130
		EG020A-F: Copper	7440-50-8	1 mg/L	98.5	70	130
		EG020A-F: Lead	7439-92-1	1 mg/L	99.7	70	130
		EG020A-F: Nickel	7440-02-0	1 mg/L	99.0	70	130
		EG020A-F: Zinc	7440-66-6	1 mg/L	99.1	70	130
EG035F: Dissolved Mercury by FIMS (QCLot: 2195042)							
ES1905103-002	MW2	EG035F: Mercury	7439-97-6	0.01 mg/L	95.7	70	130
EK055G: Ammonia as N by Discrete Analyser (QCLot: 2194843)							
ES1905103-001	MW1	EK055G: Ammonia as N	7664-41-7	9 mg/L	95.6	70	130
EP074A: Monocyclic Aromatic Hydrocarbons (QCLot: 2194300)							
ES1905173-001	Anonymous	EP074: Benzene	71-43-2	25 µg/L	95.8	70	130
		EP074: Toluene	108-88-3	25 µg/L	96.0	70	130
EP074E: Halogenated Aliphatic Compounds (QCLot: 2194300)							
ES1905173-001	Anonymous	EP074: 1.1-Dichloroethene	75-35-4	25 µg/L	75.2	70	130
		EP074: Trichloroethene	79-01-6	25 µg/L	90.1	70	130
EP074F: Halogenated Aromatic Compounds (QCLot: 2194300)							
ES1905173-001	Anonymous	EP074: Chlorobenzene	108-90-7	25 µg/L	105	70	130
EP080/071: Total Petroleum Hydrocarbons (QCLot: 2194301)							
ES1905103-001	MW1	EP080: C6 - C9 Fraction	----	325 µg/L	104	70	130
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions (QCLot: 2194301)							
ES1905103-001	MW1	EP080: C6 - C10 Fraction	C6_C10	375 µg/L	101	70	130
EP080: BTEXN (QCLot: 2194301)							
ES1905103-001	MW1	EP080: Benzene	71-43-2	25 µg/L	97.1	70	130
		EP080: Toluene	108-88-3	25 µg/L	99.4	70	130
		EP080: Ethylbenzene	100-41-4	25 µg/L	99.0	70	130
		EP080: meta- & para-Xylene	108-38-3 106-42-3	25 µg/L	99.4	70	130
		EP080: ortho-Xylene	95-47-6	25 µg/L	100	70	130
		EP080: Naphthalene	91-20-3	25 µg/L	92.5	70	130
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 2195447)							
ES1905103-001	MW1	EP231X: Perfluorobutane sulfonic acid (PFBS)	375-73-5	0.5 µg/L	121	50	130
		EP231X: Perfluoropentane sulfonic acid (PFPeS)	2706-91-4	0.5 µg/L	93.6	50	130

Sub-Matrix: **WATER**

				Matrix Spike (MS) Report			
				Spike	SpikeRecovery(%)	Recovery Limits (%)	
Laboratory sample ID	Client sample ID	Method: Compound	CAS Number	Concentration	MS	Low	High
EP231A: Perfluoroalkyl Sulfonic Acids (QCLot: 2195447) - continued							
ES1905103-001	MW1	EP231X: Perfluorohexane sulfonic acid (PFHxS)	355-46-4	0.5 µg/L	104	50	130
		EP231X: Perfluoroheptane sulfonic acid (PFHpS)	375-92-8	0.5 µg/L	118	50	130
		EP231X: Perfluorooctane sulfonic acid (PFOS)	1763-23-1	0.5 µg/L	110	50	130
		EP231X: Perfluorodecane sulfonic acid (PFDS)	335-77-3	0.5 µg/L	118	50	130
EP231B: Perfluoroalkyl Carboxylic Acids (QCLot: 2195447)							
ES1905103-001	MW1	EP231X: Perfluorobutanoic acid (PFBA)	375-22-4	2.5 µg/L	114	50	130
		EP231X: Perfluoropentanoic acid (PFPeA)	2706-90-3	0.5 µg/L	114	50	130
		EP231X: Perfluorohexanoic acid (PFHxA)	307-24-4	0.5 µg/L	121	50	130
		EP231X: Perfluoroheptanoic acid (PFHpA)	375-85-9	0.5 µg/L	120	50	130
		EP231X: Perfluorooctanoic acid (PFOA)	335-67-1	0.5 µg/L	108	50	130
		EP231X: Perfluorodecanoic acid (PFDA)	335-76-2	0.5 µg/L	117	50	130
		EP231X: Perfluoroundecanoic acid (PFUnDA)	2058-94-8	0.5 µg/L	117	50	130
		EP231X: Perfluorododecanoic acid (PFDoDA)	307-55-1	0.5 µg/L	116	50	130
		EP231X: Perfluorotridecanoic acid (PFTrDA)	72629-94-8	0.5 µg/L	119	50	130
		EP231X: Perfluorotetradecanoic acid (PFTeDA)	376-06-7	1.25 µg/L	111	50	150
EP231C: Perfluoroalkyl Sulfonamides (QCLot: 2195447)							
ES1905103-001	MW1	EP231X: Perfluorooctane sulfonamide (FOSA)	754-91-6	0.5 µg/L	112	50	130
		EP231X: N-Methyl perfluorooctane sulfonamide (MeFOSA)	31506-32-8	1.25 µg/L	124	50	150
		EP231X: N-Ethyl perfluorooctane sulfonamide (EtFOSA)	4151-50-2	1.25 µg/L	114	50	150
		EP231X: N-Methyl perfluorooctane sulfonamidoethanol (MeFOSE)	24448-09-7	1.25 µg/L	111	50	150
		EP231X: N-Ethyl perfluorooctane sulfonamidoethanol (EtFOSE)	1691-99-2	1.25 µg/L	117	50	150
		EP231X: N-Methyl perfluorooctane sulfonamidoacetic acid (MeFOSAA)	2355-31-9	0.5 µg/L	115	50	130
		EP231X: N-Ethyl perfluorooctane sulfonamidoacetic acid (EtFOSAA)	2991-50-6	0.5 µg/L	116	50	130
EP231D: (n:2) Fluorotelomer Sulfonic Acids (QCLot: 2195447)							
ES1905103-001	MW1	EP231X: 4:2 Fluorotelomer sulfonic acid (4:2 FTS)	757124-72-4	0.5 µg/L	105	50	130
		EP231X: 6:2 Fluorotelomer sulfonic acid (6:2 FTS)	27619-97-2	0.5 µg/L	109	50	130
		EP231X: 8:2 Fluorotelomer sulfonic acid (8:2 FTS)	39108-34-4	0.5 µg/L	118	50	130
		EP231X: 10:2 Fluorotelomer sulfonic acid (10:2 FTS)	120226-60-0	0.5 µg/L	114	50	130

ALS Environmental

QA/QC Compliance Assessment to assist with Quality Review

Work Order	: **ES1905103**	Page	: 1 of 8
Client	: **ARCADIS AUSTRALIA PACIFIC PTY LTD**	Laboratory	: Environmental Division Sydney
Contact	: MR GREG BARTLETT	Telephone	: +6138549 9644
Project	: King St North ESA	Date Samples Received	: 19-Feb-2019
Site	: ----	Issue Date	: 21-Feb-2019
Sampler	: CAITLAIN REGENA	No. of samples received	: 4
Order number	: 10026439.6	No. of samples analysed	: 4

This report is automatically generated by the ALS LIMS through interpretation of the ALS Quality Control Report and several Quality Assurance parameters measured by ALS. This automated reporting highlights any non-conformances, facilitates faster and more accurate data validation and is designed to assist internal expert and external Auditor review. Many components of this report contribute to the overall DQO assessment and reporting for guideline compliance.

Brief method summaries and references are also provided to assist in traceability.

Summary of Outliers

Outliers : Quality Control Samples

This report highlights outliers flagged in the Quality Control (QC) Report.

- **NO Method Blank value outliers occur.**
- **NO Duplicate outliers occur.**
- **NO Matrix Spike outliers occur.**
- **Laboratory Control outliers exist - please see following pages for full details.**
- **For all regular sample matrices, NO surrogate recovery outliers occur.**

Outliers : Analysis Holding Time Compliance

- **NO Analysis Holding Time Outliers exist.**

Outliers : Frequency of Quality Control Samples

- **Quality Control Sample Frequency Outliers exist - please see following pages for full details.**

Outliers : Quality Control Samples

Duplicates, Method Blanks, Laboratory Control Samples and Matrix Spikes

Matrix: **WATER**

Compound Group Name	Laboratory Sample ID	Client Sample ID	Analyte	CAS Number	Data	Limits	Comment
Laboratory Control Spike (LCS) Recoveries							
EP075G: Chlorinated Hydrocarbons	QC-2193848-002	----	**Hexachlorocyclopentadiene**	77-47-4	23.5 %	24-107%	**Recovery less than lower control limit**

Outliers : Frequency of Quality Control Samples

Matrix: **WATER**

Quality Control Sample Type / Method	Count QC	Count Regular	Rate (%) Actual	Rate (%) Expected	Quality Control Specification
Laboratory Duplicates (DUP)					
Semivolatile Organic Compounds	0	4	0.00	10.00	NEPM 2013 B3 & ALS QC Standard
TRH - Semivolatile Fraction	0	4	0.00	10.00	NEPM 2013 B3 & ALS QC Standard
Matrix Spikes (MS)					
Semivolatile Organic Compounds	0	4	0.00	5.00	NEPM 2013 B3 & ALS QC Standard
TRH - Semivolatile Fraction	0	4	0.00	5.00	NEPM 2013 B3 & ALS QC Standard

Analysis Holding Time Compliance

If samples are identified below as having been analysed or extracted outside of recommended holding times, this should be taken into consideration when interpreting results.

This report summarizes extraction / preparation and analysis times and compares each with ALS recommended holding times (referencing USEPA SW 846, APHA, AS and NEPM) based on the sample container provided. Dates reported represent first date of extraction or analysis and preclude subsequent dilutions and reruns. A listing of breaches (if any) is provided herein.

Holding time for leachate methods (e.g. TCLP) vary according to the analytes reported. Assessment compares the leach date with the shortest analyte holding time for the equivalent soil method. These are: organics 14 days, mercury 28 days & other metals 180 days. A recorded breach does not guarantee a breach for all non-volatile parameters.

Holding times for ***VOC in soils*** vary according to analytes of interest. Vinyl Chloride and Styrene holding time is 7 days; others 14 days. A recorded breach does not guarantee a breach for all VOC analytes and should be verified in case the reported breach is a false positive or Vinyl Chloride and Styrene are not key analytes of interest/concern.

Matrix: **WATER**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / *Container* / Client Sample ID(s)	*Sample Date*	*Extraction / Preparation* Date extracted	Due for extraction	Evaluation	*Analysis* Date analysed	Due for analysis	Evaluation
EG020F: Dissolved Metals by ICP-MS							
Clear Plastic Bottle - Nitric Acid; Filtered (EG020A-F)							
MW1, MW2, MW3, MW4	**19-Feb-2019**	**----**	----	----	**20-Feb-2019**	18-Aug-2019	✓
EG035F: Dissolved Mercury by FIMS							
Clear Plastic Bottle - Nitric Acid; Filtered (EG035F)							
MW1, MW2, MW3, MW4	**19-Feb-2019**	**----**	----	----	**20-Feb-2019**	19-Mar-2019	✓
EK055G: Ammonia as N by Discrete Analyser							
Clear Plastic Bottle - Sulfuric Acid (EK055G)							
MW1, MW2, MW3, MW4	**19-Feb-2019**	**----**	----	----	**20-Feb-2019**	19-Mar-2019	✓

Matrix: **WATER**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP074A: Monocyclic Aromatic Hydrocarbons							
Amber VOC Vial - Sulfuric Acid (EP074)							
MW1, MW2, MW3, MW4	**19-Feb-2019**	**19-Feb-2019**	05-Mar-2019	✓	**19-Feb-2019**	05-Mar-2019	✓
EP074B: Oxygenated Compounds							
Amber VOC Vial - Sulfuric Acid (EP074)							
MW1, MW2, MW3, MW4	**19-Feb-2019**	**19-Feb-2019**	05-Mar-2019	✓	**19-Feb-2019**	05-Mar-2019	✓
EP074C: Sulfonated Compounds							
Amber VOC Vial - Sulfuric Acid (EP074)							
MW1, MW2, MW3, MW4	**19-Feb-2019**	**19-Feb-2019**	05-Mar-2019	✓	**19-Feb-2019**	05-Mar-2019	✓
EP074D: Fumigants							
Amber VOC Vial - Sulfuric Acid (EP074)							
MW1, MW2, MW3, MW4	**19-Feb-2019**	**19-Feb-2019**	05-Mar-2019	✓	**19-Feb-2019**	05-Mar-2019	✓
EP074E: Halogenated Aliphatic Compounds							
Amber VOC Vial - Sulfuric Acid (EP074)							
MW1, MW2, MW3, MW4	**19-Feb-2019**	**19-Feb-2019**	05-Mar-2019	✓	**19-Feb-2019**	05-Mar-2019	✓
EP074F: Halogenated Aromatic Compounds							
Amber VOC Vial - Sulfuric Acid (EP074)							
MW1, MW2, MW3, MW4	**19-Feb-2019**	**19-Feb-2019**	05-Mar-2019	✓	**19-Feb-2019**	05-Mar-2019	✓
EP074G: Trihalomethanes							
Amber VOC Vial - Sulfuric Acid (EP074)							
MW1, MW2, MW3, MW4	**19-Feb-2019**	**19-Feb-2019**	05-Mar-2019	✓	**19-Feb-2019**	05-Mar-2019	✓
EP075A: Phenolic Compounds							
Amber Glass Bottle - Unpreserved (EP075)							
MW1, MW2, MW3, MW4	**19-Feb-2019**	**19-Feb-2019**	26-Feb-2019	✓	**20-Feb-2019**	31-Mar-2019	✓
EP075B: Polynuclear Aromatic Hydrocarbons							
Amber Glass Bottle - Unpreserved (EP075)							
MW1, MW2, MW3, MW4	**19-Feb-2019**	**19-Feb-2019**	26-Feb-2019	✓	**20-Feb-2019**	31-Mar-2019	✓
EP075C: Phthalate Esters							
Amber Glass Bottle - Unpreserved (EP075)							
MW1, MW2, MW3, MW4	**19-Feb-2019**	**19-Feb-2019**	26-Feb-2019	✓	**20-Feb-2019**	31-Mar-2019	✓

Matrix: **WATER**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP075D: Nitrosamines							
Amber Glass Bottle - Unpreserved (EP075)							
MW1, MW2, MW3, MW4	**19-Feb-2019**	**19-Feb-2019**	26-Feb-2019	✓	**20-Feb-2019**	31-Mar-2019	✓
EP075E: Nitroaromatics and Ketones							
Amber Glass Bottle - Unpreserved (EP075)							
MW1, MW2, MW3, MW4	**19-Feb-2019**	**19-Feb-2019**	26-Feb-2019	✓	**20-Feb-2019**	31-Mar-2019	✓
EP075F: Haloethers							
Amber Glass Bottle - Unpreserved (EP075)							
MW1, MW2, MW3, MW4	**19-Feb-2019**	**19-Feb-2019**	26-Feb-2019	✓	**20-Feb-2019**	31-Mar-2019	✓
EP075G: Chlorinated Hydrocarbons							
Amber Glass Bottle - Unpreserved (EP075)							
MW1, MW2, MW3, MW4	**19-Feb-2019**	**19-Feb-2019**	26-Feb-2019	✓	**20-Feb-2019**	31-Mar-2019	✓
EP075H: Anilines and Benzidines							
Amber Glass Bottle - Unpreserved (EP075)							
MW1, MW2, MW3, MW4	**19-Feb-2019**	**19-Feb-2019**	26-Feb-2019	✓	**20-Feb-2019**	31-Mar-2019	✓
EP075I: Organochlorine Pesticides							
Amber Glass Bottle - Unpreserved (EP075)							
MW1, MW2, MW3, MW4	**19-Feb-2019**	**19-Feb-2019**	26-Feb-2019	✓	**20-Feb-2019**	31-Mar-2019	✓
EP075J: Organophosphorus Pesticides							
Amber Glass Bottle - Unpreserved (EP075)							
MW1, MW2, MW3, MW4	**19-Feb-2019**	**19-Feb-2019**	26-Feb-2019	✓	**20-Feb-2019**	31-Mar-2019	✓
EP080/071: Total Petroleum Hydrocarbons							
Amber Glass Bottle - Unpreserved (EP071)							
MW1, MW2, MW3, MW4	**19-Feb-2019**	**19-Feb-2019**	26-Feb-2019	✓	**20-Feb-2019**	31-Mar-2019	✓
Amber VOC Vial - Sulfuric Acid (EP080)							
MW1, MW2, MW3, MW4	**19-Feb-2019**	**19-Feb-2019**	05-Mar-2019	✓	**19-Feb-2019**	05-Mar-2019	✓
EP080/071: Total Recoverable Hydrocarbons - NEPM 2013 Fractions							
Amber Glass Bottle - Unpreserved (EP071)							
MW1, MW2, MW3, MW4	**19-Feb-2019**	**19-Feb-2019**	26-Feb-2019	✓	**20-Feb-2019**	31-Mar-2019	✓
Amber VOC Vial - Sulfuric Acid (EP080)							
MW1, MW2, MW3, MW4	**19-Feb-2019**	**19-Feb-2019**	05-Mar-2019	✓	**19-Feb-2019**	05-Mar-2019	✓

Matrix: **WATER**

Evaluation: × = Holding time breach ; ✓ = Within holding time.

Method / Container / Client Sample ID(s)	Sample Date	Extraction / Preparation			Analysis		
		Date extracted	Due for extraction	Evaluation	Date analysed	Due for analysis	Evaluation
EP080: BTEXN							
Amber VOC Vial - Sulfuric Acid (EP080)							
MW1, MW2, MW3, MW4	**19-Feb-2019**	**19-Feb-2019**	05-Mar-2019	✓	**19-Feb-2019**	05-Mar-2019	✓
EP231A: Perfluoroalkyl Sulfonic Acids							
HDPE (no PTFE) (EP231X)							
MW1, MW2, MW3, MW4	**19-Feb-2019**	**20-Feb-2019**	18-Aug-2019	✓	**20-Feb-2019**	18-Aug-2019	✓
EP231B: Perfluoroalkyl Carboxylic Acids							
HDPE (no PTFE) (EP231X)							
MW1, MW2, MW3, MW4	**19-Feb-2019**	**20-Feb-2019**	18-Aug-2019	✓	**20-Feb-2019**	18-Aug-2019	✓
EP231C: Perfluoroalkyl Sulfonamides							
HDPE (no PTFE) (EP231X)							
MW1, MW2, MW3, MW4	**19-Feb-2019**	**20-Feb-2019**	18-Aug-2019	✓	**20-Feb-2019**	18-Aug-2019	✓
EP231D: (n:2) Fluorotelomer Sulfonic Acids							
HDPE (no PTFE) (EP231X)							
MW1, MW2, MW3, MW4	**19-Feb-2019**	**20-Feb-2019**	18-Aug-2019	✓	**20-Feb-2019**	18-Aug-2019	✓
EP231P: PFAS Sums							
HDPE (no PTFE) (EP231X)							
MW1, MW2, MW3, MW4	**19-Feb-2019**	**20-Feb-2019**	18-Aug-2019	✓	**20-Feb-2019**	18-Aug-2019	✓

Quality Control Parameter Frequency Compliance

The following report summarises the frequency of laboratory QC samples analysed within the analytical lot(s) in which the submitted sample(s) was(were) processed. Actual rate should be greater than or equal to the expected rate. A listing of breaches is provided in the Summary of Outliers.

Matrix: **WATER**

Evaluation: × = Quality Control frequency not within specification ; ✓ = Quality Control frequency within specification.

Quality Control Sample Type		Count		Rate (%)			Quality Control Specification
Analytical Methods	*Method*	*QC*	*Regular*	***Actual***	***Expected***	*Evaluation*	
Laboratory Duplicates (DUP)							
Ammonia as N by Discrete analyser	EK055G	1	5	**20.00**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Dissolved Mercury by FIMS	EG035F	1	8	**12.50**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Dissolved Metals by ICP-MS - Suite A	EG020A-F	1	7	**14.29**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	1	4	**25.00**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Semivolatile Organic Compounds	EP075	0	4	**0.00**	**10.00**	×	NEPM 2013 B3 & ALS QC Standard
TRH - Semivolatile Fraction	EP071	0	4	**0.00**	**10.00**	×	NEPM 2013 B3 & ALS QC Standard
TRH Volatiles/BTEX	EP080	1	6	**16.67**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Volatile Organic Compounds	EP074	1	6	**16.67**	**10.00**	✓	NEPM 2013 B3 & ALS QC Standard
Laboratory Control Samples (LCS)							
Ammonia as N by Discrete analyser	EK055G	1	5	**20.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Dissolved Mercury by FIMS	EG035F	1	8	**12.50**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Dissolved Metals by ICP-MS - Suite A	EG020A-F	1	7	**14.29**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	1	4	**25.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Semivolatile Organic Compounds	EP075	1	4	**25.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH - Semivolatile Fraction	EP071	1	4	**25.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH Volatiles/BTEX	EP080	1	6	**16.67**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Volatile Organic Compounds	EP074	1	6	**16.67**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Method Blanks (MB)							
Ammonia as N by Discrete analyser	EK055G	1	5	**20.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Dissolved Mercury by FIMS	EG035F	1	8	**12.50**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Dissolved Metals by ICP-MS - Suite A	EG020A-F	1	7	**14.29**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	1	4	**25.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Semivolatile Organic Compounds	EP075	1	4	**25.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH - Semivolatile Fraction	EP071	1	4	**25.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
TRH Volatiles/BTEX	EP080	1	6	**16.67**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Volatile Organic Compounds	EP074	1	6	**16.67**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Matrix Spikes (MS)							
Ammonia as N by Discrete analyser	EK055G	1	5	**20.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Dissolved Mercury by FIMS	EG035F	1	8	**12.50**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Dissolved Metals by ICP-MS - Suite A	EG020A-F	1	7	**14.29**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	1	4	**25.00**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Semivolatile Organic Compounds	EP075	0	4	**0.00**	**5.00**	×	NEPM 2013 B3 & ALS QC Standard
TRH - Semivolatile Fraction	EP071	0	4	**0.00**	**5.00**	×	NEPM 2013 B3 & ALS QC Standard
TRH Volatiles/BTEX	EP080	1	6	**16.67**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard
Volatile Organic Compounds	EP074	1	6	**16.67**	**5.00**	✓	NEPM 2013 B3 & ALS QC Standard

Brief Method Summaries

The analytical procedures used by the Environmental Division have been developed from established internationally recognized procedures such as those published by the US EPA, APHA, AS and NEPM. In house developed procedures are employed in the absence of documented standards or by client request. The following report provides brief descriptions of the analytical procedures employed for results reported in the Certificate of Analysis. Sources from which ALS methods have been developed are provided within the Method Descriptions.

Analytical Methods	Method	Matrix	Method Descriptions
Dissolved Metals by ICP-MS - Suite A	EG020A-F	WATER	In house: Referenced to APHA 3125; USEPA SW846 - 6020, ALS QWI-EN/EG020. Samples are 0.45µm filtered prior to analysis. The ICPMS technique utilizes a highly efficient argon plasma to ionize selected elements. Ions are then passed into a high vacuum mass spectrometer, which separates the analytes based on their distinct mass to charge ratios prior to their measurement by a discrete dynode ion detector.
Dissolved Mercury by FIMS	EG035F	WATER	In house: Referenced to AS 3550, APHA 3112 Hg - B (Flow-injection (SnCl2)(Cold Vapour generation) AAS) Samples are 0.45µm filtered prior to analysis. FIM-AAS is an automated flameless atomic absorption technique. A bromate/bromide reagent is used to oxidise any organic mercury compounds in the filtered sample. The ionic mercury is reduced online to atomic mercury vapour by SnCl2 which is then purged into a heated quartz cell. Quantification is by comparing absorbance against a calibration curve. This method is compliant with NEPM (2013) Schedule B(3)
Ammonia as N by Discrete analyser	EK055G	WATER	In house: Referenced to APHA 4500-NH3 G Ammonia is determined by direct colorimetry by Discrete Analyser. This method is compliant with NEPM (2013) Schedule B(3)
TRH - Semivolatile Fraction	EP071	WATER	In house: Referenced to USEPA SW 846 - 8015A The sample extract is analysed by Capillary GC/FID and quantification is by comparison against an established 5 point calibration curve of n-Alkane standards. This method is compliant with the QC requirements of NEPM (2013) Schedule B(3)
Volatile Organic Compounds	EP074	WATER	In house: Referenced to USEPA SW 846 - 8260B Water samples are directly purged prior to analysis by Capillary GC/MS and quantification is by comparison against an established 5 point calibration curve. This method is compliant with NEPM (2013) Schedule B(3)
Semivolatile Organic Compounds	EP075	WATER	In house: Referenced to USEPA SW 846 - 8270D Sample extracts are analysed by Capillary GC/MS and quantification is by comparison against an established 5 point calibration curve. This method is compliant with NEPM (2013) Schedule B(3)
TRH Volatiles/BTEX	EP080	WATER	In house: Referenced to USEPA SW 846 - 8260B Water samples are directly purged prior to analysis by Capillary GC/MS and quantification is by comparison against an established 5 point calibration curve. Alternatively, a sample is equilibrated in a headspace vial and a portion of the headspace determined by GCMS analysis. This method is compliant with the QC requirements of NEPM (2013) Schedule B(3)
Per- and Polyfluoroalkyl Substances (PFAS) by LCMSMS	EP231X	WATER	In house: Direct injection analysis of fresh waters after dilution (1:1) with methanol. Analysis by LC-Electrospray-MS-MS, Negative Mode using MRM. Where commercially available, isotopically labelled analogues of the target analytes are used as internal standards for quantification. Where a labelled analogue is not commercially available, the internal standard with similar chemistry and the closest retention time to the target is used for quantification. The DQO for internal standard response is 50-150% of that established at initial calibration. PFOS is quantified using a certified, traceable standard consisting of linear and branched PFOS isomers. This method complies with the quality control definitions as stated in QSM 5.1. Data is reviewed in line with the DQOs as stated in QSM5.1

Preparation Methods	Method	Matrix	Method Descriptions
Preparation for PFAS in water.	EP231-PR	WATER	Method presumes direct injection without workup. Preparation includes addition of internal standard and surrogate, and filtration prior to anaylsis.

Preparation Methods	Method	Matrix	Method Descriptions
Separatory Funnel Extraction of Liquids	ORG14	WATER	In house: Referenced to USEPA SW 846 - 3510B 100 mL to 1L of sample is transferred to a separatory funnel and serially extracted three times using DCM for each extract. The resultant extracts are combined, dehydrated and concentrated for analysis. This method is compliant with NEPM (2013) Schedule B(3) . ALS default excludes sediment which may be resident in the container.
Volatiles Water Preparation	ORG16-W	WATER	A 5 mL aliquot or 5 mL of a diluted sample is added to a 40 mL VOC vial for sparging.

20/2/19

CHAIN OF CUSTODY

ALS Laboratory: please tick →

ADELAIDE 21 Burma Road Pooraka SA 5095 Ph: 08 8359 0890 E: adelaide@alsglobal.com

BRISBANE 32 Shand Street Stafford QLD 4053 Ph: 07 3243 7222 E: samples.brisbane@alsglobal.com

GLADSTONE 46 Callemondah Drive Clinton QLD 4680 Ph: 07 7471 5600 E: gladstone@alsglobal.com

MACKAY 78 Harbour Road Mackay QLD 4740 Ph: 07 4944 0177 E: mackay@alsglobal.com

MELBOURNE 2-4 Westall Road Springvale VIC 3171 Ph: 03 8549 9600 E: samples.melbourne@alsglobal.com

MUDGEE 27 Sydney Road Mudgee NSW 2850 Ph: 02 6372 0735 E: mudgee.mail@alsglobal.com

NEWCASTLE 5/585 Maitland Rd Mayfield West NSW 2304 Ph: 02 4014 2500 E: samples.newcastle@alsglobal.com

NOWRA 4/13 Geary Place North Nowra NSW 2541 Ph: 024423 2063 E: nowra@alsglobal.com

PERTH 10 Hod Way Malaga WA 6090 Ph: 08 9209 7655 E: samples.perth@alsglobal.com

SYDNEY 277-289 Woodpark Road Smithfield NSW 2164 Ph: 02 8784 8555 E: samples.sydney@alsglobal.com

TOWNSVILLE 14-15 Desma Court Bohle QLD 4818 Ph: 07 4796 0600 E: townsville.environmental@alsglobal.com

WOLLONGONG 99 Kenny Street Wollongong NSW 2500 Ph: 02 4225 3125 E: portkembla@alsglobal.com

CLIENT: Arcadis Australia Pacific Pty Ltd	TURNAROUND REQUIREMENTS : (Standard TAT may be longer for some tests e.g. Ultra Trace Organics)	1 DAY TAT (List due date): ☒ URGENT TAT (List due date): 20/02/19	FOR LABORATORY USE ONLY (Circle): Custody Seal Intact? Yes No N/A; Cooling Ice / frozen ice bricks present upon receipt? Yes No N/A; Random Sample Temperature on Receipt: 9.9 °C; Other comment:
OFFICE: Level 16, 680 George Street, Sydney NSW 2000			
PROJECT: King St North ESA	ALS QUOTE NO.:	COC SEQUENCE NUMBER (Circle) COC: 1 2 3 4 5 6 7 OF: 1 2 3 4 5 6 7	
ORDER NUMBER: 10026439.6			
PROJECT MANAGER: Greg Bartlett	CONTACT PH:		
SAMPLER: Caitlain Regena	SAMPLER MOBILE: 0438263112	RELINQUISHED BY: Caitlain Regena	RECEIVED BY:
COC emailed to ALS? (NO)	EDD FORMAT (or default): ESDAT	DATE/TIME: 19/2/19	DATE/TIME:
Email Reports to (will default to PM if no other addresses are listed): Caitlain.Regena@arcadis.com		RELINQUISHED BY:	RECEIVED BY: MC
Email Invoice to (will default to PM if no other addresses are listed): AU.Accounts.Payable@arcadis.com		DATE/TIME:	DATE/TIME: 19/2/19 1:00pm

COMMENTS/SPECIAL HANDLING/STORAGE OR DISPOSAL:

ALS USE	SAMPLE DETAILS MATRIX: SOLID (S) WATER (W)			CONTAINER INFORMATION	ANALYSIS REQUIRED Including SUITES (NB. Suite Codes must be listed to attract suite price) Where Metals are required, specify Total (unfiltered bottle required) or Dissolved (field filtered bottle required).									Additional Information
LAB ID	SAMPLE ID	DATE / TIME	MATRIX	TYPE & PRESERVATIVE (refer to codes below)	W-23	W-2	Ammonia	PFAS (Standard)	TRH					Comments on likely contaminant l or samples requiring specific QC a
1	MW1	19-02-19	W		X	X	X	X	X					
2	MW2	19-02-19	W		X	X	X	X	X					
3	MW3	19-02-19	W		X	X	X	X	X					
4	MW4	19-02-19	W		X	X	X	X	X					
	TAT													
x	HT URGENT													
				TOTAL	4	4	4	4	4					

Environmental Division Sydney
Work Order Reference
ES1905103

Telephone : +61-2-8784 8555

Water Container Codes: P = Unpreserved Plastic; N = Nitric Preserved Plastic; ORC = Nitric Preserved ORC; SH = Sodium Hydroxide/Cd Preserved; S = Sodium Hydroxide Preserved Plastic; AG = Amber Glass Unpreserved; AP - Airfreight Unpreserved Plastic
V = VOA Vial HCl Preserved; VB = VOA Vial Sodium Bisulphate Preserved; VS = VOA Vial Sulfuric Preserved; AV = Airfreight Unpreserved Vial SG = Sulfuric Preserved Amber Glass; H = HCl preserved Plastic; HS = HCl preserved Speciation bottle; SP = Sulfuric Preserved Plastic; F = Formaldehyde Preserved Glass;
Z = Zinc Acetate Preserved Bottle; E = EDTA Preserved Bottles; ST = Sterile Bottle; ASS = Plastic Bag for Acid Sulphate Soils; B = Unpreserved Bag.

APPENDIX F **BORE LOGS**

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH01**
Project Number:	**10026439**
Hole Depth:	**2.00 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**12/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, HA, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Sample DUP TRIP	Observations / Comments
CC		0.050				Fill	**ASPHALT** - black, hard.					
HA, SFA, PT		0.5				Fill	**FILL** - Silty SAND, light brown, poorly compacted, coarse grained sand, poorly sorted, angular gravel. Becoming dark grey to black at 0.3m..	slightly moist		BH01_0.5		No odour. No PACM.
		0.700				Fill	**FILL** - Sandy SILT, black, poorly compacted, fine grained, poorly sorted.	slightly moist	0.4	BH01_1.0		No odour. No PACM.
		1.0										
		1.300										
		1.5			ML	Natural	**Sandy SILT** - dark grey, loose, fine grained, well sorted, organics, minor roots throughout.					Sulfur odour. No PACM.
		2.0					**End of Hole at 2.000 m** Target depth.			BH01_2.0	DUP1 TRIP1	
		2.5										
		3.0										
		3.5										
		4.0										
		4.5										

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **12/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:18 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH02**
Project Number:	**10026439**
Hole Depth:	**2.50 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**12/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**HA, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC		0.050					**ASPHALT** - black, hard.				
HA, SFA, PT		0.5				Fill	**FILL** - Silty SAND, dark grey, poorly compacted, poorly sorted, angular gravel.	slightly moist			No odour. No PACM.
		1.0							0.3	BH02_1.0	
		1.5					Becoming light brown at 1.3m.	moist	0.2	BH02_1.5	
		1.800									
		2.0			SM	Natural	**Silty SAND** - light grey, loose, fine grained, organics.	moist			No odour. No PACM.
							End of Hole at 2.500 m Target depth.		0.2	BH02_2.5	
		3.0									
		3.5									
		4.0									
		4.5									

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **12/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:20 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH03**
Project Number:	**10026439**
Hole Depth:	**2.00 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**12/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**HA, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC		0.040				Fill	**ASPHALT** - black, hard.				
HA, SFA, PT		0.5				Fill	**FILL** - Silty SAND, black to dark grey, poorly compacted, medium grained, poorly sorted. Angular gravel at 0.3m.	moist	1.2	BH03_0.5	No odour. No PACM.
		0.700				Fill	**FILL** - Sandy SILT, dark grey to black, poorly compacted, poorly sorted.	slightly moist	0.8	BH03_1.0	Slight hydrocarbon odour. No PACM.
		1.100			PT	Natural	**PEAT** - black, soft, organics, minor roots throughout.		1.2	BH03_1.5	Slight sulfur odour. No PACM.
		1.800			SM	Natural	**Silty SAND** - light grey, loose, fine grained, organics, minor roots throughout.			BH03_2.0	Sulfur odour. No PACM.
							End of Hole at 2.000 m Target depth.				

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **12/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:21 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH04**
Project Number:	**10026439**
Hole Depth:	**3.00 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**12/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**HA, PT, WB**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC		0.050					**ASPHALT** - black, hard.				
HA, PT, WB	▽ 2.200	0.5 1.0 1.5 2.0 2.5 3.5 4.0 4.5			SM	Fill / Natural	**FILL** - Silty SAND, light brown, poorly compacted, medium grained, well sorted, angular gravel, minor black organic inclusions.	slightly moist	0.4	BH04_0.2	No odour. No PACM.
								moist	1.0	BH04_1.0	
							Silty SAND - dark grey, fine grained, well sorted, black gravel inclusions.	sat'd			Slight sulfur odour. No PACM.
							End of Hole at 3.000 m Target depth.		1.0	BH04_3.0	

Additional Comments

▽ Strike Groundwater Level

▼ Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **12/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:22 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH05**
Project Number:	**10026439**
Hole Depth:	**3.00 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**12/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**HA, PT, WB**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC		0.050					**ASPHALT** - black, hard.				
HA, SFA, PT	▽	1.800				Fill	**FILL** - Silty SAND, light brown, poorly compacted, coarse grained, poorly sorted.	slightly moist	0.2	BH05_0.3	No odour. No PACM.
							Becoming light grey at 1m, well sorted.	moist	0.2	BH05_1.0	
					SM	Natural	**Silty SAND** - grey to dark grey, loose, fine grained.	sat'd		BH05_2.0	No odour. No PACM.
							End of Hole at 3.000 m Target depth.			BH05_3.0	

Additional Comments

▽ Strike Groundwater Level

▼ Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **12/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:23 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH06**
Project Number:	**10026439**
Hole Depth:	**2.40 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**14/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC		0.050					**ASPHALT** - black, hard.				
							FILL - Sandy GRAVEL, dark brown to black, well compacted, medium grained sand, poorly sorted, angular gravels.	slightly moist	0.4	BH06_0.5	Slight hydrocarbon odour. No PACM. PFAS sample at 0.5m.
		0.5									
		0.800					**FILL** - Silty SAND, light brown to white, poorly compacted, medium grained, poorly sorted.	slightly moist			No odour. No PACM.
SFA, PT		1.0				Fill			0.2	BH06_1.5	
		1.5					Becoming black to dark grey at 1.8m.				
		2.0									Sandstone boulder at 2m.
											Slight hydrocarbon odour. No PACM.
		2.5					**End of Hole at 2.400 m** Refusal.		0.4	BH06_2.4	
		3.0									
		3.5									
		4.0									
		4.5									

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **14/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:24 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH07**
Project Number:	**10026439**
Hole Depth:	**3.00 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**14/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Depth (mbgl)	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC	0.050	**ASPHALT** - black, hard.				
SFA, PT		**FILL** - Sandy GRAVEL, black to dark grey, well compacted, medium grained sand, poorly sorted, angular gravels. (Fill)	dry	2.0	BH07_0.2	Slight hydrocarbon odour. No PACM.
	1.100	**FILL** - Crushed SANDSTONE, light pink to brown, well compacted, medium grained. (Fill)	dry	0.4	BH07_1.5	No odour. No PACM.
	1.700	**FILL** - Sandy GRAVEL, black to dark grey, well compacted, medium grained sand, poorly sorted, angular gravels. (Fill)	slightly moist	0.2	BH07_2.0	Slight hydrocarbon odour. No PACM.
	2.700		moist			
		Silty SAND - dark brown, loose, fine grained, organics, minor roots throughout. SM (Natural)	moist	1.4	BH07_3.0	Sulfur odour. No PACM.
		End of Hole at 3.000 m Target depth.				

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **14/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:26 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH08**
Project Number:	**10026439**
Hole Depth:	**3.00 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**14/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC		0.050					**ASPHALT** - black, hard.				
							FILL - Sandy GRAVEL, white to light brown, well compacted, poorly sorted, angular gravels.	dry	0.0	BH08_0.3	No odour. No PACM.
		0.500					**FILL** - Sandy GRAVEL, dark grey to black, well compacted, poorly sorted, angular gravels.	slightly moist			No odour. No PACM.
SFA, PT		1.0				Fill			0.0	BH08_1.0	PFAS sample at 1m.
		1.5									
		2.0									
		2.5					Moist at 2.7m.				
		3.5					**End of Hole at 3.000 m** Target depth.		0.0	BH08_3.0	
		4.0									
		4.5									

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **14/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:27 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH09**
Project Number:	**10026439**
Hole Depth:	**3.00 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**14/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC		0.050					**ASPHALT** - black, hard.				
							FILL - Sandy GRAVEL, light brown to brown, medium to coarse grained sand, poorly sorted, angular gravels.	dry	0.0	BH09_0.3	No odour. No PACM.
		0.5									
		0.800					**FILL** - Silty SAND, light brown, poorly compacted, medium grained.	dry			No odour. No PACM.
SFA, PT		1.0				Fill			0.0	BH09_1.5	
		1.5									
		2.0					Angular gravel and clay inclusions 2-2.5m.				
		2.5							0.2	BH09_2.5	
									0.0	BH09_3.0	
							End of Hole at 3.000 m Target depth.				
		3.5									
		4.0									
		4.5									

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **14/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:28 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH10**
Project Number:	**10026439**
Hole Depth:	**4.00 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**14/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC		0.050				Fill	**ASPHALT** - black, hard.				
SFA, PT						Fill	**FILL** - Gravelly SAND, dark grey, medium to coarse grained, poorly sorted, angular gravels, clay inclusions.	slightly moist	0.0	BH10_0.2	No odour. No PACM.
		0.5							0.0	BH10_1.5	
		1.0									
		1.5									
		2.0									
		2.5								BH10_3.0	
		3.0									
	▽	3.500			SM	Natural	**Silty SAND** - dark brown, loose, well sorted.	sat'd			Slight sulfur odour. No PACM.
							End of Hole at 4.000 m Target depth.		0.2	BH10_4.0	
		4.5									

Additional Comments

▽ Strike Groundwater Level

▼ Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **14/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:29 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH11**
Project Number:	**10026439**
Hole Depth:	**3.00 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**14/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC		0.050					**ASPHALT** - black, hard.				No odour. No PACM.
		0.5					**CONCRETE HARDSTAND**.				
		0.600									
SFA, PT		1.0				Fill	**FILL** - Sandy GRAVEL, dark grey, well compacted, poorly sorted, angular gravels.	dry	0.2	BH11_1.0	No odour. No PACM.
		1.5									
		2.0									
		2.300									
		2.5			SM	Natural	**Silty SAND** - dark brown, loose.	moist			Slight sulfur odour. No PACM.
									0.3	BH11_3.0	PFAS sample at 3m.
		3.5					**End of Hole at 3.000 m** Target depth.				
		4.0									
		4.5									

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **14/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:30 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH12**
Project Number:	**10026439**
Hole Depth:	**3.00 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**13/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC		0.300					**CONCRETE HARDSTAND**.				
SFA, PT		0.5				Fill	**FILL** - Sandy GRAVEL, light grey to brown, poorly sorted.	dry	0.4	BH12_0.3	No odour. No PACM.
		0.800					**FILL** - Silty CLAY, grey, some yellow mottling, high plasticity, well compacted, angular gravel & cobble.	moist	0.7	BH12_1.0	Slight hydrocarbon odour. No PACM. Reworked.
		1.0									
		1.5							0.4	BH12_2.0	
		2.0									
		2.5									
		2.600			SM	Natural	**Silty SAND** - light brown, loose, fine to medium grained, organic inclusions throughout, plant roots.	moist			No odour. No PACM.
							End of Hole at 3.000 m Target depth.		0.3	BH12_3.0	
		3.5									
		4.0									
		4.5									

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **13/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:31 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH13**
Project Number:	**10026439**
Hole Depth:	**2.50 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**14/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC		0.100					**CONCRETE HARDSTAND**.				
SFA, PT		0.5				Fill	**FILL** - Sandy GRAVEL, dark grey, poorly compacted, coarse grained sand, poorly sorted, angular gravel.	dry		BH13_0.2	No odour. No PACM. Woodchips at 0.2-0.4m.
		0.750					**FILL** - Silty Material, dark grey, poorly compacted, fine grained.	sat'd	0.2	BH13_1.5	No odour. No PACM. Anthropogenic material, possibly ash.
		1.0									
		1.5									
		1.800									
		2.0			ML	Natural	**SILT** - dark brown, loose, medium grained, minor roots throughout.	moist			No odour. No PACM.
							End of Hole at 2.500 m Target depth.		0.2	BH13_2.5	
		3.0									
		3.5									
		4.0									
		4.5									

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **14/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:33 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH14**
Project Number:	**10026439**
Hole Depth:	**2.00 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**14/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC		0.5 0.600					**CONCRETE HARDSTAND**.				
SFA, PT		1.0 1.200				Fill	**FILL** - Silty SAND, light brown, poorly compacted, medium grained.	slightly moist	0.0	BH14_0.8	No odour. No PACM. Reworked. PFAS sample at 0.8m.
		1.5			SM	Natural	**Silty SAND** - light brown, loose, medium grained.	slightly moist moist	0.0	BH14_1.5	No odour. No PACM.
		2.5 3.0 3.5 4.0 4.5					**End of Hole at 2.000 m** Target depth.		0.0	BH14_2.0	

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **14/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:34 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH15**
Project Number:	**10026439**
Hole Depth:	**3.00 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**13/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Depth (mbgl)	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC, SFA, PT	0.040	**ASPHALT** - black, hard.				
		FILL - Silty SAND, dark grey to brown, poorly compacted, fine grained, poorly sorted, angular gravel. (Fill)	slightly moist	0.0	BH15_0.3	No odour. No PACM.
	0.5					
	1.0					
	1.5			0.0	BH15_1.5	
	2.000					
		Silty SAND - light brown, loose, fine to medium grained, well sorted, organics. (SM)	moist			No odour. No PACM.
	2.400					
	2.5	**Clayey SAND** - light brown, loose, fine to medium grained, well sorted. (SC, Natural)	moist			No odour. No PACM.
					BH15_3.0	
		End of Hole at 3.000 m Target depth.				
	3.5					
	4.0					
	4.5					

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **13/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:35 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH16**
Project Number:	**10026439**
Hole Depth:	**3.00 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**14/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC		0.050					**ASPHALT** - black, hard. **CONCRETE HARDSTAND**.				
		0.400									
SFA, PT		0.5				Fill	**FILL** - Sandy GRAVEL, light brown, fine grained sand, poorly sorted, angular gravel.	dry	0.4	BH16_0.5	Naphthalene odour at 0.5m. No PACM.
		1.0									No odour. No PACM.
		1.300									
		1.5			SM	Natural	**Silty SAND** - light brown, fine to medium grained, organics.	dry	0.3	BH16_1.5	Slight sulfur odour. No PACM.
		2.0							0.1	BH16_2.0	
	▽	2.5						moist			
								sat'd			
							End of Hole at 3.000 m Target depth.			BH16_3.0	
		3.5									
		4.0									
		4.5									

Additional Comments

▽ Strike Groundwater Level

▼ Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **14/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:37 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH17**
Project Number:	**10026439**
Hole Depth:	**3.00 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**14/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Depth (mbgl)	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC, SFA, PT	0.050	**ASPHALT** - black, hard.				
		FILL - Sandy GRAVEL, dark brown, medium to coarse grained sand, poorly sorted, angular gravel.	dry	0.0	BH17_0.3	No odour. No PACM.
	0.5					
	1.0					
	1.5			0.0	BH17_1.5	Scrap metal at 1.5m.
	2.0					
	2.5					
	2.600	**FILL** - Silty Material, grey to blue, poorly compacted, fine grained, well sorted.	dry	0.2	BH17_2.6	No odour. No PACM. Anthropogenic material, possibly ash.
	2.800	**Sandy SILT** - dark grey to black, fine grained, well sorted.	slightly moist	0.2	BH17_3.0	Slight sulfur odour. PACM.
		End of Hole at 3.000 m Target depth.				
	3.5					
	4.0					
	4.5					

USCS Symbol: ML
Material Type: Fill, Nat.

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **14/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:38 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH18**
Project Number:	**10026439**
Hole Depth:	**3.00 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**14/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Depth (mbgl)	Material Description	USCS Symbol	Material Type	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC, SFA, PT	0.050	**ASPHALT** - black, hard.						
	0.5	**FILL** - Sandy GRAVEL, dark grey, well compacted, poorly sorted, angular gravel.				0.0	BH18_0.2	No odour. No PACM.
	0.600	**FILL** - BOULDER, grey / blue, hard, fine grained.						Slight hydrocarbon odour. No PACM. Anthropogenic material.
	1.0					1.8	BH18_1.0	Glass fragment at 1m.
	1.200	**FILL** - Sandy GRAVEL, dark grey, well compacted, poorly sorted, angular gravel.		Fill				Slight hydrocarbon odour. No PACM.
	1.5							
	1.700	**FILL** - Sandy SILT, dark grey, well compacted, poorly sorted, angular gravel.						Slight hydrocarbon odour. No PACM.
	2.0					2.0	BH18_2.0	
	2.500	**Silty SAND** - dark grey, loose, medium grained.	SM	Natural	moist			Slight sulfur odour. No PACM.
	3.5	**End of Hole at 3.000 m** Target depth.				0.4	BH18_3.0	
	4.0							
	4.5							

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **14/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:39 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH19**
Project Number:	**10026439**
Hole Depth:	**4.00 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**13/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC		0.050					**ASPHALT** - black, hard.				
SFA, PT		0.5				Fill	**FILL** - Silty SAND, dark brown, poorly compacted, medium grained, poorly sorted, angular gravel.	dry	0.0	BH19_0.4	No odour. No PACM. PFAS sample at 0.4m.
		1.0							0.0	BH19_1.0	Tile fragment at 1m.
		1.5						slightly moist			
		2.0						moist	0.2	BH19_2.0	
		2.5									
		3.0								BH19_3.0	
		3.5									
									0.3	BH19_4.0	
		4.5					**End of Hole at 4.000 m** Target depth.				

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **13/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:41 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH20**
Project Number:	**10026439**
Hole Depth:	**1.10 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**13/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Observations / Comments
CC		0.050					**ASPHALT** - black, hard. **CONCRETE HARDSTAND**.	
		0.5						
		1.0						
							End of Hole at 1.100 m Refusal on concrete footing.	
		1.5						
		2.0						
		2.5						
		3.0						
		3.5						
		4.0						
		4.5						

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **13/12/2018**

Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:41 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH21**
Project Number:	**10026439**
Hole Depth:	**3.00 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**14/12/2019**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC		0.030					**ASPHALT** - black, hard. **CONCRETE HARDSTAND**.				
		0.5									
		0.600									
SFA, PT		1.0				Fill	**FILL** - Silty SAND, brown, medium grained, poorly sorted, organics.	dry		BH21_1.0	No odour. No PACM.
		1.5									
		2.000									
	▽	2.5			SM	Natural	**Silty SAND** - brown, loose, medium grained, organics, minor roots throughout.	moist			Sulfur odour. No PACM.
								sat'd	1.0	BH21_3.0	
		3.5					**End of Hole at 3.000 m** Target depth.				
		4.0									
		4.5									

Additional Comments

▽ Strike Groundwater Level

▼ Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **14/12/2019**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:42 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH22**
Project Number:	**10026439**
Hole Depth:	**3.00 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**12/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC		0.050					**ASPHALT** - black, hard.				
SFA, PT		0.5				Fill	**FILL** - Sandy GRAVEL, dark brown, poorly compacted, poorly sorted.	dry	0.0	BH22_1.0	No odour. No PACM. Brick / terracotta fragments.
		1.0									
		1.200				Fill	**FILL** - Sandy SILT, black, poorly compacted, fine grained, poorly sorted.	dry			No odour. No PACM.
		1.500									
		2.0					**FILL** - Silty SAND, light grey, poorly compacted, fine grained, well sorted.	slightly moist		BH22_2.0	No odour. No PACM.
		2.500			SM	Natural	**Silty SAND** - grey, fine grained, well sorted, organics.	slightly moist	0.2	BH22_3.0	No odour. No PACM.
		3.5					**End of Hole at 3.000 m** Target depth.				
		4.0									
		4.5									

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **12/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:44 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH23**
Project Number:	**10026439**
Hole Depth:	**3.00 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**13/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC		0.050				Fill	**ASPHALT** - black, hard.				
							FILL - Gravelly SAND, light grey to brown, well compacted, coarse grained sand, angular gravels.	dry	0.2	BH23_0.15	No odour. No PACM.
		0.500					**FILL** - Silty SAND, dark grey, poorly compacted, fine grained, poorly sorted.	dry			No odour. No PACM.
SFA, PT		1.0							0.2	BH23_1.0	
		1.5					Becoming light grey to white from 1.8m.		0.2	BH23_2.0	PFAS sample at 2m.
		2.0									
		2.5					Becoming brown from 2.5m.				
		3.5					**End of Hole at 3.000 m** Target depth.		0.2	BH23_3.0	
		4.0									
		4.5									

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **13/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:45 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH24**
Project Number:	**10026439**
Hole Depth:	**4.50 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**13/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample ID No.	Observations / Comments
CC		0.050				Fill	**CONCRETE HARDSTAND.**			
SFA		0.5				Fill	**FILL** - Silty SAND, light grey to brown, poorly compacted, medium grained, poorly sorted.	dry	BH24_0.3	No odour. No PACM.
		1.0				Fill				
		1.5				Fill			BH24_1.5	
		2.0				Fill				
		2.5				Fill		slightly moist		
		3.0				Fill			BH24_3.0	
		3.200				Fill				
	▽	3.5			SM	Natural	**Silty SAND** - light brown to grey, loose, fine to medium grained, organics.	slightly moist		No odour. No PACM.
		4.0			SM	Natural		sat'd		
							End of Hole at 4.500 m Target depth.		BH24_4.5	

Additional Comments

Unable to push tube due to cave-in.

▽ Strike Groundwater Level

▼ Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **13/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:46 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH25**
Project Number:	**10026439**
Hole Depth:	**3.00 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**12/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample ID No.	Observations / Comments
CC		0.050					**ASPHALT** - black, hard.			
		0.200					**CONCRETE HARDSTAND**.			
SFA		0.5				Fill	**FILL** - Silty SAND, light brown, coarse grained, well sorted, organics.	slightly moist	BH25_1.0	No odour. No PACM.
		1.0								
		1.5					Becoming dark brown at 1.8m.		BH25_2.0	
		2.0								
		2.5								
		3.5					**End of Hole at 3.000 m** Target depth.			
		4.0								
		4.5								

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **12/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:47 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH26**
Project Number:	**10026439**
Hole Depth:	**3.00 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**13/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC		0.050					**ASPHALT** - black, hard.				
		0.400					**FILL** - Roadbase. Sandy GRAVEL, light grey, well compacted, poorly sorted.	dry	0.2	BH26_0.2	No odour. No PACM.
SFA, PT		0.5				Fill	**FILL** - Silty SAND, light grey to white, poorly compacted, fine grained.				No odour. No PACM.
		1.0							0.2	BH26_1.0	
		1.5					Becoming dark brown at 1.3m.				
		2.0								2m sample stuck in push tube	
		2.5					Becoming light brown to yellow at 2.5m.				
		3.5					**End of Hole at 3.000 m** Target depth.		0.1	BH26_3.0	
		4.0									
		4.5									

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **13/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:48 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH27**
Project Number:	**10026439**
Hole Depth:	**3.00 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**13/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC		0.100					**CONCRETE HARDSTAND.**				
SFA, PT		0.5				Fill	**FILL** - Silty SAND, light brown, poorly compacted, well sorted.	dry	0.4	BH27_0.5	No odour. No PACM.
		1.0					Becoming dark brown at 1m.				
		1.5							0.2	BH27_1.5	
		2.0									
		2.5								BH27_3.0	
		3.0					**End of Hole at 3.000 m** Target depth.				
		3.5									
		4.0									
		4.5									

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **13/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:49 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH28**
Project Number:	**10026439**
Hole Depth:	**3.00 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**13/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC		0.100					**CONCRETE HARDSTAND.**				
SFA, PT	▽	0.5				Fill	**FILL** - Silty SAND, dark brown, poorly compacted, well sorted.	dry	0.1	BH28_0.5	No odour. No PACM.
		1.0									
		1.5					Becoming light grey to white at 1m.		0.1	BH28_1.5	
		2.0					Becoming brown at 2m.				
		2.5						sat'd			
		3.5					**End of Hole at 3.000 m** Target depth.		0.0	BH28_3.0	
		4.0									
		4.5									

Additional Comments

▽ Strike Groundwater Level

▼ Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **13/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:50 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH29**
Project Number:	**10026439**
Hole Depth:	**2.15 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**11/02/2019**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Depth (mbgl)	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC	0.050	**ASPHALT** - black, hard.				
SFA	0.5	**FILL** - Roadbase. Sandy GRAVEL, grey, some yellow sandstone. (Fill)	dry	0.2	BH29_0.4	No odour. No PACM.
	0.600					
PT	1.0	**SAND** - black, some grey, dense, medium to coarse grained. (SP, Natural)	dry	0.3	BH29_1.0	No odour. No PACM.
	1.400					
	1.5	**SAND** - white, some black, loose, medium grained. (SP, Natural)	dry	0.2	BH29_1.5	No odour. No PACM.
	2.0			0.4	BH29_2.1	
	2.150	**End of Hole at 2.150 m** Target depth.				
	2.5					
	3.0					
	3.5					

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Tom Keatley** Date: **11/02/2019**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:51 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH30**
Project Number:	**10026439**
Hole Depth:	**2.80 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**11/02/2019**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Depth (mbgl)	Material Description	Moisture	Sample PID ppm	Sample ID No.	Sample DUP TRIP	Observations / Comments
CC	0.050	**ASPHALT** - black, hard.					
SFA	0.5	**FILL** - SAND with Gravel, light brown, white sandstone gravels to 20mm.	dry	0.4	BH30_0.4		No odour. No PACM.
	0.700	**FILL** - SAND with Gravel, dark brown.	dry	1.0	BH30_0.8		No odour. No PACM. Black charcoal pieces.
	0.900						
PT	1.0	**SAND** - black, dense, medium grained.	dry	2.3	BH30_1.0		No odour. No PACM.
	1.400						
	1.5	**SAND** - grey / black, loose, medium to coarse grained.	dry				No odour. No PACM.
	2.000			1.0	BH30_1.8		Slight hydrocarbon odour.
	2.5	**SAND** - black, loose, medium to coarse grained.	moist				Hydrocarbon odour. No PACM.
	3.0	**End of Hole at 2.800 m** Target depth.		29.0	BH30_2.7	DUP TRIP	
	3.5						

USCS Symbol	Material Type
	Fill
SP	
SP	Natural
SP	

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Tom Keatley** Date: **11/02/2019**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:53 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH31**
Project Number:	**10026439**
Hole Depth:	**2.30 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**11/02/2019**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Depth (mbgl)	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC	0.050			**ASPHALT** - black, hard.				
PT	0.300		Fill	**FILL** - Roadbase. Gravelly SAND, dark brown / black.	dry	0.2	BH31_0.2 (ASS)	No odour. No PACM.
SFA	0.5	SP		**SAND** - black, dense, medium to coarse grained.	dry	0.2	BH31_0.4	No odour. No PACM.
SFA	0.700	SP	Natural	**SAND** - light brown / grey, loose, medium grained.	slightly moist	0.2	BH31_0.9	No odour. No PACM.
PT	1.0					0.2	BH31_1.1	
PT	1.5							
PT	1.800	SP		**SAND** - black, loose, fine grained.	dry			No odour. No PACM.
	2.0							
	2.5			**End of Hole at 2.300 m** Target depth.		1.6	BH31_2.3	
	3.0							
	3.5							

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Tom Keatley** Date: **11/02/2019**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:54 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH32**
Project Number:	**10026439**
Hole Depth:	**3.00 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**11/02/2019**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Depth (mbgl)	Material Description	Sample PID ppm	Sample ID No.	Observations / Comments
CC	0.050	**ASPHALT** - black, hard.			
SFA		**FILL** - Gravelly SAND, light brown / black.	2.5	BH32_0.3	No odour. No PACM.
	0.400				
	0.5	**FILL** - Silty SAND, black.	5.4	BH32_1.0	No odour. No PACM.
	1.0				
PT	1.200	**FILL** - SAND, black & grey, medium grained, rootlets at 1.4m.	2.3	BH32_1.9 (PFAS)	No PACM. Hydrocarbon odour at 1.77m.
	1.5				
	2.0				
	2.500	**FILL** - Silty SAND with Crushed Sandstone, dark brown.	1.9	BH32_2.5	No odour. No PACM.
	3.5	**End of Hole at 3.000 m** Target depth.	1.5	BH32_3.0	

Water Level: Fill

USCS Symbol:

Material Type: Fill

Additional Comments

1st attempt refused on concrete at 0.4m (possible service), moved 1m west.

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Tom Keatley** Date: **11/02/2019**

Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:55 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH33**
Project Number:	**10026439**
Hole Depth:	**2.50 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**11/02/2019**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Depth (mbgl)	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC	0.050		Fill	**ASPHALT** - black, hard.				
SFA				**FILL** - Gravelly SAND.		0..1	BH33_0.5	No odour. No PACM.
	0.5							
	0.600					0.4	BH33_0.6	
	0.650			**FILL** - CLAY, white / red mottled, stiff.	dry			No odour. No PACM.
PT		SP	Natural	**SAND** - black with grey, medium to coarse grained.				No odour. No PACM.
	1.0							
	1.5					0.5	BH33_1.5	
	1.700							
	2.0	SP		**SAND** - black, dense, medium to coarse grained.	dry			No odour. No PACM.
						2.0	BH33_2.5	
				End of Hole at 2.500 m Target depth.				
	3.0							
	3.5							

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Tom Keatley** Date: **11/02/2019**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:56 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH34**
Project Number:	**10026439**
Hole Depth:	**3.00 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**12/02/2019**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC		0.050					**ASPHALT** - black, hard.				
PT							**FILL** - Roadbase. Gravelly Silty SAND, black.	dry	1.0	BH34_0.3	No odour. No PACM.
SFA		0.5									PT refusal on coal slag pieces at 0.5m.
		1.0							1.0	BH34_1.0	Metal piece and wire, woody debris.
		1.5				Fill					
		1.700									
PT							**FILL** - SAND with some Crushed Sandstone, black, medium grained.	dry	1.6	BH34_2.0	No odour. No PACM.
SFA		2.0									PT refusal at 2m.
	▽	2.5						wet	2.7	BH34_2.5	Black rubber tyre noted at 2.5m.
PT		2.700									
SFA		2.900			OH	Nat.	**PEAT** - black, highly organic, some rootlets.	wet			Sulfur odour. No PACM.
					SP		**SAND** - brown, coarse grained.	wet	1.9	BH34_3.0	No odour. No PACM.
							End of Hole at 3.000 m Target depth.				
		3.5									

Additional Comments

▽ Strike Groundwater Level

▼ Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Tom Keatley** Date: **12/02/2019**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:58 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH35**
Project Number:	**10026439**
Hole Depth:	**2.40 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**12/02/2019**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC		0.050				Fill	**ASPHALT** - black, hard.				
SFA							**FILL** - Gravelly SAND, black, medium to coarse grained.	dry	1.6	BH35_0.3	No odour. No PACM.
		0.5									
		0.600					**FILL** - CHARCOAL with Ash & Slag, black charcoal, white ash / slag, rootlets.	dry	0.2	BH35_0.7	No odour. No PACM. Thin metal wire.
		0.800									
		1.0			SP		**SAND** - black / grey, coarse grained.	dry			No odour. No PACM.
PT	▽	1.300							0.3	BH35_1.2	
		1.5			OH	Natural	**PEAT, Clayey SAND** - fine grained, highly organic, rootlets.	wet			Sulfur odour. No PACM.
		1.800									
		2.0			SP		**SAND** - brown, coarse grained.	wet			Sulfur odour. No PACM.
		2.5					**End of Hole at 2.400 m** Target depth.		0.3	BH35_2.4	
		3.0									
		3.5									

Additional Comments

▽ Strike Groundwater Level

▼ Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Tom Keatley** Date: **12/02/2019**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:56:59 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH36**
Project Number:	**10026439**
Hole Depth:	**2.10 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**12/02/2019**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC		0.050					**ASPHALT** - black, hard.				
SFA							**FILL** - Roadbase. Gravelly SAND, black.	dry	2.1	BH36_0.3	No odour. No PACM.
		0.5									
		0.600				Fill	**FILL** - Silty SAND with Charcoal & Slag, brown / black.	dry	2.6	BH36_1.0	No odour. No PACM. Black charcoal & slag in silty sand matrix. Iron piece at 0.7m. Sandstone pieces at 1.1m.
		1.0									
PT	▽	1.200					**FILL** - CLAY, black.	wet	0.6	BH36_1.3	No odour. No PACM. Rubber like, flexible.
		1.300			SP		**SAND** - brown, medium grained.	wet			No odour. No PACM.
		1.400				Natural	**PEAT, Silty SAND** - black, fine grained, highly organic.	wet	0.2	BH36_1.5 (PFAS)	Sulfur odour. No PACM.
		1.5			OH						
		1.900					**SAND** - light brown, coarse grained.	wet			Sulfur odour. No PACM.
		2.0			SP				0.2	BH36_2.1	
							End of Hole at 2.100 m Target depth.				
		2.5									
		3.0									
		3.5									

Additional Comments

▽ Strike Groundwater Level

▼ Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Tom Keatley** Date: **12/02/2019**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:57:01 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH37**
Project Number:	**10026439**
Hole Depth:	**2.70 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**12/02/2019**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC		0.050					**ASPHALT** - black, hard.				
SFA / PT / SFA	▽	0.5				Fill	**FILL** - Silty SAND, some Clay, black, highly organic.	moist	0.7	BH37_0.3	Rotting wood odour. No PACM. Decomposed wood. PT refusal at 0.8m.
		1.000					**FILL** - COAL SLAG, black.	wet	1.3	BH37_1.1	No odour. No PACM. With rubber like material.
PT		1.400									
		1.500			OH	Natural	**PEAT, Silty SAND** - black, fine grained, highly organic, rootlets.	wet	1.1	BH37_1.5 (PFAS)	Sulfur odour. No PACM.
							SAND - brown, coarse grained, some black organic layering.	wet	1.5	BH37_1.9	Sulfur odour. No PACM.
		2.0			SP						
		2.500			SM		**Gravelly Silty SAND** - black, fine grained, sticky.	wet	0.6	BH37_2.7	Slight sulfur odour. No PACM.
							End of Hole at 2.700 m Target depth.				
		3.0									
		3.5									

Additional Comments

▽ Strike Groundwater Level

▼ Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Tom Keatley** Date: **12/02/2019**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:57:02 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH38**
Project Number:	**10026439**
Hole Depth:	**2.50 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**12/02/2019**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC		0.050					**ASPHALT** - black, hard.				
SFA						Fill	**FILL** - Roadbase. Gravelly SAND with Silt, dark brown / black.		0.2	BH38_0.3	No odour. No PACM.
		0.5									
		0.800									
	▽	0.900			SP	Natural	**SAND** - brown, with black inclusions.		0.1	BH38_0.8	No odour. No PACM.
		1.0			SP		**SAND** - black, fine grained, highly organic.	wet			No odour. No PACM.
		1.100									
PT					SP		**SAND** - black becoming brown, coarse grained.	sat'd	0.1	BH38_1.6 (PFAS)	Sulfur odour. No PACM.
		1.5									
		1.700									
		2.0			SP		**SAND** - black, fine grained, organic.	sat'd	0.1	BH38_2.4	Sulfur odour. No PACM.
		3.0					**End of Hole at 2.500 m** Target depth.				
		3.5									

Additional Comments

▽ Strike Groundwater Level

▼ Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Tom Keatley** Date: **12/02/2019**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:57:03 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH39**
Project Number:	**10026439**
Hole Depth:	**2.50 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**12/02/2019**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC		0.050					**ASPHALT** - black, hard.				
SFA						Fill	**FILL** - Silty Gravelly SAND, brown, coarse grained.	dry	1.6	BH39_0.3	No odour. No PACM. Zero PT recovery 0.5-1.5m.
		0.5									
		1.0							0.5	BH39_1.2	
	▽	1.300									
PT		1.5			SP	Natural	**SAND** - black, medium to coarse grained, gravels up to 40mm.	sat'd	0.1	BH39_1.6	Slight sulfur odour. No PACM.
		2.000									
					SP		**SAND** - brown, medium to coarse grained.	sat'd			Slight sulfur odour. No PACM.
							End of Hole at 2.500 m Target depth.		0.2	BH39_2.5	
		3.0									
		3.5									

Additional Comments

▽ Strike Groundwater Level

▼ Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Tom Keatley** Date: **12/02/2019**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:57:05 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH40**
Project Number:	**10026439**
Hole Depth:	**0.40 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**12/02/2019**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Sample PID ppm	Sample ID No.	Observations / Comments
CC / SFA		0.050				Fill	**ASPHALT** - black, hard. **FILL** - Silty Gravelly SAND, black-dark brown.	0.9	BH40_0.3	No odour. No PACM.
		0.5					**End of Hole at 0.400 m** Refusal on concrete, possible service.			
		1.0								
		1.5								
		2.0								
		2.5								
		3.0								
		3.5								

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Tom Keatley** Date: **12/02/2019**

Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:57:06 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH41**
Project Number:	**10026439**
Hole Depth:	**2.50 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**12/02/2019**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Sample DUP TRIP	Observations / Comments
CC		0.150					**CONCRETE HARDSTAND**.					
SFA, PT		0.5					**FILL** - Silty SAND, brown.		1.1	BH41_0.4		No odour. No PACM.
		0.900				Fill	**FILL** - Silty SAND, black, brittle.		2.0	BH41_1.0		No odour. No PACM. Coals, metallic shiny pieces.
	▽	1.0										
		1.5										
		2.000			SP	Natural	**SAND with Peat** - light brown, black / brown peat, coarse grained.	sat'd	2.9	BH41_2.0		Plastic bottle at 2m.
		2.100			OH		**PEAT** - black, fine grained.	sat'd				Sulfur odour. No PACM.
		2.200			SP		**SAND** - golden / black, coarse grained.	sat'd				No odour. No PACM.
									1.8	BH41_2.4	DUP3 TRIP3	No odour. No PACM.
		3.0					**End of Hole at 2.500 m** Target depth.					
		3.5										

Additional Comments

▽ Strike Groundwater Level

▼ Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Tom Keatley** Date: **12/02/2019**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:57:07 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH42**
Project Number:	**10026439**
Hole Depth:	**2.50 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**12/02/2019**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC		0.215					**CONCRETE HARDSTAND**.				
SFA		0.5				Fill	**FILL** - Roadbase. Gravelly SAND with Silt, brown / black.	dry	0.4	BH42_0.4	No odour. No PACM.
PT	▽ 1.900	1.0							0.8	BH42_1.5	
		1.5									
		2.0					**FILL** - GRAVEL, black, gravel to 10mm.	wet	0.6	BH42_2.0	No odour. No PACM. Wood and yellow sandstone.
		2.200			OH	Natural	**PEAT, Silty SAND** - black, fine grained.	wet			Sulfur odour. No PACM.
		2.400			SP		**SAND** - brown, medium grained.	wet			No odour. No PACM.
							End of Hole at 2.500 m Target depth.		0.4	BH42_2.5	
		3.0									
		3.5									

Additional Comments

▽ Strike Groundwater Level

▼ Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Tom Keatley** Date: **12/02/2019**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:57:08 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH44**
Project Number:	**10026439**
Hole Depth:	**1.40 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**11/02/2019**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Depth (mbgl)	Material Description	Sample PID ppm	Sample ID No.	Observations / Comments
CC	0.050	**ASPHALT** - black, hard.			
SFA		**FILL** - Gravelly SAND, black, gravel to 10mm.	2.6	BH44_0.3	No odour. No PACM.
	0.5				
	0.600	**FILL** - Silty SAND, black, with gravel.	0.9	BH44_1.0 (PFAS)	No odour.
PT	1.0				
	1.100	**FILL** - CLAY, red / white mottled.	1.4	BH44_1.1	No odour. PACM at 1.1m.
	1.200	**FILL** - Gravelly SAND, black.	1.3	BH44_1.3	No odour. No PACM.
SFA		**End of Hole at 1.400 m** Refusal on concrete, possible service.			
	1.5				
	2.0				
	2.5				
	3.0				
	3.5				

Water Level: Fill

USCS Symbol / Material Type: Fill

Graphic Log: Asphalt; Gravelly SAND; Silty SAND; CLAY; Gravelly SAND

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Tom Keatley** Date: **11/02/2019**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:57:10 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH45**
Project Number:	**10026439**
Hole Depth:	**2.90 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**11/02/2019**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Depth (mbgl)	Material Description	Moisture	Sample: PID ppm	Sample: ID No.	Sample: DUP TRIP	Observations / Comments
CC	0.050	**ASPHALT** - black, hard.					
SFA		**FILL** - Gravelly SAND, brown, with sandstone gravels.	dry	8.7	BH45_0.4		No odour. No PACM.
	0.5			7.0	BH45_0.9		
	1.0						
	1.500						
PT		**FILL** - Gravelly SAND, brown, whiter sandstone crushed to 50mm, some yellow clay.		6.4	BH45_1.7		No odour. No PACM.
	1.800						
	2.0	**SAND** - black.		33.6	BH45_1.9		Slight hydrocarbon odour. No PACM.
				7408	BH45_2.2	DUP2 TRIP2	
	2.5						
	2.600						
	2.700	**SAND** - golden.					Strong hydrocarbon odour (diesel). No PACM.
		Silty SAND, slight Clay - black, rootlets.		11.6	BH45_2.8		No odour. No PACM.
	3.0	**End of Hole at 2.900 m** Target depth.					
	3.5						

Material Type: Fill; Natural

USCS Symbol: SP; SP; SM

Graphic Log: Asphalt; Gravelly SAND; Gravelly SAND; SAND; SAND; Silty SAND

Water Level: Strike Groundwater Level; Static Groundwater Level

Additional Comments

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Tom Keatley** Date: **11/02/2019**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:57:11 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH46**
Project Number:	**10026439**
Hole Depth:	**2.40 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**11/02/2019**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Depth (mbgl)	USCS Symbol	Material Type	Material Description	Sample PID ppm	Sample ID No.	Observations / Comments
CC	0.050			**ASPHALT** - black, hard.			
SFA			Fill	**FILL** - Roadbase. Gravelly SAND, golden, medium grained.	0.6	BH46_0.3	No odour. No PACM.
	0.5						
	0.600	SP		**SAND** - black, dense.			No odour. No PACM.
	0.800						
PT	1.0	SP	Natural	**SAND** - grey / black, loose, medium grained, rootlets.	0.6	BH46_1.0	No odour. No PACM.
	1.5						
	1.600	SM		**Silty SAND** - brown, dense, rootlets.	0.5	BH46_1.7	No odour. No PACM.
	1.900						
	2.0	SP		**SAND** - brown, transitions to grey, loose.	0.8	BH46_2.3	No odour. No PACM.
	2.5			**End of Hole at 2.400 m** Target depth.			
	3.0						
	3.5						

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Tom Keatley** Date: **11/02/2019**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:57:12 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH47**
Project Number:	**10026439**
Hole Depth:	**2.40 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**11/02/2019**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC		0.050					**ASPHALT** - black, hard.				
SFA						Fill	**FILL** - Gravelly SAND, black.	dry	10.6	BH47_0.3	No odour. No PACM.
		0.5									
		1.0					Coal slag, grey at 1m.				
PT	▽	1.400							24.2	BH47_1.3	
		1.500			SP		**SAND** - golden, layered with black organics.				
					OH		**PEAT, Silty SAND** - black, fine grained, high organic content.	wet	59.7	BH47_1.6	Hydrocarbon odour. No PACM.
		1.800				Natural					
		2.0			SP		**SAND** - brown / golden, coarse grained.	wet	5.5	BH47_1.9	Strong hydrocarbon odour. No PACM.
		2.5					**End of Hole at 2.400 m** Target depth.		1945	BH47_2.4	
		3.0									
		3.5									

Additional Comments

▽ Strike Groundwater Level

▼ Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Tom Keatley** Date: **11/02/2019**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:57:14 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH48**
Project Number:	**10026439**
Hole Depth:	**2.50 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**12/02/2019**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Depth (mbgl)	Material Description	Sample PID ppm	Sample ID No.	Observations / Comments
CC	0.050	**ASPHALT** - black, hard.			
SFA		**FILL** - Gravelly SAND, light brown.	1.4	BH48_0.3	No odour. No PACM.
	0.400				
	0.5	**FILL** - SAND, dark brown, sandstone piece.			No odour. No PACM.
					Plywood at 0.7m.
PT	1.0		2.4	BH48_1.0	
	1.5				Concrete at 1.4m.
	1.800				
	2.0	**PEAT, SAND** - black, fine grained, organic.	2.6	BH48_1.9	No odour. No PACM.
	2.400				
		SAND - brown, coarse grained.	1.9	BH48_2.5	No odour. No PACM.
	3.0	**End of Hole at 2.500 m** Target depth.			
	3.5				

Graphic Log: CC, OH, SP
USCS Symbol: Fill, Natural
Material Type: Fill, Natural

Additional Comments

4 pieces PACM found in nearby garden bed, 1 piece sampled.

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Tom Keatley** Date: **12/02/2019**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:57:15 AM - drawn by laurie white at www.reumad.com.au

Borehole Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**BH49**
Project Number:	**10026439**
Hole Depth:	**2.50 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**11/02/2019**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT**	Northing:	**N/A**
		Zone:	**N/A**

Method	Depth (mbgl)	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC	0.050	**ASPHALT** - black, hard.				
SFA		**FILL** - Gravelly SAND, brown / dark brown, medium to coarse gravel.	dry	1.8	BH49_0.3	No odour. No PACM.
	0.500	**FILL** - Silty SAND, brown / grey, grey roadbase gravel to 20mm.	dry	3.2	BH49_0.7	No odour. No PACM. Coal slag.
	0.750					
	0.800	**FILL** - SAND, golden.				
	1.0	**FILL** - Silty SAND, light brown, with golden / yellow / white sandstone.	dry			Iron bar.
	1.400	Organics at base.		4.0	BH49_1.4	
PT	1.5	**Silty SAND** - black, medium to coarse grained.	moist	6.9	BH49_1.6	
	2.0	Rootlets at base.		6.5	BH49_2.5	
		End of Hole at 2.500 m Target depth.				
	3.0					
	3.5					

USCS Symbol: SM
Material Type: Fill, Natural

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Tom Keatley** Date: **11/02/2019**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:57:16 AM - drawn by laurie white at www.reumad.com.au

Monitoring Well Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**MW01**
Project Number:	**10026439**
Hole Depth:	**4.00 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**12/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, HA, PT, WB**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments	Well Details	Well Construction
CC		0.050					**ASPHALT** - black, hard.						
HA		0.5				Fill	**FILL** - Silty SAND, light brown, poorly compacted, medium grained, poorly sorted, angular gravel.	slightly moist	0.2	MW01_0.2	No odour. No PACM.	0.15	Bentonite Cap
		1.0					Becoming light grey at 1m.		0.2	MW01_1.0	PFAS sample at 1m.	0.50 1.00	
		1.400											
PT, WB	▽	1.5			SM	Natural	**Silty SAND** - dark grey to black, loose, fine grained, well sorted.	moist			Hydrocarbon odour. No PACM.		Sand
		2.0						sat'd	0.3	MW01_2.0			
		2.5											Screen
		3.0											
		3.5											
							End of Hole at 4.000 m Target depth.		0.3	MW01_4.0			
		4.5											
		5.0											
		5.5											
		6.0											

Additional Comments

▽ Strike Groundwater Level

▼ Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **12/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:57:18 AM - drawn by laurie white at www.reumad.com.au

Monitoring Well Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**MW02**
Project Number:	**10026439**
Hole Depth:	**6.00 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**12/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, HA, SFA, WB**	Northing:	**N/A**
		Zone:	**N/A**

Method	Water Level	Depth (mbgl)	RL (mAHD)	Graphic Log	USCS Symbol	Material Type	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments	Well Details	Well Construction
CC		0.030					**ASPHALT** - black, hard.						
HA		0.5				Fill	**FILL** - Silty SAND, dark grey to black, poorly compacted, medium grained, poorly sorted.	slightly moist			No odour. No PACM.	0.15	Bentonite Cap
		1.0						moist	0.2	MW02_1.0		0.50	
		1.5										1.00	
	▽	2.000											
SFA, WB		2.5			SM	Natural	**Silty SAND** - dark grey, black organics, loose, fine grained, well sorted.	wet			Slight sulfur odour. No PACM.		Sand
		3.0							0.4	MW02_3.0			Screen
		3.5											
		4.0										4.00	
		4.5											
		5.0											
		5.5											
							End of Hole at 6.000 m Target depth.		0.4	MW02_6.0			

Additional Comments

▽ Strike Groundwater Level

▼ Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **12/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:57:19 AM - drawn by laurie white at www.reumad.com.au

Monitoring Well Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**MW03**
Project Number:	**10026439**
Hole Depth:	**5.50 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**19/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT, HFA**	Northing:	**N/A**
		Zone:	**N/A**

Method	Depth (mbgl)	Material Description	Moisture	Sample PID ppm	Sample ID No.	Sample DUP TRIP	Observations / Comments
CC	0.040	**ASPHALT** - black, hard.	dry				
		FILL - Roadbase. Sandy GRAVEL, dark grey, well compacted, poorly sorted, coarse angular gravel.		0.0	MW03_0.5		No odour. No PACM. Brick fragments.
				0.0	MW03_1.0	DUP3 TRIP3	Sandstone boulder at 0.8-2m, brown, medium grained, hard.
				0.0	MW03_2.0		
SFA, PT, HFA	3.000	**Silty SAND** - light brown, dense, medium grained, well sorted.	moist				Sulfur odour. No PACM.
			sat'd	0.1	MW03_4.0		
					MW03_5.0		
		End of Hole at 5.500 m Target depth.					

Water Level	Graphic Log	USCS Symbol	Material Type
			Fill
		SM	Natural

Well Details: Gatic; Backfill; Bentonite (1.00 – 1.50); Sand (2.00); Screen (5.00)

Well Construction

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **19/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:57:21 AM - drawn by laurie white at www.reumad.com.au

Monitoring Well Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**MW04**
Project Number:	**10026439**
Hole Depth:	**5.50 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**19/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT, HFA**	Northing:	**N/A**
		Zone:	**N/A**

Method	Depth (mbgl)	Material Description	Moisture	Sample ID No.	Sample DUP TRIP	Observations / Comments
CC	0.040	**ASPHALT** - black, hard.	dry			No odour. No PACM. Glass fragments.
		FILL - Roadbase. Sandy GRAVEL, light brown, well compacted, medium grained sand, poorly sorted, angular gravel.		MW04_0.5		PFAS sample at 0.5m.
				MW04_1.0		
	2.500	**Silty SAND** - light brown, medium grained, well sorted.	moist			Slight sulfur odour. No PACM.
SFA, PT, HFA			sat'd	MW04_3.0	DUP4 TRIP4	
				MW04_5.0		
		End of Hole at 5.500 m Target depth.				

Water Level: ▽

Graphic Log: Fill; SM; Natural

Well Details: Gatic; Backfill; Bentonite 1.00–1.50; Sand 2.00; Screen; 5.00

Well Construction

Additional Comments

▽ Strike Groundwater Level

▼ Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **19/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:57:22 AM - drawn by laurie white at www.reumad.com.au

Monitoring Well Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**MW05**
Project Number:	**10026439**
Hole Depth:	**5.50 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**18/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT, HFA**	Northing:	**N/A**
		Zone:	**N/A**

Method	Depth (mbgl)	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC, SFA, PT, HFA	0.040	**ASPHALT** - black, hard.				
		FILL - Roadbase. Sandy GRAVEL, dark grey, moderately compacted, coarse grained sand, poorly sorted, angular gravel. (Fill)	dry	0.0	MW05_0.5	No odour. No PACM. Glass fragments throughout.
	0.5			0.0	MW05_1.0	
	1.0					
	1.5					
	1.700					
	2.0	**Silty SAND** - light grey, medium grained, well sorted, organics. (SM, Natural)	dry			No odour. No PACM.
	2.5		moist	0.5	MW05_2.0	
	3.0				MW05_3.0	PFAS sample at 3m.
	3.5		sat'd			
	4.0					
	4.5					
	5.0				MW05_5.0	
	6.0	**End of Hole at 5.500 m** Target depth.				

Well Details / Well Construction: Gatic 0.00; Backfill 1.50; Bentonite 2.00; Sand 2.50; Screen

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **18/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:57:24 AM - drawn by laurie white at www.reumad.com.au

Monitoring Well Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**MW06**
Project Number:	**10026439**
Hole Depth:	**6.00 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**18/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT, HFA**	Northing:	**N/A**
		Zone:	**N/A**

Method	Depth (mbgl)	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC	0.130	**CONCRETE HARDSTAND.**				
		FILL - Silty SAND, well sorted, organics.	dry	0.0	MW06_0.5	No odour. No PACM. Reworked.
				0.1	MW06_1.5	
	2.000	**Silty SAND** - light grey to brown, fine to medium grained sand, well sorted, increasing black organics.	moist			No odour. No PACM.
			sat'd	0.2	MW06_3.0	
					MW06_4.5	PFAS sample at 4.5m.
	4.700	**Silty CLAY** - dark brown / soft, soft, high plasticity, minor roots throughout.	moist			No odour. No PACM.
						Wood inclusions at 5.8m.
		End of Hole at 6.000 m Target depth.		0.3	MW06_6.0	

SFA, PT, HFA

USCS Symbol: SM, CH

Material Type: Fill, Natural

Well Details: 1.00, 1.50, 2.00, 5.00

Well Construction: Gatic, Backfill, Bentonite, Sand, Screen

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **18/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:57:26 AM - drawn by laurie white at www.reumad.com.au

Monitoring Well Log

ARCADIS Design & Consultancy for natural and built assets

Hole ID.	**MW07**
Project Number:	**10026439**
Hole Depth:	**6.00 m**
Sheet:	**1 of 1**

Project Name:	**Qantas Environmental Site Assessment**	Date:	**18/12/2018**
Location / Site:	**297 King Street, Mascot NSW**	Ground Level :	**N/A**
Client:	**Qantas Airways Limited**	Top of Casing :	**N/A**
Drilling Company:	**BG Drilling**	Easting:	**N/A**
Drill Method:	**CC, SFA, PT, HFA**	Northing:	**N/A**
		Zone:	**N/A**

Method	Depth (mbgl)	Material Description	Moisture	Sample PID ppm	Sample ID No.	Observations / Comments
CC	0.030	**ASPHALT** - black, hard.	dry	0.0	MW07_0.2	No odour. No PACM.
	0.300	**FILL** - Roadbase. Sandy GRAVEL, dark grey, well compacted, angular gravel.	slightly moist			No odour. No PACM.
	0.5	**Silty SAND** - light brown to yellow, loose, coarse grained sand.				
	1.0			0.2	MW07_1.0	PFAS & Asbestos sample at 1m.
	1.5					
	2.0					
	2.5					
	3.0			0.2	MW07_3.0	
	3.200	**Silty SAND** - light brown, dense, medium grained sand, organics, minor plant roots throughout.	moist wet			No odour. No PACM.
	3.5					
	4.0					
	4.5				MW07_4.5	
	5.0					
	5.5					
		End of Hole at 6.000 m Target depth.		0.5	MW07_6.0	

USCS Symbol	Material Type
SM	Fill
SM	Natural

Well Details / Well Construction: Gatic; Backfill; 1.50 Bentonite; 2.00; 2.50 Sand; Screen; 5.50

SFA, PT, HFA

Additional Comments

Strike Groundwater Level

Static Groundwater Level

Method

HA	Hand Auger	MR	Mud Rotary
CC	Concrete Corer	PT	Push Tube
CB	Concrete Breaker	AH	Air Hammer
SFA	Solid Flight Auger	EX	Excavator
HFA	Hollow Flight Auger	DC	Diamond Coring
SPT	Standard Penetometer Test	WB	Wash Bore
PCD	Polycrystalline Diamond		

REUMAD

Log Drawn By: Laurie White
Contact: laurie.white@reumad.com.au

Logged By: **Caitlain Regena** Date: **18/12/2018**
Checked By: Date:

ARCADIS 10026439 MASCOT.GPJ ES.GDT 15/2/19 8:57:27 AM - drawn by laurie white at www.reumad.com.au

Multi Parameter Water Meter

Instrument YSI Quatro Pro Plus
Serial No. 18J104319

airmet
Air-Met Scientific Pty Ltd
1300 137 067

Item	Test	Pass	Comments
Battery	Charge Condition	✓	
	Fuses	✓	
	Capacity	✓	
Switch/keypad	Operation	✓	
Display	Intensity	✓	
	Operation (segments)	✓	
Grill Filter	Condition	✓	
	Seal	✓	
PCB	Condition	✓	
Connectors	Condition	✓	
Sensor	1. pH	✓	
	2. mV	✓	
	3. EC	✓	
	4. D.O	✓	
	5. Temp	✓	
Alarms	Beeper		
	Settings		
Software	Version		
Data logger	Operation		
Download	Operation		
Other tests:			

Certificate of Calibration

This is to certify that the above instrument has been calibrated to the following specifications:

Sensor	Serial no	Standard Solutions	Certified	Solution Bottle Number	Instrument Reading
1. pH 10.00		pH 10.00		318140	pH 9.80
2. pH 7.00		pH 7.00		317272	pH 7.00
3. pH 4.00		pH 4.00		320612	pH 4.09
4. mV		234mV		325420/324357	234mV
5. EC		2.76mS		320325	2.78mS
6. D.O		0.00ppm		10175	0.00ppm
7. Temp		19.8°C		MultiTherm	19.5°C

Calibrated by: Sarah Lian — **Sarah Lian**

Calibration date: **20/12/2018**

Next calibration due: **19/01/2019**

ARCADIS Design & Consultancy for natural and built assets — Groundwater Monitoring Field Sheet

Job Information

Date: 8/1/19	Time: arrive depart
Project Name: North Kent Street - Qantas	Project Number: 10026439
Site Location: North Kent Street	Operator: TK
Well ID: MW03	Weather: Sunny

Equipment

Water quality equipment description: YSI Pro Plus 18J104319

Interface probe number: 5m. 0.1 20m 34291

Purging equipment (please cirlce): Bailer type: **Plastic** **Teflon**

Pump type: **Peristaltic** **Submersible** **Micro-purge** **Amazon** **Other:**

Well Gauging and Purge Volume Calculations

Casing Diameter	25mm	50mm	100mm	125mm	150mm	200mm	250mm	300mm
Conversion Factor (volume in factor L/m)	0.98	1.96	7.85	31.4	49.1	70.7	125.7	196.3

Volume of water in well / V = Pr x r x h
V = volume in litres
P = 3.14159
r = radius in cm
h = height of water column in cm

Total Well Depth (-) Water level (=) Water Column: 5.004 m (-) 3.497 m (=) 6.521 m

Depth to Product: — (m)

Water Column (x) Conversion Factor (=) Litres per 1 Well Volume: 6.521 m (x) 1.96 (=) 12.781 L

Water Quality Parameters

Beginning purge time: Ending purge time:

Litres	Time	pH	Temp C	Cond µS/cm	DO ppm	Redox mV	Comments
0.5	10:00	5.72	23.0	706	2.95	-31.9	slight brown, clear, sulfer odor, No sheen
1.0	10:04	5.67	22.9	667	2.28	-35.1	
2.0	10:08	5.67	23.0	666	2.68	-37.2	
3.0	10:12	5.67	22.7	661	0.42	-51.4	clear
4.0	10:16	5.66	22.7	661	0.31	-80.1	
5.0	10:20	5.67	22.7	662	0.24	-90.6	
Stabilisation Criteria		**+/- 0.05**	**+/- 10%**	**+/- 3%**	**+/- 10%**	**+/- 10%**	**Example Comments:** clear / slightly cloudy / turbid / very turbid / no odour / slight odour / odour / strong odour

Total Well Volume
Actual amount of water prior to sampling

**pH, temp, cond readings not necessary if well is purged dry*

Did field parameters stabilise? (Y) N NA

Was the well dry purged? Y (N)

Field QC Checks

Was pre-cleaning sampling equipment used for these samples?	(Y)	N	
Was pre-cleaning sampling equipment properly protected from contamination?	(Y)	N	
Was documentation of equipment conducted?	(Y)	N	NA
Were air bubbles present in vials at time of collection?	Y	(N)	NA
Was sample for metals field filtered prior to preservations?	(Y)	N	NA
Duplicate sample collected?	(Y)	N	

Duplicate sample ID: 20 DUP TRIP

342 Kings St Magnet

10026439 .Task4

ARCADIS Design & Consultancy for natural and built assets — Groundwater Monitoring Field Sheet

Job Information

Date: 8/1/18	Time: arrive depart
Project Name: Kent Street North	Project Number: 10026434
Site Location: Kent Street North	Operator: TK
Well ID: MW05	Weather: Sunny

Equipment

Water quality equipment description: YSI Pro Plus 18J104319

Interface probe number: 5m-0.1 20m 34291

Purging equipment: (please circle) Bailer type: Plastic Teflon

Pump type: (Peristaltic) Submersible Micro-purge Amazon Other:

Well Gauging and Purge Volume Calculations

Casing Diameter	25mm	50mm	100mm	125mm	150mm	200mm	250mm	300mm
Conversion Factor (volume in factor L/m)	0.98	(1.96)	7.85	31.4	49.1	70.7	125.7	196.3

Total Well Depth (-) Water level (=) Water Column: 5.020 m (-) 3.553 m (=) 1.467 m

Depth to Product: — (m)

Water Column (x) Conversion Factor (=) Litres per 1 Well Volume: 1.467 m (x) 1.96 (=) 2.875 L

Volume of water in well / V = Pr x r x h
V = volume in litres
P = 3.14159
r = radius in cm
h = height of water column in cm

Water Quality Parameters

Beginning purge time: Ending purge time:

Litres	Time	pH	Temp C	Cond µS/cm	DO ppm	Redox mV	Comments
0.5	10:45	5.22	21.5	780	0.49	14.0	brown silty, No odour, No sheen
1.0	10:49	5.18	21.4	761	0.03	53.6	
2.0	10:53	5.17	21.3	746	0.04	85.9	
3.0	10:57	5.17	21.6	752	0.03	102.1	
4.0	11:01	5.17	21.6	753	0.03	106.9	slight brown, clear, no odour, no sheen
Stabilisation Criteria		**+/- 0.05**	**+/- 10%**	**+/- 3%**	**+/- 10%**	**+/- 10%**	**Example Comments:** clear / slightly cloudy / turbid / very turbid / no odour / slight odour / odour / strong odour

Total Well Volume
Actual amount of water prior to sampling

*pH, temp, cond readings not necessary if well is purged dry

Did field parameters stabilise? (Y) N NA

Was the well dry purged? Y (N)

Field QC Checks

Was pre-cleaning sampling equipment used for these samples?	(Y)	N	
Was pre-cleaning sampling equipment properly protected from contamination?	(Y)	N	
Was documentation of equipment conducted?	(Y)	N	NA
Were air bubbles present in vials at time of collection?	Y	(N)	NA
Was sample for metals field filtered prior to preservations?	(Y)	N	NA
Duplicate sample collected?	Y	(N)	Duplicate sample ID

ARCADIS Design & Consultancy for natural and built assets — Groundwater Monitoring Field Sheet

Job Information

Date: 8/1/19	Time: arrive / depart
Project Name: Kent Street North Quarter	Project Number: 10028439
Site Location: Kent Street North	Operator: TK
Well ID: MW07	Weather: Sunny

Equipment

Water quality equipment description: YSI Pro Plus 18

Interface probe number: Sm-0.1 20m 34291

Purging equipment: (please cirlce) Bailer type: Plastic Teflon

Pump type: Peristaltic Submersible Micro-purge Amazon Other:

Well Gauging and Purge Volume Calculations

Casing Diameter	25mm	50mm	100mm	125mm	150mm	200mm	250mm	300mm
Conversion Factor (volume in factor L/m)	0.98	1.96	7.85	31.4	49.1	70.7	125.7	196.3

Total Well Depth (-) Water level (=) Water Column: 4.80 m (-) 3.349m (=) 1.451 m

Depth to Product: ____ (m)

Water Column (x) Conversion Factor (=) Litres per 1 Well Volume: 1.451 m (x) 1.96 (=) 2.844 L

Volume of water in well / V = Pr x r x h
V = volume in litres
P = 3.14159
r = radius in cm
h = height of water column in cm

Water Quality Parameters

Beginning purge time: 11:30 Ending purge time: 11:50

Litres	Time	pH	Temp C	Cond µS/cm	DO ppm	Redox mV	Comments
0.5	11:30	5.59	24.9	668	1.17	117.7	Slight brown, clear, No odour, No sheen
1.0	11:34	5.50	24.6	659	0.95	123.2	
2.0	11:38	5.58	24.5	658	0.91	124.2	
3.0	11:42	5.58	24.4	659	0.78	126.2	
4.0	11:46	5.57	24.2	655	0.84	131.1	
5.0	11:50	5.57	24.3	656	0.79	133.1	
Stabilisation Criteria		**+/- 0.05**	**+/- 10%**	**+/- 3%**	**+/- 10%**	**+/- 10%**	**Example Comments:** clear / slightly cloudy / turbid / very turbid / no odour / slight odour / odour / strong odour

Total Well Volume
Actual amount of water prior to sampling

*pH, temp, cond readings not necessary if well is purged dry

Did field parameters stabilise? (Y) N NA

Was the well dry purged? Y (N)

Field QC Checks

Was pre-cleaning sampling equipment used for these samples?	(Y)	N	
Was pre-cleaning sampling equipment properly protected from contamination?	(Y)	N	
Was documentation of equipment conducted?	(Y)	N	NA
Were air bubbles present in vials at time of collection?	Y	(N)	NA
Was sample for metals field filtered prior to preservations?	(Y)	N	NA
Duplicate sample collected?	Y	(N)	Duplicate sample ID

ARCADIS Design & Consultancy for natural and built assets — Groundwater Monitoring Field Sheet

Job Information

Date: 8/1/19	Time: arrive depart
Project Name: Kent St North Quarry	Project Number: 10026439
Site Location: Kent St North Quarry	Operator: TK
Well ID: MW06	Weather: Sunny

Equipment

Water quality equipment description: YSI Pro Plus

Interface probe number: Sm. 0.1 20m 34291

Purging equipment: (please circle) Bailer type: Plastic Teflon

Pump type: Peristaltic Submersible Micro-purge Amazon Other:

Well Gauging and Purge Volume Calculations

Casing Diameter	25mm	50mm	100mm	125mm	150mm	200mm	250mm	300mm
Conversion Factor (volume in factor L/m)	0.98	1.96	7.85	31.4	49.1	70.7	125.7	196.3

Total Well Depth (-) Water level (=) Water Column: 5.100 m (-) 1.896 m (=) 3.204 m

Depth to Product: _____ (m)

Water Column (x) Conversion Factor (=) Litres per 1 Well Volume: 3.204 m (x) 1.96 (=) 6.280 L

Volume of water in well / V = Pr x r x h
V = volume in litres
P = 3.14159
r = radius in cm
h = height of water column in cm

Water Quality Parameters

Beginning purge time: Ending purge time:

Litres	Time	pH	Temp C	Cond µS/cm	DO ppm	Redox mV	Comments
0.5	12:10	4.29	23.7	871	0.05	178.9	Slight br No odour No sheen
1.0	12:14	4.98	23.4	863	0.00	188.0	
2.0	12:18	4.97	23.4	866	0.00	193.2	clear
3.0	12:22	4.96	23.6	856	0.00	194.4	
4.0	12:26	4.96	23.5	853	0.00	193.7	
5.0	12:30	4.96	23.5	854	0.00	193.7	
Stabilisation Criteria		+/- 0.05	+/- 10%	+/- 3%	+/- 10%	+/- 10%	**Example Comments:** clear / slightly cloudy / turbid / very turbid / no odour / slight odour / odour / strong odour

Total Well Volume
Actual amount of water prior to sampling

*pH, temp, cond readings not necessary if well is purged dry

Did field parameters stabilise? (Y) N NA

Was the well dry purged? Y (N)

Field QC Checks

Was pre-cleaning sampling equipment used for these samples?	(Y)	N	
Was pre-cleaning sampling equipment properly protected from contamination?	(Y)	N	
Was documentation of equipment conducted?	(Y)	N	NA
Were air bubbles present in vials at time of collection?	Y	(N)	NA
Was sample for metals field filtered prior to preservations?	(Y)	N	NA
Duplicate sample collected?	Y	(N)	

Duplicate sample ID

ARCADIS Design & Consultancy for natural and built assets — Groundwater Monitoring Field Sheet

Job Information

Date: 8/1/19	Time: arrive depart
Project Name: Kent Street North, Qantas	Project Number: 10026439
Site Location: Kent Street North	Operator: TK
Well ID: MW04	Weather: Sunny

Equipment

Water quality equipment description:

Interface probe number:

Purging equipment: (please cirlce)
Bailer type: **Plastic** **Teflon**
Pump type: **Peristaltic** **Submersible** **Micro-purge** **Amazon** **Other:**

Well Gauging and Purge Volume Calculations

Casing Diameter	25mm	50mm	100mm	125mm	150mm	200mm	250mm	300mm
Conversion Factor (volume in factor L/m)	0.98	1.96	7.85	31.4	49.1	70.7	125.7	196.3

Total Well Depth (-) Water level (=) Water Column
5.025 m (-) 2.244 m (=) 2.781 m

Depth to Product _____ (m)

Water Column (x) Conversion Factor (=) Litres per 1 Well Volume
2.781 m (x) 1.96 (=) 5.451 L

Volume of water in well / V = Pr x r x h
V = volume in litres
P = 3.14159
r = radius in cm
h = height of water column in cm

Water Quality Parameters

Beginning purge time: Ending purge time:

Litres	Time	pH	Temp C	Cond µS/cm	DO ppm	Redox mV	Comments
0.5	12:50	5.82	25.9	499.0	0.10	-106.9	slight brown, No odour, No sheen
1.0	12:54	5.81	25.8	491.7	0.00	-117.1	
2.0	15:58	5.80	25.8	482.6	0.00	-119.5	
3.0	15:02	5.75	25.7	482.5	0.00	-121.4	
4.0	15:06	5.76	25.7	475.0	0.00	-123.1	
Stabilisation Criteria		**+/- 0.05**	**+/- 10%**	**+/- 3%**	**+/- 10%**	**+/- 10%**	**Example Comments:** clear / slightly cloudy / turbid / very turbid / no odour / slight odour / odour / strong odour

Total Well Volume
Actual amount of water prior to sampling

**pH, temp, cond readings not necessary if well is purged dry*

Did field parameters stabilise? (Y) N NA

Was the well dry purged? Y (N)

Field QC Checks

Was pre-cleaning sampling equipment used for these samples?	(Y)	N		
Was pre-cleaning sampling equipment properly protected from contamination?	(Y)	N		
Was documentation of equipment conducted?	(Y)	N	NA	
Were air bubbles present in vials at time of collection?	Y	(N)	NA	
Was sample for metals field filtered prior to preservations?	(Y)	N	NA	
Duplicate sample collected?	Y	(N)		Duplicate sample ID

ARCADIS Design & Consultancy for natural and built assets — Groundwater Monitoring Field Sheet

Job Information

Date: 8/1/18	Time: arrive depart
Project Name: ~~KG~~ King Street North Qantas	Project Number: 10026439
Site Location: King Street North	Operator: TL
Well ID: MW02	Weather: Sunny

Equipment

Water quality equipment description: YSI Pro Plus

Interface probe number: 5m. Oil 20m 3429l

Purging equipment (please cirlce): Bailer type: Plastic Teflon

Pump type: (Peristaltic) Submersible Micro-purge Amazon Other:

Well Gauging and Purge Volume Calculations

Casing Diameter	25mm	50mm	100mm	125mm	150mm	200mm	250mm	300mm
Conversion Factor (volume in factor L/m)	0.98	(1.96)	7.85	31.4	49.1	70.7	125.7	196.3

Total Well Depth (-) Water level (=) Water Column

4.060 m (-) 1.418 m (=) 2.642 m

Depth to Product: — (m)

Water Column (x) Conversion Factor (=) Litres per 1 Well Volume

2.642 m (x) 1.96 (=) 5.178 L

Volume of water in well / V = Pr x r x h
V = volume in litres
P = 3.14159
r = radius in cm
h = height of water column in cm

Water Quality Parameters

Beginning purge time: Ending purge time:

Litres	Time	pH	Temp C	Cond µS/cm	DO ppm	Redox mV	Comments
0.5	13:28	6.09	25.0	343.0	0.10	-149.6	Slight sulfur odour Silty brown
1.0	13:32	6.18	24.7	340.2	0.00	-163.4	No odour No sheen becoming clear brown
2.0	13:36	6.11	24.5	346.2	0.00	-170.7	
3.0	13:40	6.04	24.7	344.0	0.00	-170.0	
4.0	13:44	6.07	24.9	337.3	0.00	-171.1	
5.0	13:48	6.07	24.9	337.0	0.00	-171.2	
Stabilisation Criteria		**+/- 0.05**	**+/- 10%**	**+/- 3%**	**+/- 10%**	**+/- 10%**	**Example Comments:** clear / slightly cloudy / turbid / very turbid / no odour / slight odour / odour / strong odour

Total Well Volume
Actual amount of water prior to sampling

**pH, temp, cond readings not necessary if well is purged dry*

Did field parameters stabilise? (Y) N NA

Was the well dry purged? Y (N)

Field QC Checks

Was pre-cleaning sampling equipment used for these samples?	(Y)	N	
Was pre-cleaning sampling equipment properly protected from contamination?	(Y)	N	
Was documentation of equipment conducted?	(Y)	N	NA
Were air bubbles present in vials at time of collection?	Y	(N)	NA
Was sample for metals field filtered prior to preservations?	(Y)	N	NA
Duplicate sample collected?	Y	(N)	Duplicate sample ID

ARCADIS Design & Consultancy for natural and built assets — Groundwater Monitoring Field Sheet

Job Information

Date:	8/1/18	Time: arrive	depart
Project Name:	King Street North Quarter	Project Number:	10026489
Site Location:	King Street North	Operator:	TL
Well ID:	MW07	Weather:	Sunny

Equipment

Water quality equipment description:	YSI Pro Plus					
Interface probe number:	5m-0,1 20m 34029					
Purging equipment: (please cirlce)	Bailer type:	**Plastic**	**Teflon**			
	Pump type:	**(Peristaltic)**	**Submersible**	**Micro-purge**	**Amazon**	**Other:**

Well Gauging and Purge Volume Calculations

Casing Diameter	25mm	50mm	100mm	125mm	150mm	200mm	250mm	300mm
Conversion Factor (volume in factor L/m)	0.98	(1.96)	7.85	31.4	49.1	70.7	125.7	196.3

Volume of water in well / V = Pr x r x h
V = volume in litres
P = 3.14159
r = radius in cm
h = height of water column in cm

Total Well Depth (-) Water level (=) Water Column — Depth to Product

4.010 m (-) 0.975 m (=) 3.035 m ——— (m)

Water Column (x) Conversion Factor (=) Litres per 1 Well Volume

3.035 m (x) 1.96 (=) 5.949 L

Water Quality Parameters

Beginning purge time: | Ending purge time:

Litres	Time	pH	Temp C	Cond µS/cm	DO ppm	Redox mV	Comments
0.5	14:06	6.64	27.1	455.5	0.76	-31.7	clear, No odor, No Sheen
1.0	14:10	6.66	27.3	459.8	0.19	-22.9	
2.0	14:14	6.68	27.4	452.9	0.08	-11.0	
3.0	14:18	6.70	27.7	456.3	0.08	-5.7	
4.0	14:22	6.70	27.5	459.5	0.06	-3.3	
Stabilisation Criteria		**+/- 0.05**	**+/- 10%**	**+/- 3%**	**+/- 10%**	**+/- 10%**	**Example Comments:** clear / slightly cloudy / turbid / very turbid / no odour / slight odour / odour / strong odour

Total Well Volume
Actual amount of water prior to sampling

**pH, temp, cond readings not necessary if well is purged dry*

Did field parameters stabilise? (Y) N NA

Was the well dry purged? Y (N)

Field QC Checks

Was pre-cleaning sampling equipment used for these samples?	(Y)	N		
Was pre-cleaning sampling equipment properly protected from contamination?	(Y)	N		
Was documentation of equipment conducted?	(Y)	N	NA	
Were air bubbles present in vials at time of collection?	Y	(N)	NA	
Was sample for metals field filtered prior to preservations?	(Y)	N	NA	
Duplicate sample collected?	Y	(N)		Duplicate sample ID

ARCADIS Design & Consultancy for natural and built assets — Groundwater Monitoring Field Sheet

Job Information

Date: 19/2/19.	Time: arrive 0840. depart 0918.
Project Name: Qantas Flight Training Centre & Carpark	Project Number: 10026939. 6.
Site Location: 297 King St, Mascot NSW 2000	Operator: CR.
Well ID: MW1	Weather: cloudy, NW winds

Equipment

Water quality equipment description: YSI Pro Plus

Interface probe number: 34291

Purging equipment (please circle)
Bailer type: **Plastic** **Teflon**
Pump type: **Peristaltic** **Submersible** **Micro-purge** **Amazon** **Other:**

Well Gauging and Purge Volume Calculations

Casing Diameter	25mm	50mm	100mm	125mm	150mm	200mm	250mm	300mm
Conversion Factor (volume in factor L/m)	0.98	1.96	7.85	31.4	49.1	70.7	125.7	196.3

Volume of water in well / V = Pr x r x h
V = volume in litres
P = 3.14159
r = radius in cm
h = height of water column in cm

Total Well Depth (-) Water level (=) Water Column Depth to Product
3.594 m (-) 2.555 m (=) _____ m _____ (m)

Water Column (x) Conversion Factor (=) Litres per 1 Well Volume
_____ m (x) _____ (=) _____ L

Water Quality Parameters

Beginning purge time: 0845 Ending purge time:

Litres	Time	pH	Temp C	Cond µS/cm	DO ppm	Redox mV	Comments
1.00	0849	6.13	23.3	0.57	0.78	-203.2	Slightly cloudy, light brown, sulfur odour
2.00	0852	6.14	23.0	0.57	0.98	-214.5	No sheen.
3.00	0857	6.15	22.9	0.57	1.11	-216.7	becoming dark brown
4.00	0903	6.14	22.8	0.57	1.15	-222.0	
Stabilisation Criteria		**+/- 0.05**	**+/- 10%**	**+/- 3%**	**+/- 10%**	**+/- 10%**	**Example Comments:** clear / slightly cloudy / turbid / very turbid / no odour / slight odour / odour / strong odour

Total Well Volume
Actual amount of water prior to sampling

**pH, temp, cond readings not necessary if well is purged dry*

Did field parameters stabilise? (Y) N NA Was the well dry purged? Y (N)

Field QC Checks

Was pre-cleaning sampling equipment used for these samples?	(Y)	N	
Was pre-cleaning sampling equipment properly protected from contamination?	(Y)	N	
Was documentation of equipment conducted?	(Y)	N	NA
Were air bubbles present in vials at time of collection?	Y	(N)	NA
Was sample for metals field filtered prior to preservations?	(Y)	N	NA
Duplicate sample collected?	Y	(N)	Duplicate sample ID

ARCADIS Design & Consultancy for natural and built assets — Groundwater Monitoring Field Sheet

Job Information

Date:	19/2/19.	Time: arrive	0759 depart 0840.
Project Name:	Qantas Flight Training Centre & Carpark	Project Number:	1002 49 39.6.
Site Location:	297 King St, Mascot NSW 2020	Operator:	CR
Well ID:	MW2.	Weather:	Cloudy NNW winds

Equipment

Water quality equipment description:	YSI Pro Plus.					
Interface probe number:	34291					
Purging equipment: (please cirlce)	Bailer type:	**Plastic**	**Teflon**			
	Pump type:	**Peristaltic**	**Submersible**	**Micro-purge**	**Amazon**	**Other:**

Well Gauging and Purge Volume Calculations

Casing Diameter	25mm	50mm	100mm	125mm	150mm	200mm	250mm	300mm
Conversion Factor (volume in factor L/m)	0.98	1.96	7.85	31.4	49.1	70.7	125.7	196.3

Volume of water in well / V = Pr x r x h
V = volume in litres
P = 3.14159
r = radius in cm
h = height of water column in cm

Total Well Depth (-) Water level (=) Water Column: 3.896 m (-) 2.390 m (=) 1.506 m

Depth to Product: — (m)

Water Column (x) Conversion Factor (=) Litres per 1 Well Volume: 1.506 m (x) 1.96 (=) 2.95 L

Water Quality Parameters

Beginning purge time: 0807 Ending purge time:

Litres	Time	pH	Temp C	Cond µS/cm	DO ppm	Redox mV	Comments
1.00	0808.	5.99	23.1	0.385	0.24	-228.1	Slightly cloudy, light brown, Slight sulfur odour
2.00	0815	5.97.	22.9	0.394	0.46	-241.8.	no Sheen.
3.00	0820.	5.96	22.9	0.404	0.73	-240.5	
4.00	0825	5.95	22.9	0.409.	0.94	-237.0	
5.00	0828	5.94	22.8	0.412	0.99	-235.0	
Stabilisation Criteria		**+/- 0.05**	**+/- 10%**	**+/- 3%**	**+/- 10%**	**+/- 10%**	**Example Comments:** clear / slightly cloudy / turbid / very turbid / no odour / slight odour / odour / strong odour

Total Well Volume
Actual amount of water prior to sampling

**pH, temp, cond readings not necessary if well is purged dry*

Did field parameters stabilise? (Y) N NA

Was the well dry purged? Y (N)

Field QC Checks

Was pre-cleaning sampling equipment used for these samples?	(Y)	N	
Was pre-cleaning sampling equipment properly protected from contamination?	(Y)	N	
Was documentation of equipment conducted?	(Y)	N	NA
Were air bubbles present in vials at time of collection?	Y	(N)	NA
Was sample for metals field filtered prior to preservations?	(Y)	N	NA
Duplicate sample collected?	Y	(N)	Duplicate sample ID

ARCADIS Design & Consultancy for natural and built assets — Groundwater Monitoring Field Sheet

Job Information

Date:	19/2/19	Time: arrive	0730 depart 0758
Project Name:	Qantas Flight Centre 7 Carpark	Project Number:	10026439.6.
Site Location:	297 King St, Mascot NSW 2020	Operator:	CR
Well ID:	MW3.	Weather:	Overcast

Equipment

Water quality equipment description:	YSI Pro Plus					
Interface probe number:	34291.					
Purging equipment: (please cirlce)	Bailer type:	~~Plastic~~	Teflon			
	Pump type:	Peristaltic	Submersible	Micro-purge	Amazon	Other:

Well Gauging and Purge Volume Calculations

Casing Diameter	25mm	50mm	100mm	125mm	150mm	200mm	250mm	300mm
Conversion Factor (volume in factor L/m)	0.98	1.96	7.85	31.4	49.1	70.7	125.7	196.3

Volume of water in well / V = Pr x r x h
V = volume in litres
P = 3.14159
r = radius in cm
h = height of water column in cm

Total Well Depth (-) Water level (=) Water Column: 3.496 m (-) 2.341 m (=) 1.155 m

Depth to Product: ——— (m)

Water Column (x) Conversion Factor (=) Litres per 1 Well Volume: 1.155 m (x) 1.96 (=) 2.264 L

Water Quality Parameters

Beginning purge time: 0734

Ending purge time:

Litres	Time	pH	Temp C	Cond µS/cm	DO ppm	Redox mV	Comments
1.00	0738	5.89	23.8	0.341	0.49	-221.4	Dark brown, turbid, slight HC odour, No sheen
2.00	0741	5.90	23.5	0.341	0.69	-228.7	
3.00	0744	5.90	23.4	0.338	0.76	-231.4	
4.00	0747	5.90	23.4	0.336	0.80	-232.3	
Stabilisation Criteria		**+/- 0.05**	**+/- 10%**	**+/- 3%**	**+/- 10%**	**+/- 10%**	**Example Comments:** clear / slightly cloudy / turbid / very turbid / no odour / slight odour / odour / strong odour

Total Well Volume
Actual amount of water prior to sampling

**pH, temp, cond readings not necessary if well is purged dry*

Did field parameters stabilise? (Y) N NA

Was the well dry purged? Y (N)

Field QC Checks

Was pre-cleaning sampling equipment used for these samples?	(Y)	N		
Was pre-cleaning sampling equipment properly protected from contamination?	(Y)	N		
Was documentation of equipment conducted?	(Y)	N	NA	
Were air bubbles present in vials at time of collection?	Y	(N)	NA	
Was sample for metals field filtered prior to preservations?	(Y)	N	NA	
Duplicate sample collected?	Y	(N)		Duplicate sample ID

4 → 1
3 → 2

ARCADIS Design & Consultancy for natural and built assets — Groundwater Monitoring Field Sheet

Job Information

Date:	19/2/19.	Time: arrive	0640 depart 0730.
Project Name:	Qantas Flight Training Centre Longue	Project Number:	10026439
Site Location:	297 King St, Mascot NSW. 2020	Operator:	CR
Well ID:	MW4	Weather:	Cloudy

Equipment

Water quality equipment description: YSI Pro Plus

Interface probe number: 34291

Purging equipment: (please cirlce)

Bailer type: **Plastic** **Teflon**

Pump type: **Peristaltic** **Submersible** **Micro-purge** **Amazon** **Other:**

Well Gauging and Purge Volume Calculations

Casing Diameter	25mm	50mm	100mm	125mm	150mm	200mm	250mm	300mm
Conversion Factor (volume in factor L/m)	0.98	1.96	7.85	31.4	49.1	70.7	125.7	196.3

Volume of water in well / V = Pr x r x h
V = volume in litres
P = 3.14159
r = radius in cm
h = height of water column in cm

Total Well Depth (-) Water level (=) Water Column: 3.895 m (-) 2.375 m (=) 1.52 m

Depth to Product: — (m)

Water Column (x) Conversion Factor (=) Litres per 1 Well Volume: 1.52 m (x) 1.96 (=) 2.98 L

Water Quality Parameters

Beginning purge time: 0649.

Ending purge time:

Litres	Time	pH	Temp C	Cond µS/cm	DO ppm	Redox mV	Comments
1.00	0652.	5.96.	23.6	0.62	0.59	-196.6	dark Brown ~~to green~~, HC odour, turbid, no sheen.
2.00	0655	5.93	23.6	0.61	0.42	-207.2	
3.00	0700	5.94	23.5	0.61	0.48	-212.9.	
4.00	0704	5.94	23.5	0.60	0.55	-218.3.	
5.00	0708	5.93.	23.6	0.59.	0.69	-220.9.	
6.00	0712.	5.94	23.5	0.58	0.73.	-222.2	
Stabilisation Criteria		+/- 0.05	+/- 10%	+/- 3%	+/- 10%	+/- 10%	**Example Comments:** clear / slightly cloudy / turbid / very turbid / no odour / slight odour / odour / strong odour

Total Well Volume
Actual amount of water prior to sampling

**pH, temp, cond readings not necessary if well is purged dry*

Did field parameters stabilise? (Y) N NA

Was the well dry purged? Y (N)

Field QC Checks

Was pre-cleaning sampling equipment used for these samples?	(Y)	N	
Was pre-cleaning sampling equipment properly protected from contamination?	(Y)	N	
Was documentation of equipment conducted?	(Y)	N	NA
Were air bubbles present in vials at time of collection?	Y	(N)	NA
Was sample for metals field filtered prior to preservations?	(Y)	N	NA
Duplicate sample collected?	Y	(N)	Duplicate sample ID N/A

APPENDIX G **RESULTS SUMMARY TABLES**

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE·

SDG	ALSE-Sydney 17-Dec-18	ALSE-Sydney 17-Dec-18	
Field ID	BH01@2.00	DUP1	RPD
Sampled Date/Time	12-12-18 15:00	12-12-18 15:00	

Chem_Group	ChemName	Units	EQL			
PAH/Phenols	Acetophenone	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
SVOCs	2-(acetylamino) fluorene	mg/kg	0.5	<0.5	<0.5	0
	3,3-Dichlorobenzidine	mg/kg	0.5	<0.5	<0.5	0
	4-(dimethylamino) azobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	4-bromophenyl phenyl ether	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	4-chlorophenyl phenyl ether	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	4-Nitroquinoline-N-oxide	mg/kg	0.5	<0.5	<0.5	0
	Azobenzene	mg/kg	1	<1	<1	0
	Bis(2-chloroethoxy) methane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Bis(2-chloroethyl)ether	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Dibenzofuran	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Hexachloropropene	mg/kg	0.5	<0.5	<0.5	0
	Methapyrilene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	N-nitrosomorpholine	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	N-nitrosopiperidine	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	N-nitrosopyrrolidine	mg/kg	1	<1	<1	0
	Phenacetin	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
Asbestos	Asbestos fibres	-	0.1			
Inorganics	Moisture Content	%	1	31	28.2	9
Metals	Arsenic	mg/kg	5 : 4 (Interlab)	10	7	35
	Cadmium	mg/kg	1 : 0.4 (Interlab)	<1	<1	0
	Chromium (III+VI)	mg/kg	2 : 1 (Interlab)	2	<2	0
	Copper	mg/kg	5 : 1 (Interlab)	8	<5	46
	Lead	mg/kg	5 : 1 (Interlab)	46	23	67
	Mercury	mg/kg	0.1	0.3	0.2	40
	Nickel	mg/kg	2 : 1 (Interlab)	<2	<2	0
	Zinc	mg/kg	5 : 1 (Interlab)	40	18	76
TPH	C6-C9	mg/kg	10 : 25 (Interlab)	<10	<10	0
	C10-C14	mg/kg	50	<50	<50	0
	C15-C28	mg/kg	100	<100	<100	0
	C29-C36	mg/kg	100	<100	<100	0
	C10-C36 (Sum of total)	mg/kg	50	<50	<50	0
TRH	C6-C10	mg/kg	10 : 25 (Interlab)	<10	<10	0
	>C6-C10 less BTEX (F1)	mg/kg	10 : 25 (Interlab)	<10	<10	0
	C10-C16	mg/kg	50	<50	<50	0
	>C10-C16 less Naphthalene (F2)	mg/kg	50	<50	<50	0
	C16-C34	mg/kg	100	<100	<100	0
	C34-C40	mg/kg	100	<100	<100	0
	>C10 - C40 (Sum of total)	mg/kg	50	<50	<50	0
BTEX	Benzene	mg/kg	0.2	<0.2	<0.2	0
	Benzene	mg/kg	0.2	<0.2	<0.2	0
	Toluene	mg/kg	0.5	<0.5	<0.5	0
	Toluene	mg/kg	0.5	<0.5	<0.5	0
	Ethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Ethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Xylene (m & p)	mg/kg	0.5 : 2 (Interlab)	<0.5	<0.5	0
	Xylene (m & p)	mg/kg	0.5 : 2 (Interlab)	<0.5	<0.5	0
	Xylene (o)	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Xylene (o)	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Xylene Total	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Total BTEX	mg/kg	0.2	<0.2	<0.2	0
MAH	1,2,4-trimethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,3,5-trimethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Isopropylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	n-butylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	n-propylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	p-isopropyltoluene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	sec-butylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Styrene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	tert-butylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
PAH	2-chloronaphthalene	mg/kg	0.5	<0.5	<0.5	0
	2-methylnaphthalene	mg/kg	0.5	<0.5	<0.5	0
	3-methylcholanthrene	mg/kg	0.5	<0.5	<0.5	0
	7,12-dimethylbenz(a)anthracene	mg/kg	0.5	<0.5	<0.5	0
	Acenaphthene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Acenaphthylene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Anthracene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Benz(a)anthracene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Benzo(a) pyrene	mg/kg	0.5 : 0.05 (Interlab)	<0.5	<0.5	0
	Benzo(a)pyrene TEQ calc (Zero)	mg/kg	0.5	<0.5	<0.5	0
	Benzo(a)pyrene TEQ calc (Half)	mg/kg	0.5	0.6	0.6	0
	Benzo(a)pyrene TEQ (LOR)	mg/kg	0.5	1.2	1.2	0
	Benzo(g,h,i)perylene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE

	SDG			ALSE-Sydney 17-Dec-18	ALSE-Sydney 17-Dec-18	
	Field ID			BH01@2.00	DUP1	**RPD**
	Sampled Date/Time			12-12-18 15:00	12-12-18 15:00	
	Benzo(b+j+k)fluoranthene	mg/kg	1 : 0.2 (Interlab)	<1	<1	0
	Chrysene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Dibenz(a,h)anthracene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Fluoranthene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Fluorene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Indeno(1,2,3-c,d)pyrene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Naphthalene	mg/kg	1 : 0.5 (Interlab)	<1	<1	0
	Naphthalene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Phenanthrene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Pyrene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	PAHs (Sum of total)	mg/kg	0.5	<0.5	<0.5	0
Phenols	2,4,5-trichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2,4,6-trichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2,4-dichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2,4-dimethylphenol	mg/kg	0.5	<0.5	<0.5	0
	2,6-dichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2-chlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2-nitrophenol	mg/kg	0.5	<0.5	<0.5	0
	2-methylphenol	mg/kg	0.5	<0.5	<0.5	0
	3&4-Methylphenol (m&p-cresol)	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	4-chloro-3-methylphenol	mg/kg	0.5 : 5 (Interlab)	<0.5	<0.5	0
	Pentachlorophenol	mg/kg	1 : 5 (Interlab)	<1	<1	0
	Phenol	mg/kg	0.5	<0.5	<0.5	0
PCBs	PCBs (Sum of total)	mg/kg	0.1	<0.1	<0.1	0
Chlorinated Hydrocarbons	1,1,2,2-tetrachloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,1,1,2-tetrachloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,1,2-trichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,1,1-trichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,1-dichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,1-dichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,1-dichloropropene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2,3-trichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2-dibromo-3-chloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2-dichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2-dichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,3-dichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	2,2-dichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Bromodichloromethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Bromoform	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Carbon tetrachloride	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Chlorodibromomethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Chloroethane	mg/kg	5 : 1 (Interlab)	<5	<5	0
	Chloroform	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Chloromethane	mg/kg	5 : 1 (Interlab)	<5	<5	0
	cis-1,2-dichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	cis-1,3-dichloropropene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Dibromomethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Hexachlorocyclopentadiene	mg/kg	2.5 : 2 (Interlab)	<2.5	<2.5	0
	Hexachloroethane	mg/kg	0.5	<0.5	<0.5	0
	Hexachlorobutadiene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Trichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Tetrachloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	trans-1,2-dichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	trans-1,3-dichloropropene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Vinyl chloride	mg/kg	5 : 1 (Interlab)	<5	<5	0
Organochlorine Pesticides	a-BHC	µg/kg	500 : 100 (Interlab)	<500	<500	0
	a-BHC	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Aldrin	µg/kg	500 : 100 (Interlab)	<500	<500	0
	Aldrin	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Dieldrin	µg/kg	500 : 100 (Interlab)	<500	<500	0
	Dieldrin	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Aldrin + Dieldrin	mg/kg	0.05	<0.05	<0.05	0
	b-BHC	µg/kg	500 : 100 (Interlab)	<500	<500	0
	b-BHC	µg/kg	50 : 500 (Interlab)	<50	<50	0
	chlordane	µg/kg	50	<50	<50	0
	Chlordane (cis)	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Chlordane (trans)	µg/kg	50 : 500 (Interlab)	<50	<50	0
	d-BHC	µg/kg	500 : 100 (Interlab)	<500	<500	0
	d-BHC	µg/kg	50 : 500 (Interlab)	<50	<50	0
	DDD	µg/kg	500 : 100 (Interlab)	<500	<500	0
	DDD	µg/kg	50 : 500 (Interlab)	<50	<50	0
	4,4-DDE	µg/kg	500 : 100 (Interlab)	<500	<500	0
	4,4-DDE	µg/kg	50 : 500 (Interlab)	<50	<50	0
	DDT	µg/kg	200 : 500 (Interlab)	<200	<200	0
	DDT	µg/kg	1000 : 500 (Interlab)	<1000	<1000	0
	DDT+DDE+DDD	µg/kg	50 : 100 (Interlab)	<50	<50	0
	Endosulfan	µg/kg	50	<50	<50	0
	Endrin ketone	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Endosulfan I	µg/kg	500 : 100 (Interlab)	<500	<500	0

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE

			SDG	ALSE-Sydney 17-Dec-18	ALSE-Sydney 17-Dec-18	
			Field ID	BH01@2.00	DUP1	**RPD**
			Sampled Date/Time	12-12-18 15:00	12-12-18 15:00	
	Endosulfan I	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Endosulfan II	µg/kg	500 : 100 (Interlab)	<500	<500	0
	Endosulfan II	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Endosulfan sulphate	µg/kg	500 : 100 (Interlab)	<500	<500	0
	Endosulfan sulphate	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Endrin	µg/kg	500 : 100 (Interlab)	<500	<500	0
	Endrin	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Endrin aldehyde	µg/kg	50 : 500 (Interlab)	<50	<50	0
	g-BHC (Lindane)	µg/kg	500 : 100 (Interlab)	<500	<500	0
	g-BHC (Lindane)	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Heptachlor	µg/kg	500 : 100 (Interlab)	<500	<500	0
	Heptachlor	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Heptachlor epoxide	µg/kg	500 : 100 (Interlab)	<500	<500	0
	Heptachlor epoxide	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Methoxychlor	µg/kg	200 : 1000 (Interlab)	<200	<200	0
Organophosphorous Pesticides	Azinophos methyl	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Bromophos-ethyl	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Carbophenothion	mg/kg	0.05	<0.05	<0.05	0
	Chlorfenvinphos	mg/kg	0.5	<0.5	<0.5	0
	Chlorfenvinphos	mg/kg	0.05	<0.05	<0.05	0
	Chlorpyrifos	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Chlorpyrifos	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Chlorpyrifos-methyl	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Chlorpyrifos-methyl	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Demeton-S-methyl	mg/kg	0.05	<0.05	<0.05	0
	Diazinon	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Diazinon	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Dichlorvos	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Dichlorvos	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Dimethoate	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Dimethoate	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Ethion	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Ethion	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Fenamiphos	mg/kg	0.05	<0.05	<0.05	0
	Fenthion	mg/kg	0.5	<0.5	<0.5	0
	Fenthion	mg/kg	0.05	<0.05	<0.05	0
	Malathion	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Malathion	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Methyl parathion	mg/kg	0.2	<0.2	<0.2	0
	Monocrotophos	mg/kg	0.2	<0.2	<0.2	0
	Parathion	mg/kg	0.2 : 0.1 (Interlab)	<0.2	<0.2	0
	Pirimphos-ethyl	mg/kg	0.5	<0.5	<0.5	0
	Pirimphos-ethyl	mg/kg	0.05	<0.05	<0.05	0
	Prothiofos	mg/kg	0.5	<0.5	<0.5	0
	Prothiofos	mg/kg	0.05	<0.05	<0.05	0
Pesticides	Chlorobenzilate	mg/kg	0.5	<0.5	<0.5	0
	Carbazole	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
Herbicides	Pronamide	mg/kg	0.5	<0.5	<0.5	0
Halogenated Hydrocarbons	1,2-dibromoethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	cis-1,4-Dichloro-2-butene	mg/kg	0.5	<0.5	<0.5	0
	trans-1,4-Dichloro-2-butene	mg/kg	0.5	<0.5	<0.5	0
	Pentachloroethane	mg/kg	0.5	<0.5	<0.5	0
	Bromomethane	mg/kg	5 : 1 (Interlab)	<5	<5	0
	Dichlorodifluoromethane	mg/kg	5 : 1 (Interlab)	<5	<5	0
	Iodomethane	mg/kg	0.5	<0.5	<0.5	0
	Trichlorofluoromethane	mg/kg	5 : 1 (Interlab)	<5	<5	0
Halogenated Benzenes	1,2,3-trichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2,4-trichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2-dichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,3-dichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,4-dichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	2-chlorotoluene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	4-chlorotoluene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Bromobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Chlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Hexachlorobenzene	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Hexachlorobenzene	µg/kg	1000 : 500 (Interlab)	<1000	<1000	0
	Pentachlorobenzene	mg/kg	0.5	<0.5	<0.5	0
Explosives	1,3,5-Trinitrobenzene	mg/kg	0.5	<0.5	<0.5	0
	2,4-Dinitrotoluene	mg/kg	1	<1	<1	0
	2,6-dinitrotoluene	mg/kg	1	<1	<1	0
	Nitrobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
Phthalates	Bis(2-ethylhexyl) phthalate	mg/kg	5 : 1 (Interlab)	<5	<5	0
	Butyl benzyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Diethylphthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Dimethyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE·

			SDG	ALSE-Sydney 17-Dec-18	ALSE-Sydney 17-Dec-18	
			Field ID	BH01@2.00	DUP1	**RPD**
			Sampled Date/Time	12-12-18 15:00	12-12-18 15:00	
	Di-n-butyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Di-n-octyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
Amino Aliphatics	N-nitrosodiethylamine	mg/kg	0.5	<0.5	<0.5	0
	N-nitrosodi-n-butylamine	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	N-nitrosodi-n-propylamine	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	N-Nitrosomethylethylamine	mg/kg	0.5	<0.5	<0.5	0
Amino Aromatics	1-naphthylamine	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	N-Nitrosodiphenyl & Diphenylamine	mg/kg	1	<1	<1	0
Anilines	2-nitroaniline	mg/kg	1	<1	<1	0
	3-nitroaniline	mg/kg	1	<1	<1	0
	4-chloroaniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	4-nitroaniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	2-methyl-5-nitroaniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Aniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
Nitroaromatics	2-Picoline	mg/kg	0.5	<0.5	<0.5	0
	4-aminobiphenyl	mg/kg	0.5	<0.5	<0.5	0
	Pentachloronitrobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
Solvents	Methyl Ethyl Ketone	mg/kg	5	<5	<5	0
	2-hexanone (MBK)	mg/kg	5	<5	<5	0
	4-Methyl-2-pentanone	mg/kg	5	<5	<5	0
	Carbon disulfide	mg/kg	0.5	<0.5	<0.5	0
	Isophorone	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Vinyl acetate	mg/kg	5	<5	<5	0

*RPDs have only been considered where a concentration is greater than 1 times the EQL.
**High RPDs are in bold (Acceptable RPDs for each EQL multiplier range are: 80 (1-10 x EQL); 50 (10-30 x EQL); 30 (> 30 x EQL))
***Interlab Duplicates are matched on a per compound basis as methods vary between laboratories. Any methods in the row header relate to those used in the primary labo

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE·

SDG	ALSE-Sydney 19-Dec-18	ALSE-Sydney 19-Dec-18	
Field ID	MW04@3.00	DUP4	RPD
Sampled Date/Time	19-12-18 15:00	19-12-18 15:00	

Chem_Group	ChemName	Units	EQL			
PAH/Phenols	Acetophenone	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
SVOCs	2-(acetylamino) fluorene	mg/kg	0.5	<0.5	<0.5	0
	3,3-Dichlorobenzidine	mg/kg	0.5	<0.5	<0.5	0
	4-(dimethylamino) azobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	4-bromophenyl phenyl ether	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	4-chlorophenyl phenyl ether	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	4-Nitroquinoline-N-oxide	mg/kg	0.5	<0.5	<0.5	0
	Azobenzene	mg/kg	1	<1	<1	0
	Bis(2-chloroethoxy) methane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Bis(2-chloroethyl)ether	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Dibenzofuran	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Hexachloropropene	mg/kg	0.5	<0.5	<0.5	0
	Methapyrilene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	N-nitrosomorpholine	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	N-nitrosopiperidine	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	N-nitrosopyrrolidine	mg/kg	1	<1	<1	0
	Phenacetin	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
Asbestos	Asbestos fibres	-	0.1			
Inorganics	Moisture Content	%	1	23.1	14.7	44
Metals	Arsenic	mg/kg	5 : 4 (Interlab)	<5	<5	0
	Cadmium	mg/kg	1 : 0.4 (Interlab)	<1	<1	0
	Chromium (III+VI)	mg/kg	2 : 1 (Interlab)	<2	<2	0
	Copper	mg/kg	5 : 1 (Interlab)	<5	<5	0
	Lead	mg/kg	5 : 1 (Interlab)	<5	<5	0
	Mercury	mg/kg	0.1	<0.1	<0.1	0
	Nickel	mg/kg	2 : 1 (Interlab)	<2	<2	0
	Zinc	mg/kg	5 : 1 (Interlab)	14	13	7
TPH	C6-C9	mg/kg	10 : 25 (Interlab)	<10	<10	0
	C10-C14	mg/kg	50	<50	<50	0
	C15-C28	mg/kg	100	<100	<100	0
	C29-C36	mg/kg	100	<100	<100	0
	C10-C36 (Sum of total)	mg/kg	50	<50	<50	0
TRH	C6-C10	mg/kg	10 : 25 (Interlab)	<10	<10	0
	>C6-C10 less BTEX (F1)	mg/kg	10 : 25 (Interlab)	<10	<10	0
	C10-C16	mg/kg	50	<50	<50	0
	>C10-C16 less Naphthalene (F2)	mg/kg	50	<50	<50	0
	C16-C34	mg/kg	100	<100	<100	0
	C34-C40	mg/kg	100	<100	<100	0
	>C10 - C40 (Sum of total)	mg/kg	50	<50	<50	0
BTEX	Benzene	mg/kg	0.2	<0.2	<0.2	0
	Benzene	mg/kg	0.2	<0.2	<0.2	0
	Toluene	mg/kg	0.5	<0.5	<0.5	0
	Toluene	mg/kg	0.5	<0.5	<0.5	0
	Ethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Ethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Xylene (m & p)	mg/kg	0.5 : 2 (Interlab)	<0.5	<0.5	0
	Xylene (m & p)	mg/kg	0.5 : 2 (Interlab)	<0.5	<0.5	0
	Xylene (o)	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Xylene (o)	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Xylene Total	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Total BTEX	mg/kg	0.2	<0.2	<0.2	0
MAH	1,2,4-trimethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,3,5-trimethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Isopropylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	n-butylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	n-propylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	p-isopropyltoluene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	sec-butylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Styrene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	tert-butylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
PAH	2-chloronaphthalene	mg/kg	0.5	<0.5	<0.5	0
	2-methylnaphthalene	mg/kg	0.5	<0.5	<0.5	0
	3-methylcholanthrene	mg/kg	0.5	<0.5	<0.5	0
	7,12-dimethylbenz(a)anthracene	mg/kg	0.5	<0.5	<0.5	0
	Acenaphthene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Acenaphthylene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Anthracene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Benz(a)anthracene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Benzo(a) pyrene	mg/kg	0.5 : 0.05 (Interlab)	<0.5	<0.5	0
	Benzo(a)pyrene TEQ calc (Zero)	mg/kg	0.5	<0.5	<0.5	0
	Benzo(a)pyrene TEQ calc (Half)	mg/kg	0.5	0.6	0.6	0
	Benzo(a)pyrene TEQ (LOR)	mg/kg	0.5	1.2	1.2	0
	Benzo(g,h,i)perylene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE

			SDG	ALSE-Sydney 19-Dec-18	ALSE-Sydney 19-Dec-18	
			Field ID	MW04@3.00	DUP4	**RPD**
			Sampled Date/Time	19-12-18 15:00	19-12-18 15:00	
	Benzo(b+j+k)fluoranthene	mg/kg	1 : 0.2 (Interlab)	<1	<1	0
	Chrysene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Dibenz(a,h)anthracene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Fluoranthene	mg/kg	0.5 : 0.1 (Interlab)	0.7	<0.5	33
	Fluorene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Indeno(1,2,3-c,d)pyrene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Naphthalene	mg/kg	1 : 0.5 (Interlab)	<1	<1	0
	Naphthalene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Phenanthrene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Pyrene	mg/kg	0.5 : 0.1 (Interlab)	0.7	<0.5	33
	PAHs (Sum of total)	mg/kg	0.5	**1.4**	**<0.5**	**95**
Phenols	2,4,5-trichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2,4,6-trichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2,4-dichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2,4-dimethylphenol	mg/kg	0.5	<0.5	<0.5	0
	2,6-dichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2-chlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2-nitrophenol	mg/kg	0.5	<0.5	<0.5	0
	2-methylphenol	mg/kg	0.5	<0.5	<0.5	0
	3&4-Methylphenol (m&p-cresol)	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	4-chloro-3-methylphenol	mg/kg	0.5 : 5 (Interlab)	<0.5	<0.5	0
	Pentachlorophenol	mg/kg	1 : 5 (Interlab)	<1	<1	0
	Phenol	mg/kg	0.5	<0.5	<0.5	0
PCBs	PCBs (Sum of total)	mg/kg	0.1	<0.1	<0.1	0
Chlorinated Hydrocarbons	1,1,2,2-tetrachloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,1,1,2-tetrachloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,1,2-trichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,1,1-trichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,1-dichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,1-dichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,1-dichloropropene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2,3-trichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2-dibromo-3-chloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2-dichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2-dichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,3-dichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	2,2-dichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Bromodichloromethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Bromoform	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Carbon tetrachloride	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Chlorodibromomethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Chloroethane	mg/kg	5 : 1 (Interlab)	<5	<5	0
	Chloroform	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Chloromethane	mg/kg	5 : 1 (Interlab)	<5	<5	0
	cis-1,2-dichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	cis-1,3-dichloropropene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Dibromomethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Hexachlorocyclopentadiene	mg/kg	2.5 : 2 (Interlab)	<2.5	<2.5	0
	Hexachloroethane	mg/kg	0.5	<0.5	<0.5	0
	Hexachlorobutadiene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Trichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Tetrachloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	trans-1,2-dichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	trans-1,3-dichloropropene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Vinyl chloride	mg/kg	5 : 1 (Interlab)	<5	<5	0
Organochlorine Pesticides	a-BHC	µg/kg	500 : 100 (Interlab)	<500	<500	0
	a-BHC	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Aldrin	µg/kg	500 : 100 (Interlab)	<500	<500	0
	Aldrin	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Dieldrin	µg/kg	500 : 100 (Interlab)	<500	<500	0
	Dieldrin	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Aldrin + Dieldrin	mg/kg	0.05	<0.05	<0.05	0
	b-BHC	µg/kg	500 : 100 (Interlab)	<500	<500	0
	b-BHC	µg/kg	50 : 500 (Interlab)	<50	<50	0
	chlordane	µg/kg	50	<50	<50	0
	Chlordane (cis)	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Chlordane (trans)	µg/kg	50 : 500 (Interlab)	<50	<50	0
	d-BHC	µg/kg	500 : 100 (Interlab)	<500	<500	0
	d-BHC	µg/kg	50 : 500 (Interlab)	<50	<50	0
	DDD	µg/kg	500 : 100 (Interlab)	<500	<500	0
	DDD	µg/kg	50 : 500 (Interlab)	<50	<50	0
	4,4-DDE	µg/kg	500 : 100 (Interlab)	<500	<500	0
	4,4-DDE	µg/kg	50 : 500 (Interlab)	<50	<50	0
	DDT	µg/kg	200 : 500 (Interlab)	<200	<200	0
	DDT	µg/kg	1000 : 500 (Interlab)	<1000	<1000	0
	DDT+DDE+DDD	µg/kg	50 : 100 (Interlab)	<50	<50	0
	Endosulfan	µg/kg	50	<50	<50	0
	Endrin ketone	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Endosulfan I	µg/kg	500 : 100 (Interlab)	<500	<500	0

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE

				SDG	ALSE-Sydney 19-Dec-18	ALSE-Sydney 19-Dec-18	
				Field ID	MW04@3.00	DUP4	RPD
				Sampled Date/Time	19-12-18 15:00	19-12-18 15:00	
	Endosulfan I	µg/kg	50 : 500 (Interlab)		<50	<50	0
	Endosulfan II	µg/kg	500 : 100 (Interlab)		<500	<500	0
	Endosulfan II	µg/kg	50 : 500 (Interlab)		<50	<50	0
	Endosulfan sulphate	µg/kg	500 : 100 (Interlab)		<500	<500	0
	Endosulfan sulphate	µg/kg	50 : 500 (Interlab)		<50	<50	0
	Endrin	µg/kg	500 : 100 (Interlab)		<500	<500	0
	Endrin	µg/kg	50 : 500 (Interlab)		<50	<50	0
	Endrin aldehyde	µg/kg	50 : 500 (Interlab)		<50	<50	0
	g-BHC (Lindane)	µg/kg	500 : 100 (Interlab)		<500	<500	0
	g-BHC (Lindane)	µg/kg	50 : 500 (Interlab)		<50	<50	0
	Heptachlor	µg/kg	500 : 100 (Interlab)		<500	<500	0
	Heptachlor	µg/kg	50 : 500 (Interlab)		<50	<50	0
	Heptachlor epoxide	µg/kg	500 : 100 (Interlab)		<500	<500	0
	Heptachlor epoxide	µg/kg	50 : 500 (Interlab)		<50	<50	0
	Methoxychlor	µg/kg	200 : 1000 (Interlab)		<200	<200	0
Organophosphorous Pesticides	Azinophos methyl	mg/kg	0.05 : 0.1 (Interlab)		<0.05	<0.05	0
	Bromophos-ethyl	mg/kg	0.05 : 0.1 (Interlab)		<0.05	<0.05	0
	Carbophenothion	mg/kg	0.05		<0.05	<0.05	0
	Chlorfenvinphos	mg/kg	0.5		<0.5	<0.5	0
	Chlorfenvinphos	mg/kg	0.05		<0.05	<0.05	0
	Chlorpyrifos	mg/kg	0.5 : 0.1 (Interlab)		<0.5	<0.5	0
	Chlorpyrifos	mg/kg	0.05 : 0.1 (Interlab)		<0.05	<0.05	0
	Chlorpyrifos-methyl	mg/kg	0.5 : 0.1 (Interlab)		<0.5	<0.5	0
	Chlorpyrifos-methyl	mg/kg	0.05 : 0.1 (Interlab)		<0.05	<0.05	0
	Demeton-S-methyl	mg/kg	0.05		<0.05	<0.05	0
	Diazinon	mg/kg	0.5 : 0.1 (Interlab)		<0.5	<0.5	0
	Diazinon	mg/kg	0.05 : 0.1 (Interlab)		<0.05	<0.05	0
	Dichlorvos	mg/kg	0.5 : 0.1 (Interlab)		<0.5	<0.5	0
	Dichlorvos	mg/kg	0.05 : 0.1 (Interlab)		<0.05	<0.05	0
	Dimethoate	mg/kg	0.5 : 0.1 (Interlab)		<0.5	<0.5	0
	Dimethoate	mg/kg	0.05 : 0.1 (Interlab)		<0.05	<0.05	0
	Ethion	mg/kg	0.5 : 0.1 (Interlab)		<0.5	<0.5	0
	Ethion	mg/kg	0.05 : 0.1 (Interlab)		<0.05	<0.05	0
	Fenamiphos	mg/kg	0.05		<0.05	<0.05	0
	Fenthion	mg/kg	0.5		<0.5	<0.5	0
	Fenthion	mg/kg	0.05		<0.05	<0.05	0
	Malathion	mg/kg	0.5 : 0.1 (Interlab)		<0.5	<0.5	0
	Malathion	mg/kg	0.05 : 0.1 (Interlab)		<0.05	<0.05	0
	Methyl parathion	mg/kg	0.2		<0.2	<0.2	0
	Monocrotophos	mg/kg	0.2		<0.2	<0.2	0
	Parathion	mg/kg	0.2 : 0.1 (Interlab)		<0.2	<0.2	0
	Pirimphos-ethyl	mg/kg	0.5		<0.5	<0.5	0
	Pirimphos-ethyl	mg/kg	0.05		<0.05	<0.05	0
	Prothiofos	mg/kg	0.5		<0.5	<0.5	0
	Prothiofos	mg/kg	0.05		<0.05	<0.05	0
Pesticides	Chlorobenzilate	mg/kg	0.5		<0.5	<0.5	0
	Carbazole	mg/kg	0.5 : 1 (Interlab)		<0.5	<0.5	0
Herbicides	Pronamide	mg/kg	0.5		<0.5	<0.5	0
Halogenated Hydrocarbons	1,2-dibromoethane	mg/kg	0.5 : 1 (Interlab)		<0.5	<0.5	0
	cis-1,4-Dichloro-2-butene	mg/kg	0.5		<0.5	<0.5	0
	trans-1,4-Dichloro-2-butene	mg/kg	0.5		<0.5	<0.5	0
	Pentachloroethane	mg/kg	0.5		<0.5	<0.5	0
	Bromomethane	mg/kg	5 : 1 (Interlab)		<5	<5	0
	Dichlorodifluoromethane	mg/kg	5 : 1 (Interlab)		<5	<5	0
	Iodomethane	mg/kg	0.5		<0.5	<0.5	0
	Trichlorofluoromethane	mg/kg	5 : 1 (Interlab)		<5	<5	0
Halogenated Benzenes	1,2,3-trichlorobenzene	mg/kg	0.5 : 1 (Interlab)		<0.5	<0.5	0
	1,2,4-trichlorobenzene	mg/kg	0.5 : 1 (Interlab)		<0.5	<0.5	0
	1,2-dichlorobenzene	mg/kg	0.5 : 1 (Interlab)		<0.5	<0.5	0
	1,3-dichlorobenzene	mg/kg	0.5 : 1 (Interlab)		<0.5	<0.5	0
	1,4-dichlorobenzene	mg/kg	0.5 : 1 (Interlab)		<0.5	<0.5	0
	2-chlorotoluene	mg/kg	0.5 : 1 (Interlab)		<0.5	<0.5	0
	4-chlorotoluene	mg/kg	0.5 : 1 (Interlab)		<0.5	<0.5	0
	Bromobenzene	mg/kg	0.5 : 1 (Interlab)		<0.5	<0.5	0
	Chlorobenzene	mg/kg	0.5 : 1 (Interlab)		<0.5	<0.5	0
	Hexachlorobenzene	µg/kg	50 : 500 (Interlab)		<50	<50	0
	Hexachlorobenzene	µg/kg	1000 : 500 (Interlab)		<1000	<1000	0
	Pentachlorobenzene	mg/kg	0.5		<0.5	<0.5	0
Explosives	1,3,5-Trinitrobenzene	mg/kg	0.5		<0.5	<0.5	0
	2,4-Dinitrotoluene	mg/kg	1		<1	<1	0
	2,6-dinitrotoluene	mg/kg	1		<1	<1	0
	Nitrobenzene	mg/kg	0.5 : 1 (Interlab)		<0.5	<0.5	0
Phthalates	Bis(2-ethylhexyl) phthalate	mg/kg	5 : 1 (Interlab)		<5	<5	0
	Butyl benzyl phthalate	mg/kg	0.5 : 1 (Interlab)		<0.5	<0.5	0
	Diethylphthalate	mg/kg	0.5 : 1 (Interlab)		<0.5	<0.5	0
	Dimethyl phthalate	mg/kg	0.5 : 1 (Interlab)		<0.5	<0.5	0

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE·

			SDG	ALSE-Sydney 19-Dec-18	ALSE-Sydney 19-Dec-18	
			Field ID	MW04@3.00	DUP4	**RPD**
			Sampled Date/Time	19-12-18 15:00	19-12-18 15:00	
	Di-n-butyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Di-n-octyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
Amino Aliphatics	N-nitrosodiethylamine	mg/kg	0.5	<0.5	<0.5	0
	N-nitrosodi-n-butylamine	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	N-nitrosodi-n-propylamine	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	N-Nitrosomethylethylamine	mg/kg	0.5	<0.5	<0.5	0
Amino Aromatics	1-naphthylamine	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	N-Nitrosodiphenyl & Diphenylamine	mg/kg	1	<1	<1	0
Anilines	2-nitroaniline	mg/kg	1	<1	<1	0
	3-nitroaniline	mg/kg	1	<1	<1	0
	4-chloroaniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	4-nitroaniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	2-methyl-5-nitroaniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Aniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
Nitroaromatics	2-Picoline	mg/kg	0.5	<0.5	<0.5	0
	4-aminobiphenyl	mg/kg	0.5	<0.5	<0.5	0
	Pentachloronitrobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
Solvents	Methyl Ethyl Ketone	mg/kg	5	<5	<5	0
	2-hexanone (MBK)	mg/kg	5	<5	<5	0
	4-Methyl-2-pentanone	mg/kg	5	<5	<5	0
	Carbon disulfide	mg/kg	0.5	<0.5	<0.5	0
	Isophorone	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Vinyl acetate	mg/kg	5	<5	<5	0

*RPDs have only been considered where a concentration is greater than 1 times the EQL.
**High RPDs are in bold (Acceptable RPDs for each EQL multiplier range are: 80 (1-10 x EQL); 50 (10-30 x
***Interlab Duplicates are matched on a per compound basis as methods vary between laboratories. Any ɒratory

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE·

SDG	ALSE-Sydney 19-Dec-18	ALSE-Sydney 19-Dec-18	
Field ID	MW03@1.00	DUP3	RPD
Sampled Date/Time	19-12-18 15:00	19-12-18 15:00	

Chem_Group	ChemName	Units	EQL			
PAH/Phenols	Acetophenone	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
SVOCs	2-(acetylamino) fluorene	mg/kg	0.5	<0.5	<0.5	0
	3,3-Dichlorobenzidine	mg/kg	0.5	<0.5	<0.5	0
	4-(dimethylamino) azobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	4-bromophenyl phenyl ether	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	4-chlorophenyl phenyl ether	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	4-Nitroquinoline-N-oxide	mg/kg	0.5	<0.5	<0.5	0
	Azobenzene	mg/kg	1	<1	<1	0
	Bis(2-chloroethoxy) methane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Bis(2-chloroethyl)ether	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Dibenzofuran	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Hexachloropropene	mg/kg	0.5	<0.5	<0.5	0
	Methapyrilene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	N-nitrosomorpholine	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	N-nitrosopiperidine	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	N-nitrosopyrrolidine	mg/kg	1	<1	<1	0
	Phenacetin	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
Asbestos	Asbestos fibres	-	0.1	0.0E0		
Inorganics	Moisture Content	%	1	7.7	7.5	3
Metals	Arsenic	mg/kg	5 : 4 (Interlab)	<5	<5	0
	Cadmium	mg/kg	1 : 0.4 (Interlab)	<1	<1	0
	Chromium (III+VI)	mg/kg	2 : 1 (Interlab)	**<2**	**5**	**86**
	Copper	mg/kg	5 : 1 (Interlab)	<5	10	67
	Lead	mg/kg	5 : 1 (Interlab)	**<5**	**113**	**183**
	Mercury	mg/kg	0.1	<0.1	<0.1	0
	Nickel	mg/kg	2 : 1 (Interlab)	<2	<2	0
	Zinc	mg/kg	5 : 1 (Interlab)	**<5**	**54**	**166**
TPH	C6-C9	mg/kg	10 : 25 (Interlab)	<10	<10	0
	C10-C14	mg/kg	50	<50	<50	0
	C15-C28	mg/kg	100	<100	<100	0
	C29-C36	mg/kg	100	<100	<100	0
	C10-C36 (Sum of total)	mg/kg	50	<50	<50	0
TRH	C6-C10	mg/kg	10 : 25 (Interlab)	<10	<10	0
	>C6-C10 less BTEX (F1)	mg/kg	10 : 25 (Interlab)	<10	<10	0
	C10-C16	mg/kg	50	<50	<50	0
	>C10-C16 less Naphthalene (F2)	mg/kg	50	<50	<50	0
	C16-C34	mg/kg	100	<100	<100	0
	C34-C40	mg/kg	100	<100	<100	0
	>C10 - C40 (Sum of total)	mg/kg	50	<50	<50	0
BTEX	Benzene	mg/kg	0.2	<0.2	<0.2	0
	Benzene	mg/kg	0.2	<0.2	<0.2	0
	Toluene	mg/kg	0.5	<0.5	<0.5	0
	Toluene	mg/kg	0.5	<0.5	<0.5	0
	Ethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Ethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Xylene (m & p)	mg/kg	0.5 : 2 (Interlab)	<0.5	<0.5	0
	Xylene (m & p)	mg/kg	0.5 : 2 (Interlab)	<0.5	<0.5	0
	Xylene (o)	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Xylene (o)	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Xylene Total	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Total BTEX	mg/kg	0.2	<0.2	<0.2	0
MAH	1,2,4-trimethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,3,5-trimethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Isopropylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	n-butylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	n-propylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	p-isopropyltoluene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	sec-butylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Styrene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	tert-butylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
PAH	2-chloronaphthalene	mg/kg	0.5	<0.5	<0.5	0
	2-methylnaphthalene	mg/kg	0.5	<0.5	<0.5	0
	3-methylcholanthrene	mg/kg	0.5	<0.5	<0.5	0
	7,12-dimethylbenz(a)anthracene	mg/kg	0.5	<0.5	<0.5	0
	Acenaphthene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Acenaphthylene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Anthracene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Benz(a)anthracene	mg/kg	0.5 : 0.1 (Interlab)	**1.2**	**<0.5**	**82**
	Benzo(a) pyrene	mg/kg	0.5 : 0.05 (Interlab)	**1.2**	**<0.5**	**82**
	Benzo(a)pyrene TEQ calc (Zero)	mg/kg	0.5	**1.5**	**<0.5**	**100**
	Benzo(a)pyrene TEQ calc (Half)	mg/kg	0.5	**1.8**	**0.6**	**100**
	Benzo(a)pyrene TEQ (LOR)	mg/kg	0.5	2.1	1.2	55
	Benzo(g,h,i)perylene	mg/kg	0.5 : 0.1 (Interlab)	0.6	<0.5	18

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE·

	SDG			ALSE-Sydney 19-Dec-18	ALSE-Sydney 19-Dec-18	
	Field ID			MW03@1.00	DUP3	**RPD**
	Sampled Date/Time			19-12-18 15:00	19-12-18 15:00	
	Benzo(b+j+k)fluoranthene	mg/kg	1 : 0.2 (Interlab)	2	<1	67
	Chrysene	mg/kg	0.5 : 0.1 (Interlab)	1	<0.5	67
	Dibenz(a,h)anthracene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Fluoranthene	mg/kg	0.5 : 0.1 (Interlab)	**2.4**	**<0.5**	**131**
	Fluorene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Indeno(1,2,3-c,d)pyrene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Naphthalene	mg/kg	1 : 0.5 (Interlab)	<1	<1	0
	Naphthalene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Phenanthrene	mg/kg	0.5 : 0.1 (Interlab)	**1.8**	**<0.5**	**113**
	Pyrene	mg/kg	0.5 : 0.1 (Interlab)	**2.1**	**<0.5**	**123**
	PAHs (Sum of total)	mg/kg	0.5	**12.3**	**<0.5**	**184**
Phenols	2,4,5-trichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2,4,6-trichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2,4-dichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2,4-dimethylphenol	mg/kg	0.5	<0.5	<0.5	0
	2,6-dichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2-chlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2-nitrophenol	mg/kg	0.5	<0.5	<0.5	0
	2-methylphenol	mg/kg	0.5	<0.5	<0.5	0
	3&4-Methylphenol (m&p-cresol)	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	4-chloro-3-methylphenol	mg/kg	0.5 : 5 (Interlab)	<0.5	<0.5	0
	Pentachlorophenol	mg/kg	1 : 5 (Interlab)	<1	<1	0
	Phenol	mg/kg	0.5	<0.5	<0.5	0
PCBs	PCBs (Sum of total)	mg/kg	0.1	<0.1	<0.1	0
Chlorinated Hydrocarbons	1,1,2,2-tetrachloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,1,1,2-tetrachloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,1,2-trichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,1,1-trichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,1-dichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,1-dichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,1-dichloropropene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2,3-trichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2-dibromo-3-chloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2-dichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2-dichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,3-dichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	2,2-dichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Bromodichloromethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Bromoform	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Carbon tetrachloride	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Chlorodibromomethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Chloroethane	mg/kg	5 : 1 (Interlab)	<5	<5	0
	Chloroform	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Chloromethane	mg/kg	5 : 1 (Interlab)	<5	<5	0
	cis-1,2-dichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	cis-1,3-dichloropropene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Dibromomethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Hexachlorocyclopentadiene	mg/kg	2.5 : 2 (Interlab)	<2.5	<2.5	0
	Hexachloroethane	mg/kg	0.5	<0.5	<0.5	0
	Hexachlorobutadiene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Trichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Tetrachloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	trans-1,2-dichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	trans-1,3-dichloropropene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Vinyl chloride	mg/kg	5 : 1 (Interlab)	<5	<5	0
Organochlorine Pesticides	a-BHC	µg/kg	500 : 100 (Interlab)	<500	<500	0
	a-BHC	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Aldrin	µg/kg	500 : 100 (Interlab)	<500	<500	0
	Aldrin	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Dieldrin	µg/kg	500 : 100 (Interlab)	<500	<500	0
	Dieldrin	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Aldrin + Dieldrin	mg/kg	0.05	<0.05	<0.05	0
	b-BHC	µg/kg	500 : 100 (Interlab)	<500	<500	0
	b-BHC	µg/kg	50 : 500 (Interlab)	<50	<50	0
	chlordane	µg/kg	50	<50	<50	0
	Chlordane (cis)	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Chlordane (trans)	µg/kg	50 : 500 (Interlab)	<50	<50	0
	d-BHC	µg/kg	500 : 100 (Interlab)	<500	<500	0
	d-BHC	µg/kg	50 : 500 (Interlab)	<50	<50	0
	DDD	µg/kg	500 : 100 (Interlab)	<500	<500	0
	DDD	µg/kg	50 : 500 (Interlab)	<50	<50	0
	4,4-DDE	µg/kg	500 : 100 (Interlab)	<500	<500	0
	4,4-DDE	µg/kg	50 : 500 (Interlab)	<50	<50	0
	DDT	µg/kg	200 : 500 (Interlab)	<200	<200	0
	DDT	µg/kg	1000 : 500 (Interlab)	<1000	<1000	0
	DDT+DDE+DDD	µg/kg	50 : 100 (Interlab)	<50	<50	0
	Endosulfan	µg/kg	50	<50	<50	0
	Endrin ketone	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Endosulfan I	µg/kg	500 : 100 (Interlab)	<500	<500	0

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE

				SDG	ALSE-Sydney 19-Dec-18	ALSE-Sydney 19-Dec-18	
				Field ID	MW03@1.00	DUP3	RPD
				Sampled Date/Time	19-12-18 15:00	19-12-18 15:00	
	Endosulfan I	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Endosulfan II	µg/kg	500 : 100 (Interlab)	<500	<500	0
	Endosulfan II	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Endosulfan sulphate	µg/kg	500 : 100 (Interlab)	<500	<500	0
	Endosulfan sulphate	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Endrin	µg/kg	500 : 100 (Interlab)	<500	<500	0
	Endrin	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Endrin aldehyde	µg/kg	50 : 500 (Interlab)	<50	<50	0
	g-BHC (Lindane)	µg/kg	500 : 100 (Interlab)	<500	<500	0
	g-BHC (Lindane)	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Heptachlor	µg/kg	500 : 100 (Interlab)	<500	<500	0
	Heptachlor	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Heptachlor epoxide	µg/kg	500 : 100 (Interlab)	<500	<500	0
	Heptachlor epoxide	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Methoxychlor	µg/kg	200 : 1000 (Interlab)	<200	<200	0
Organophosphorous Pesticides	Azinophos methyl	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Bromophos-ethyl	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Carbophenothion	mg/kg	0.05	<0.05	<0.05	0
	Chlorfenvinphos	mg/kg	0.5	<0.5	<0.5	0
	Chlorfenvinphos	mg/kg	0.05	<0.05	<0.05	0
	Chlorpyrifos	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Chlorpyrifos	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Chlorpyrifos-methyl	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Chlorpyrifos-methyl	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Demeton-S-methyl	mg/kg	0.05	<0.05	<0.05	0
	Diazinon	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Diazinon	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Dichlorvos	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Dichlorvos	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Dimethoate	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Dimethoate	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Ethion	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Ethion	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Fenamiphos	mg/kg	0.05	<0.05	<0.05	0
	Fenthion	mg/kg	0.5	<0.5	<0.5	0
	Fenthion	mg/kg	0.05	<0.05	<0.05	0
	Malathion	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Malathion	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Methyl parathion	mg/kg	0.2	<0.2	<0.2	0
	Monocrotophos	mg/kg	0.2	<0.2	<0.2	0
	Parathion	mg/kg	0.2 : 0.1 (Interlab)	<0.2	<0.2	0
	Pirimphos-ethyl	mg/kg	0.5	<0.5	<0.5	0
	Pirimphos-ethyl	mg/kg	0.05	<0.05	<0.05	0
	Prothiofos	mg/kg	0.5	<0.5	<0.5	0
	Prothiofos	mg/kg	0.05	<0.05	<0.05	0
Pesticides	Chlorobenzilate	mg/kg	0.5	<0.5	<0.5	0
	Carbazole	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
Herbicides	Pronamide	mg/kg	0.5	<0.5	<0.5	0
Halogenated Hydrocarbons	1,2-dibromoethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	cis-1,4-Dichloro-2-butene	mg/kg	0.5	<0.5	<0.5	0
	trans-1,4-Dichloro-2-butene	mg/kg	0.5	<0.5	<0.5	0
	Pentachloroethane	mg/kg	0.5	<0.5	<0.5	0
	Bromomethane	mg/kg	5 : 1 (Interlab)	<5	<5	0
	Dichlorodifluoromethane	mg/kg	5 : 1 (Interlab)	<5	<5	0
	Iodomethane	mg/kg	0.5	<0.5	<0.5	0
	Trichlorofluoromethane	mg/kg	5 : 1 (Interlab)	<5	<5	0
Halogenated Benzenes	1,2,3-trichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2,4-trichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2-dichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,3-dichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,4-dichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	2-chlorotoluene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	4-chlorotoluene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Bromobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Chlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Hexachlorobenzene	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Hexachlorobenzene	µg/kg	1000 : 500 (Interlab)	<1000	<1000	0
	Pentachlorobenzene	mg/kg	0.5	<0.5	<0.5	0
Explosives	1,3,5-Trinitrobenzene	mg/kg	0.5	<0.5	<0.5	0
	2,4-Dinitrotoluene	mg/kg	1	<1	<1	0
	2,6-dinitrotoluene	mg/kg	1	<1	<1	0
	Nitrobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
Phthalates	Bis(2-ethylhexyl) phthalate	mg/kg	5 : 1 (Interlab)	<5	<5	0
	Butyl benzyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Diethylphthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Dimethyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE

				SDG	ALSE-Sydney 19-Dec-18	ALSE-Sydney 19-Dec-18	
				Field ID	MW03@1.00	DUP3	**RPD**
				Sampled Date/Time	19-12-18 15:00	19-12-18 15:00	
	Di-n-butyl phthalate	mg/kg	0.5 : 1 (Interlab)		<0.5	<0.5	0
	Di-n-octyl phthalate	mg/kg	0.5 : 1 (Interlab)		<0.5	<0.5	0
Amino Aliphatics	N-nitrosodiethylamine	mg/kg	0.5		<0.5	<0.5	0
	N-nitrosodi-n-butylamine	mg/kg	0.5 : 1 (Interlab)		<0.5	<0.5	0
	N-nitrosodi-n-propylamine	mg/kg	0.5 : 1 (Interlab)		<0.5	<0.5	0
	N-Nitrosomethylethylamine	mg/kg	0.5		<0.5	<0.5	0
Amino Aromatics	1-naphthylamine	mg/kg	0.5 : 1 (Interlab)		<0.5	<0.5	0
	N-Nitrosodiphenyl & Diphenylamine	mg/kg	1		<1	<1	0
Anilines	2-nitroaniline	mg/kg	1		<1	<1	0
	3-nitroaniline	mg/kg	1		<1	<1	0
	4-chloroaniline	mg/kg	0.5 : 1 (Interlab)		<0.5	<0.5	0
	4-nitroaniline	mg/kg	0.5 : 1 (Interlab)		<0.5	<0.5	0
	2-methyl-5-nitroaniline	mg/kg	0.5 : 1 (Interlab)		<0.5	<0.5	0
	Aniline	mg/kg	0.5 : 1 (Interlab)		<0.5	<0.5	0
Nitroaromatics	2-Picoline	mg/kg	0.5		<0.5	<0.5	0
	4-aminobiphenyl	mg/kg	0.5		<0.5	<0.5	0
	Pentachloronitrobenzene	mg/kg	0.5 : 1 (Interlab)		<0.5	<0.5	0
Solvents	Methyl Ethyl Ketone	mg/kg	5		<5	<5	0
	2-hexanone (MBK)	mg/kg	5		<5	<5	0
	4-Methyl-2-pentanone	mg/kg	5		<5	<5	0
	Carbon disulfide	mg/kg	0.5		<0.5	<0.5	0
	Isophorone	mg/kg	0.5 : 1 (Interlab)		<0.5	<0.5	0
	Vinyl acetate	mg/kg	5		<5	<5	0

*RPDs have only been considered where a concentration is greater than 1 times the EQL.
**High RPDs are in bold (Acceptable RPDs for each EQL multiplier range are: 80 (1-10 x EQL); 50 (10-30 x
***Interlab Duplicates are matched on a per compound basis as methods vary between laboratories. Any n

10026439
Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE

SDG	ALSE-Sydney 13-Feb-19	ALSE-Sydney 13-Feb-19	
Field ID	BH30@2.7	DUP@2.7	RPD
Sampled Date/Time	11-02-19	11-02-19	

Chem_Group	ChemName	Units	EQL			
PAH/Phenols	Acetophenone	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
SVOCs	2-(acetylamino) fluorene	mg/kg	0.5	<0.5	<0.5	0
	3,3-Dichlorobenzidine	mg/kg	0.5	<0.5	<0.5	0
	4-(dimethylamino) azobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	4-bromophenyl phenyl ether	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	4-chlorophenyl phenyl ether	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	4-Nitroquinoline-N-oxide	mg/kg	0.5	<0.5	<0.5	0
	Azobenzene	mg/kg	1	<1	<1	0
	Bis(2-chloroethoxy) methane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Bis(2-chloroethyl)ether	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Dibenzofuran	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Hexachloropropene	mg/kg	0.5	<0.5	<0.5	0
	Methapyrilene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	N-nitrosomorpholine	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	N-nitrosopiperidine	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	N-nitrosopyrrolidine	mg/kg	1	<1	<1	0
	Phenacetin	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
Asbestos	Asbestos fibres	-	0.1			
Inorganics	Moisture Content	%	1	**17.5**	**8.6**	**68**
Metals	Arsenic	mg/kg	5 : 4 (Interlab)	<5	<5	0
	Cadmium	mg/kg	1 : 0.4 (Interlab)	<1	<1	0
	Chromium (III+VI)	mg/kg	2 : 1 (Interlab)	<2	<2	0
	Copper	mg/kg	5 : 1 (Interlab)	11	<5	75
	Lead	mg/kg	5 : 1 (Interlab)	**142**	**17**	**157**
	Mercury	mg/kg	0.1	<0.1	<0.1	0
	Nickel	mg/kg	2 : 1 (Interlab)	**17**	**<2**	**158**
	Zinc	mg/kg	5 : 1 (Interlab)	**769**	**39**	**181**
TPH	C6-C9	mg/kg	10 : 25 (Interlab)	<10	<10	0
	C10-C14	mg/kg	50	<50	<50	0
	C15-C28	mg/kg	100	<100	140	33
	C29-C36	mg/kg	100	<100	<100	0
	C10-C36 (Sum of total)	mg/kg	50	**<50**	**140**	**95**
TRH	C6-C10	mg/kg	10 : 25 (Interlab)	<10	<10	0
	>C6-C10 less BTEX (F1)	mg/kg	10 : 25 (Interlab)	<10	<10	0
	C10-C16	mg/kg	50	<50	70	33
	>C10-C16 less Naphthalene (F2)	mg/kg	50	<50	70	33
	C16-C34	mg/kg	100	<100	<100	0
	C34-C40	mg/kg	100	<100	<100	0
	>C10 - C40 (Sum of total)	mg/kg	50	<50	70	33
BTEX	Benzene	mg/kg	0.2			
	Benzene	mg/kg	0.2	<0.2	<0.2	0
	Toluene	mg/kg	0.5			
	Toluene	mg/kg	0.5	<0.5	<0.5	0
	Ethylbenzene	mg/kg	0.5 : 1 (Interlab)			
	Ethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Xylene (m & p)	mg/kg	0.5 : 2 (Interlab)			
	Xylene (m & p)	mg/kg	0.5 : 2 (Interlab)	<0.5	<0.5	0
	Xylene (o)	mg/kg	0.5 : 1 (Interlab)			
	Xylene (o)	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Xylene Total	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Total BTEX	mg/kg	0.2	<0.2	<0.2	0
MAH	1,2,4-trimethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,3,5-trimethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Isopropylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	n-butylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	n-propylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	p-isopropyltoluene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	sec-butylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Styrene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	tert-butylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
PAH	2-chloronaphthalene	mg/kg	0.5	<0.5	<0.5	0
	2-methylnaphthalene	mg/kg	0.5	<0.5	<0.5	0
	3-methylcholanthrene	mg/kg	0.5	<0.5	<0.5	0
	7,12-dimethylbenz(a)anthracene	mg/kg	0.5	<0.5	<0.5	0
	Acenaphthene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Acenaphthylene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Anthracene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Benz(a)anthracene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Benzo(a) pyrene	mg/kg	0.5 : 0.05 (Interlab)	<0.5	<0.5	0
	Benzo(a)pyrene TEQ calc (Zero)	mg/kg	0.5	<0.5	<0.5	0
	Benzo(a)pyrene TEQ calc (Half)	mg/kg	0.5	0.6	0.6	0
	Benzo(a)pyrene TEQ (LOR)	mg/kg	0.5	1.2	1.2	0
	Benzo(g,h,i)perylene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE

SDG	ALSE-Sydney 13-Feb-19	ALSE-Sydney 13-Feb-19	
Field ID	BH30@2.7	DUP@2.7	RPD
Sampled Date/Time	11-02-19	11-02-19	

	Benzo(b+j+k)fluoranthene	mg/kg	1 : 0.2 (Interlab)	<1	<1	0
	Chrysene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Dibenz(a,h)anthracene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Fluoranthene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Fluorene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Indeno(1,2,3-c,d)pyrene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Naphthalene	mg/kg	1 : 0.5 (Interlab)	<1	<1	0
	Naphthalene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Phenanthrene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Pyrene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	PAHs (Sum of total)	mg/kg	0.5	<0.5	<0.5	0
Phenols	2,4,5-trichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2,4,6-trichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2,4-dichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2,4-dimethylphenol	mg/kg	0.5	<0.5	<0.5	0
	2,6-dichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2-chlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2-nitrophenol	mg/kg	0.5	<0.5	<0.5	0
	2-methylphenol	mg/kg	0.5	<0.5	<0.5	0
	3&4-Methylphenol (m&p-cresol)	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	4-chloro-3-methylphenol	mg/kg	0.5 : 5 (Interlab)	<0.5	<0.5	0
	Pentachlorophenol	mg/kg	1 : 5 (Interlab)	<1	<1	0
	Phenol	mg/kg	0.5	<0.5	<0.5	0
PCBs	PCBs (Sum of total)	mg/kg	0.1	<0.1	<0.1	0
Chlorinated Hydrocarbons	1,1,2,2-tetrachloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,1,1,2-tetrachloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,1,2-trichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,1,1-trichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,1-dichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,1-dichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,1-dichloropropene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2,3-trichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2-dibromo-3-chloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2-dichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2-dichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,3-dichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	2,2-dichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Bromodichloromethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Bromoform	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Carbon tetrachloride	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Chlorodibromomethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Chloroethane	mg/kg	5 : 1 (Interlab)	<5	<5	0
	Chloroform	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Chloromethane	mg/kg	5 : 1 (Interlab)	<5	<5	0
	cis-1,2-dichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	cis-1,3-dichloropropene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Dibromomethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Hexachlorocyclopentadiene	mg/kg	2.5 : 2 (Interlab)	<2.5	<2.5	0
	Hexachloroethane	mg/kg	0.5	<0.5	<0.5	0
	Hexachlorobutadiene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Trichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Tetrachloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	trans-1,2-dichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	trans-1,3-dichloropropene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Vinyl chloride	mg/kg	5 : 1 (Interlab)	<5	<5	0
Organochlorine Pesticides	a-BHC	µg/kg	500 : 100 (Interlab)			
	a-BHC	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Aldrin	µg/kg	500 : 100 (Interlab)			
	Aldrin	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Dieldrin	µg/kg	500 : 100 (Interlab)			
	Dieldrin	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Aldrin + Dieldrin	mg/kg	0.05	<0.05	<0.05	0
	b-BHC	µg/kg	500 : 100 (Interlab)			
	b-BHC	µg/kg	50 : 500 (Interlab)	<50	<50	0
	chlordane	µg/kg	50	<50	<50	0
	Chlordane (cis)	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Chlordane (trans)	µg/kg	50 : 500 (Interlab)	<50	<50	0
	d-BHC	µg/kg	500 : 100 (Interlab)			
	d-BHC	µg/kg	50 : 500 (Interlab)	<50	<50	0
	DDD	µg/kg	500 : 100 (Interlab)			
	DDD	µg/kg	50 : 500 (Interlab)	<50	<50	0
	4,4-DDE	µg/kg	500 : 100 (Interlab)			
	4,4-DDE	µg/kg	50 : 500 (Interlab)	<50	<50	0
	DDT	µg/kg	200 : 500 (Interlab)	<200	<200	0
	DDT	µg/kg	1000 : 500 (Interlab)			
	DDT+DDE+DDD	µg/kg	50 : 100 (Interlab)	<50	<50	0
	Endosulfan	µg/kg	50	<50	<50	0
	Endrin ketone	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Endosulfan I	µg/kg	500 : 100 (Interlab)			

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE

			SDG	ALSE-Sydney 13-Feb-19	ALSE-Sydney 13-Feb-19	
			Field ID	BH30@2.7	DUP@2.7	**RPD**
			Sampled Date/Time	11-02-19	11-02-19	
	Endosulfan I	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Endosulfan II	µg/kg	500 : 100 (Interlab)			
	Endosulfan II	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Endosulfan sulphate	µg/kg	500 : 100 (Interlab)			
	Endosulfan sulphate	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Endrin	µg/kg	500 : 100 (Interlab)			
	Endrin	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Endrin aldehyde	µg/kg	50 : 500 (Interlab)	<50	<50	0
	g-BHC (Lindane)	µg/kg	500 : 100 (Interlab)			
	g-BHC (Lindane)	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Heptachlor	µg/kg	500 : 100 (Interlab)			
	Heptachlor	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Heptachlor epoxide	µg/kg	500 : 100 (Interlab)			
	Heptachlor epoxide	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Methoxychlor	µg/kg	200 : 1000 (Interlab)	<200	<200	0
Organophosphorous Pesticides	Azinophos methyl	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Bromophos-ethyl	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Carbophenothion	mg/kg	0.05	<0.05	<0.05	0
	Chlorfenvinphos	mg/kg	0.5			
	Chlorfenvinphos	mg/kg	0.05	<0.05	<0.05	0
	Chlorpyrifos	mg/kg	0.5 : 0.1 (Interlab)			
	Chlorpyrifos	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Chlorpyrifos-methyl	mg/kg	0.5 : 0.1 (Interlab)			
	Chlorpyrifos-methyl	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Demeton-S-methyl	mg/kg	0.05	<0.05	<0.05	0
	Diazinon	mg/kg	0.5 : 0.1 (Interlab)			
	Diazinon	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Dichlorvos	mg/kg	0.5 : 0.1 (Interlab)			
	Dichlorvos	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Dimethoate	mg/kg	0.5 : 0.1 (Interlab)			
	Dimethoate	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Ethion	mg/kg	0.5 : 0.1 (Interlab)			
	Ethion	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Fenamiphos	mg/kg	0.05	<0.05	<0.05	0
	Fenthion	mg/kg	0.5			
	Fenthion	mg/kg	0.05	<0.05	<0.05	0
	Malathion	mg/kg	0.5 : 0.1 (Interlab)			
	Malathion	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Methyl parathion	mg/kg	0.2	<0.2	<0.2	0
	Monocrotophos	mg/kg	0.2	<0.2	<0.2	0
	Parathion	mg/kg	0.2 : 0.1 (Interlab)	<0.2	<0.2	0
	Pirimphos-ethyl	mg/kg	0.5			
	Pirimphos-ethyl	mg/kg	0.05	<0.05	<0.05	0
	Prothiofos	mg/kg	0.5			
	Prothiofos	mg/kg	0.05	<0.05	<0.05	0
Pesticides	Chlorobenzilate	mg/kg	0.5	<0.5	<0.5	0
	Carbazole	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
Herbicides	Pronamide	mg/kg	0.5	<0.5	<0.5	0
Halogenated Hydrocarbons	1,2-dibromoethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	cis-1,4-Dichloro-2-butene	mg/kg	0.5	<0.5	<0.5	0
	trans-1,4-Dichloro-2-butene	mg/kg	0.5	<0.5	<0.5	0
	Pentachloroethane	mg/kg	0.5	<0.5	<0.5	0
	Bromomethane	mg/kg	5 : 1 (Interlab)	<5	<5	0
	Dichlorodifluoromethane	mg/kg	5 : 1 (Interlab)	<5	<5	0
	Iodomethane	mg/kg	0.5	<0.5	<0.5	0
	Trichlorofluoromethane	mg/kg	5 : 1 (Interlab)	<5	<5	0
Halogenated Benzenes	1,2,3-trichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2,4-trichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2-dichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,3-dichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,4-dichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	2-chlorotoluene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	4-chlorotoluene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Bromobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Chlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Hexachlorobenzene	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Hexachlorobenzene	µg/kg	1000 : 500 (Interlab)	<1000	<1000	0
	Pentachlorobenzene	mg/kg	0.5	<0.5	<0.5	0
Explosives	1,3,5-Trinitrobenzene	mg/kg	0.5	<0.5	<0.5	0
	2,4-Dinitrotoluene	mg/kg	1	<1	<1	0
	2,6-dinitrotoluene	mg/kg	1	<1	<1	0
	Nitrobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
Phthalates	Bis(2-ethylhexyl) phthalate	mg/kg	5 : 1 (Interlab)	<5	<5	0
	Butyl benzyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Diethylphthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Dimethyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE

			SDG	ALSE-Sydney 13-Feb-19	ALSE-Sydney 13-Feb-19	
			Field ID	BH30@2.7	DUP@2.7	**RPD**
			Sampled Date/Time	11-02-19	11-02-19	
	Di-n-butyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Di-n-octyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
Amino Aliphatics	N-nitrosodiethylamine	mg/kg	0.5	<0.5	<0.5	0
	N-nitrosodi-n-butylamine	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	N-nitrosodi-n-propylamine	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	N-Nitrosomethylethylamine	mg/kg	0.5	<0.5	<0.5	0
Amino Aromatics	1-naphthylamine	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	N-Nitrosodiphenyl & Diphenylamine	mg/kg	1	<1	<1	0
Anilines	2-nitroaniline	mg/kg	1	<1	<1	0
	3-nitroaniline	mg/kg	1	<1	<1	0
	4-chloroaniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	4-nitroaniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	2-methyl-5-nitroaniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Aniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
Nitroaromatics	2-Picoline	mg/kg	0.5	<0.5	<0.5	0
	4-aminobiphenyl	mg/kg	0.5	<0.5	<0.5	0
	Pentachloronitrobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
Solvents	Methyl Ethyl Ketone	mg/kg	5	<5	<5	0
	2-hexanone (MBK)	mg/kg	5	<5	<5	0
	4-Methyl-2-pentanone	mg/kg	5	<5	<5	0
	Carbon disulfide	mg/kg	0.5	<0.5	<0.5	0
	Isophorone	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Vinyl acetate	mg/kg	5	<5	<5	0

*RPDs have only been considered where a concentration is greater than 1 times the EQL.
**High RPDs are in bold (Acceptable RPDs for each EQL multiplier range are: 80 (1-10 x EQL); 50 (10-30 x
***Interlab Duplicates are matched on a per compound basis as methods vary between laboratories. Any n

10026439
Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE-

SDG	ALSE-Sydney 13-Feb-19	ALSE-Sydney 13-Feb-19	
Field ID	BH45@2.2	DUP2@2.2	RPD
Sampled Date/Time	11-02-19	11-02-19	

Chem_Group	ChemName	Units	EQL			
PAH/Phenols	Acetophenone	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
SVOCs	2-(acetylamino) fluorene	mg/kg	0.5	<0.5	<0.5	0
	3,3-Dichlorobenzidine	mg/kg	0.5	<0.5	<0.5	0
	4-(dimethylamino) azobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	4-bromophenyl phenyl ether	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	4-chlorophenyl phenyl ether	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	4-Nitroquinoline-N-oxide	mg/kg	0.5	<0.5	<0.5	0
	Azobenzene	mg/kg	1	<1	<1	0
	Bis(2-chloroethoxy) methane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Bis(2-chloroethyl)ether	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Dibenzofuran	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Hexachloropropene	mg/kg	0.5	<0.5	<0.5	0
	Methapyrilene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	N-nitrosomorpholine	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	N-nitrosopiperidine	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	N-nitrosopyrrolidine	mg/kg	1	<1	<1	0
	Phenacetin	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
Asbestos	Asbestos fibres	-	0.1			
Inorganics	Moisture Content	%	1	5.7	6.7	16
Metals	Arsenic	mg/kg	5 : 4 (Interlab)	<5	5	0
	Cadmium	mg/kg	1 : 0.4 (Interlab)	<1	<1	0
	Chromium (III+VI)	mg/kg	2 : 1 (Interlab)	<2	<2	0
	Copper	mg/kg	5 : 1 (Interlab)	<5	<5	0
	Lead	mg/kg	5 : 1 (Interlab)	<5	<5	0
	Mercury	mg/kg	0.1	<0.1	<0.1	0
	Nickel	mg/kg	2 : 1 (Interlab)	<2	<2	0
	Zinc	mg/kg	5 : 1 (Interlab)	<5	<5	0
TPH	C6-C9	mg/kg	10 : 25 (Interlab)	**<10**	**35**	**111**
	C10-C14	mg/kg	50	240	360	40
	C15-C28	mg/kg	100	720	940	27
	C29-C36	mg/kg	100	<100	<100	0
	C10-C36 (Sum of total)	mg/kg	50	960	1300	30
TRH	C6-C10	mg/kg	10 : 25 (Interlab)	**<10**	**82**	**157**
	>C6-C10 less BTEX (F1)	mg/kg	10 : 25 (Interlab)	**<10**	**81**	**156**
	C10-C16	mg/kg	50	450	620	32
	>C10-C16 less Naphthalene (F2)	mg/kg	50	450	620	32
	C16-C34	mg/kg	100	490	630	25
	C34-C40	mg/kg	100	<100	<100	0
	>C10 - C40 (Sum of total)	mg/kg	50	940	1250	28
BTEX	Benzene	mg/kg	0.2			
	Benzene	mg/kg	0.2	<0.2	<0.2	0
	Toluene	mg/kg	0.5			
	Toluene	mg/kg	0.5	<0.5	<0.5	0
	Ethylbenzene	mg/kg	0.5 : 1 (Interlab)			
	Ethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Xylene (m & p)	mg/kg	0.5 : 2 (Interlab)			
	Xylene (m & p)	mg/kg	0.5 : 2 (Interlab)	<0.5	1.1	75
	Xylene (o)	mg/kg	0.5 : 1 (Interlab)			
	Xylene (o)	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Xylene Total	mg/kg	0.5 : 1 (Interlab)	<0.5	1.1	75
	Total BTEX	mg/kg	0.2	**<0.2**	**1.1**	**138**
MAH	1,2,4-trimethylbenzene	mg/kg	0.5 : 1 (Interlab)	**<0.5**	**6.5**	**171**
	1,3,5-trimethylbenzene	mg/kg	0.5 : 1 (Interlab)	**<0.5**	**2**	**120**
	Isopropylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	n-butylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	1.1	75
	n-propylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	1	67
	p-isopropyltoluene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	sec-butylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	0.8	46
	Styrene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	tert-butylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
PAH	2-chloronaphthalene	mg/kg	0.5	<0.5	<0.5	0
	2-methylnaphthalene	mg/kg	0.5	0.5	0.8	46
	3-methylcholanthrene	mg/kg	0.5	<0.5	<0.5	0
	7,12-dimethylbenz(a)anthracene	mg/kg	0.5	<0.5	<0.5	0
	Acenaphthene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Acenaphthylene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Anthracene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Benz(a)anthracene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Benzo(a) pyrene	mg/kg	0.5 : 0.05 (Interlab)	<0.5	<0.5	0
	Benzo(a)pyrene TEQ calc (Zero)	mg/kg	0.5	<0.5	<0.5	0
	Benzo(a)pyrene TEQ calc (Half)	mg/kg	0.5	0.6	0.6	0
	Benzo(a)pyrene TEQ (LOR)	mg/kg	0.5	1.2	1.2	0
	Benzo(g,h,i)perylene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE

				SDG	ALSE-Sydney 13-Feb-19	ALSE-Sydney 13-Feb-19	
				Field ID	BH45@2.2	DUP2@2.2	RPD
				Sampled Date/Time	11-02-19	11-02-19	
	Benzo(b+j+k)fluoranthene	mg/kg	1 : 0.2 (Interlab)	<1	<1	0
	Chrysene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Dibenz(a,h)anthracene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Fluoranthene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Fluorene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Indeno(1,2,3-c,d)pyrene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Naphthalene	mg/kg	1 : 0.5 (Interlab)	<1	<1	0
	Naphthalene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Phenanthrene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Pyrene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	PAHs (Sum of total)	mg/kg	0.5	<0.5	<0.5	0
Phenols	2,4,5-trichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2,4,6-trichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2,4-dichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2,4-dimethylphenol	mg/kg	0.5	<0.5	<0.5	0
	2,6-dichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2-chlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2-nitrophenol	mg/kg	0.5	<0.5	<0.5	0
	2-methylphenol	mg/kg	0.5	<0.5	<0.5	0
	3&4-Methylphenol (m&p-cresol)	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	4-chloro-3-methylphenol	mg/kg	0.5 : 5 (Interlab)	<0.5	<0.5	0
	Pentachlorophenol	mg/kg	1 : 5 (Interlab)	<1	<1	0
	Phenol	mg/kg	0.5	<0.5	<0.5	0
PCBs	PCBs (Sum of total)	mg/kg	0.1	<0.1	<0.1	0
Chlorinated Hydrocarbons	1,1,2,2-tetrachloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,1,1,2-tetrachloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,1,2-trichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,1,1-trichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,1-dichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,1-dichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,1-dichloropropene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2,3-trichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2-dibromo-3-chloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2-dichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2-dichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,3-dichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	2,2-dichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Bromodichloromethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Bromoform	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Carbon tetrachloride	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Chlorodibromomethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Chloroethane	mg/kg	5 : 1 (Interlab)	<5	<5	0
	Chloroform	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Chloromethane	mg/kg	5 : 1 (Interlab)	<5	<5	0
	cis-1,2-dichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	cis-1,3-dichloropropene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Dibromomethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Hexachlorocyclopentadiene	mg/kg	2.5 : 2 (Interlab)	<2.5	<2.5	0
	Hexachloroethane	mg/kg	0.5	<0.5	<0.5	0
	Hexachlorobutadiene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Trichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Tetrachloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	trans-1,2-dichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	trans-1,3-dichloropropene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Vinyl chloride	mg/kg	5 : 1 (Interlab)	<5	<5	0
Organochlorine Pesticides	a-BHC	µg/kg	500 : 100 (Interlab)			
	a-BHC	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Aldrin	µg/kg	500 : 100 (Interlab)			
	Aldrin	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Dieldrin	µg/kg	500 : 100 (Interlab)			
	Dieldrin	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Aldrin + Dieldrin	mg/kg	0.05	<0.05	<0.05	0
	b-BHC	µg/kg	500 : 100 (Interlab)			
	b-BHC	µg/kg	50 : 500 (Interlab)	<50	<50	0
	chlordane	µg/kg	50	<50	<50	0
	Chlordane (cis)	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Chlordane (trans)	µg/kg	50 : 500 (Interlab)	<50	<50	0
	d-BHC	µg/kg	500 : 100 (Interlab)			
	d-BHC	µg/kg	50 : 500 (Interlab)	<50	<50	0
	DDD	µg/kg	500 : 100 (Interlab)			
	DDD	µg/kg	50 : 500 (Interlab)	<50	<50	0
	4,4-DDE	µg/kg	500 : 100 (Interlab)			
	4,4-DDE	µg/kg	50 : 500 (Interlab)	<50	<50	0
	DDT	µg/kg	200 : 500 (Interlab)	<200	<200	0
	DDT	µg/kg	1000 : 500 (Interlab)			
	DDT+DDE+DDD	µg/kg	50 : 100 (Interlab)	<50	<50	0
	Endosulfan	µg/kg	50	<50	<50	0
	Endrin ketone	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Endosulfan I	µg/kg	500 : 100 (Interlab)			

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE-

			SDG	ALSE-Sydney 13-Feb-19	ALSE-Sydney 13-Feb-19	
			Field ID	BH45@2.2	DUP2@2.2	**RPD**
			Sampled Date/Time	11-02-19	11-02-19	
	Endosulfan I	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Endosulfan II	µg/kg	500 : 100 (Interlab)			
	Endosulfan II	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Endosulfan sulphate	µg/kg	500 : 100 (Interlab)			
	Endosulfan sulphate	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Endrin	µg/kg	500 : 100 (Interlab)			
	Endrin	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Endrin aldehyde	µg/kg	50 : 500 (Interlab)	<50	<50	0
	g-BHC (Lindane)	µg/kg	500 : 100 (Interlab)			
	g-BHC (Lindane)	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Heptachlor	µg/kg	500 : 100 (Interlab)			
	Heptachlor	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Heptachlor epoxide	µg/kg	500 : 100 (Interlab)			
	Heptachlor epoxide	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Methoxychlor	µg/kg	200 : 1000 (Interlab)	<200	<200	0
Organophosphorous Pesticides	Azinophos methyl	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Bromophos-ethyl	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Carbophenothion	mg/kg	0.05	<0.05	<0.05	0
	Chlorfenvinphos	mg/kg	0.5			
	Chlorfenvinphos	mg/kg	0.05	<0.05	<0.05	0
	Chlorpyrifos	mg/kg	0.5 : 0.1 (Interlab)			
	Chlorpyrifos	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Chlorpyrifos-methyl	mg/kg	0.5 : 0.1 (Interlab)			
	Chlorpyrifos-methyl	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Demeton-S-methyl	mg/kg	0.05	<0.05	<0.05	0
	Diazinon	mg/kg	0.5 : 0.1 (Interlab)			
	Diazinon	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Dichlorvos	mg/kg	0.5 : 0.1 (Interlab)			
	Dichlorvos	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Dimethoate	mg/kg	0.5 : 0.1 (Interlab)			
	Dimethoate	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Ethion	mg/kg	0.5 : 0.1 (Interlab)			
	Ethion	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Fenamiphos	mg/kg	0.05	<0.05	<0.05	0
	Fenthion	mg/kg	0.5			
	Fenthion	mg/kg	0.05	<0.05	<0.05	0
	Malathion	mg/kg	0.5 : 0.1 (Interlab)			
	Malathion	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.05	0
	Methyl parathion	mg/kg	0.2	<0.2	<0.2	0
	Monocrotophos	mg/kg	0.2	<0.2	<0.2	0
	Parathion	mg/kg	0.2 : 0.1 (Interlab)	<0.2	<0.2	0
	Pirimphos-ethyl	mg/kg	0.5			
	Pirimphos-ethyl	mg/kg	0.05	<0.05	<0.05	0
	Prothiofos	mg/kg	0.5			
	Prothiofos	mg/kg	0.05	<0.05	<0.05	0
Pesticides	Chlorobenzilate	mg/kg	0.5	<0.5	<0.5	0
	Carbazole	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
Herbicides	Pronamide	mg/kg	0.5	<0.5	<0.5	0
Halogenated Hydrocarbons	1,2-dibromoethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	cis-1,4-Dichloro-2-butene	mg/kg	0.5	<0.5	<0.5	0
	trans-1,4-Dichloro-2-butene	mg/kg	0.5	<0.5	<0.5	0
	Pentachloroethane	mg/kg	0.5	<0.5	<0.5	0
	Bromomethane	mg/kg	5 : 1 (Interlab)	<5	<5	0
	Dichlorodifluoromethane	mg/kg	5 : 1 (Interlab)	<5	<5	0
	Iodomethane	mg/kg	0.5	<0.5	<0.5	0
	Trichlorofluoromethane	mg/kg	5 : 1 (Interlab)	<5	<5	0
Halogenated Benzenes	1,2,3-trichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2,4-trichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2-dichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,3-dichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,4-dichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	2-chlorotoluene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	4-chlorotoluene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Bromobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Chlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Hexachlorobenzene	µg/kg	50 : 500 (Interlab)	<50	<50	0
	Hexachlorobenzene	µg/kg	1000 : 500 (Interlab)	<1000	<1000	0
	Pentachlorobenzene	mg/kg	0.5	<0.5	<0.5	0
Explosives	1,3,5-Trinitrobenzene	mg/kg	0.5	<0.5	<0.5	0
	2,4-Dinitrotoluene	mg/kg	1	<1	<1	0
	2,6-dinitrotoluene	mg/kg	1	<1	<1	0
	Nitrobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
Phthalates	Bis(2-ethylhexyl) phthalate	mg/kg	5 : 1 (Interlab)	<5	<5	0
	Butyl benzyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Diethylphthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Dimethyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE

			SDG	ALSE-Sydney 13-Feb-19	ALSE-Sydney 13-Feb-19	
			Field ID	BH45@2.2	DUP2@2.2	**RPD**
			Sampled Date/Time	11-02-19	11-02-19	
	Di-n-butyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Di-n-octyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
Amino Aliphatics	N-nitrosodiethylamine	mg/kg	0.5	<0.5	<0.5	0
	N-nitrosodi-n-butylamine	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	N-nitrosodi-n-propylamine	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	N-Nitrosomethylethylamine	mg/kg	0.5	<0.5	<0.5	0
Amino Aromatics	1-naphthylamine	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	N-Nitrosodiphenyl & Diphenylamine	mg/kg	1	<1	<1	0
Anilines	2-nitroaniline	mg/kg	1	<1	<1	0
	3-nitroaniline	mg/kg	1	<1	<1	0
	4-chloroaniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	4-nitroaniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	2-methyl-5-nitroaniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Aniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
Nitroaromatics	2-Picoline	mg/kg	0.5	<0.5	<0.5	0
	4-aminobiphenyl	mg/kg	0.5	<0.5	<0.5	0
	Pentachloronitrobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
Solvents	Methyl Ethyl Ketone	mg/kg	5	<5	<5	0
	2-hexanone (MBK)	mg/kg	5	<5	<5	0
	4-Methyl-2-pentanone	mg/kg	5	<5	<5	0
	Carbon disulfide	mg/kg	0.5	<0.5	<0.5	0
	Isophorone	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Vinyl acetate	mg/kg	5	<5	<5	0

*RPDs have only been considered where a concentration is greater than 1 times the EQL.
**High RPDs are in bold (Acceptable RPDs for each EQL multiplier range are: 80 (1-10 x EQL); 50 (10-30 x
***Interlab Duplicates are matched on a per compound basis as methods vary between laboratories. Any n

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE

SDG	ALSE-Sydney 17-Dec-18	ENVIROLAB 2018-12-19T00:00:00	
Field ID	BH01@2.00	TRIP1	RPD
Sampled Date/Time	12-12-18 15:00	12-12-18 15:00	

Chem_Group	ChemName	Units	EQL			
PAH/Phenols	Acetophenone	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
SVOCs	2-(acetylamino) fluorene	mg/kg	0.5	<0.5	<0.5	0
	3,3-Dichlorobenzidine	mg/kg	0.5	<0.5		
	4-(dimethylamino) azobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	4-bromophenyl phenyl ether	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	4-chlorophenyl phenyl ether	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	4-Nitroquinoline-N-oxide	mg/kg	0.5	<0.5		
	Azobenzene	mg/kg	1	<1	<1	0
	Bis(2-chloroethoxy) methane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Bis(2-chloroethyl)ether	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Dibenzofuran	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Hexachloropropene	mg/kg	0.5	<0.5	<0.5	0
	Methapyrilene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	N-nitrosomorpholine	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	N-nitrosopiperidine	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	N-nitrosopyrrolidine	mg/kg	1	<1		
	Phenacetin	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
Asbestos	Asbestos fibres	-	0.1			
Inorganics	Moisture Content	%	1	31		
Metals	Arsenic	mg/kg	5 : 4 (Interlab)	10	12	18
	Cadmium	mg/kg	1 : 0.4 (Interlab)	<1	<0.4	0
	Chromium (III+VI)	mg/kg	2 : 1 (Interlab)	2	2	0
	Copper	mg/kg	5 : 1 (Interlab)	8	4	67
	Lead	mg/kg	5 : 1 (Interlab)	**46**	**25**	**59**
	Mercury	mg/kg	0.1	0.3	0.2	40
	Nickel	mg/kg	2 : 1 (Interlab)	<2	<1	0
	Zinc	mg/kg	5 : 1 (Interlab)	**40**	**19**	**71**
TPH	C6-C9	mg/kg	10 : 25 (Interlab)	<10	<25	0
	C10-C14	mg/kg	50	<50	<50	0
	C15-C28	mg/kg	100	<100	<100	0
	C29-C36	mg/kg	100	<100	<100	0
	C10-C36 (Sum of total)	mg/kg	50	<50		
TRH	C6-C10	mg/kg	10 : 25 (Interlab)	<10	<25	0
	>C6-C10 less BTEX (F1)	mg/kg	10 : 25 (Interlab)	<10	<25	0
	C10-C16	mg/kg	50	<50	<50	0
	>C10-C16 less Naphthalene (F2)	mg/kg	50	<50	<50	0
	C16-C34	mg/kg	100	<100	<100	0
	C34-C40	mg/kg	100	<100	<100	0
	>C10 - C40 (Sum of total)	mg/kg	50	<50	<50	0
BTEX	Benzene	mg/kg	0.2	<0.2	<0.2	0
	Benzene	mg/kg	0.2	<0.2	<0.2	0
	Toluene	mg/kg	0.5	<0.5	<0.5	0
	Toluene	mg/kg	0.5	<0.5	<0.5	0
	Ethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Ethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Xylene (m & p)	mg/kg	0.5 : 2 (Interlab)	<0.5	<2	0
	Xylene (m & p)	mg/kg	0.5 : 2 (Interlab)	<0.5	<2	0
	Xylene (o)	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Xylene (o)	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Xylene Total	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Total BTEX	mg/kg	0.2	<0.2		
MAH	1,2,4-trimethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,3,5-trimethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Isopropylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	n-butylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	n-propylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	p-isopropyltoluene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	sec-butylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Styrene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	tert-butylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
PAH	2-chloronaphthalene	mg/kg	0.5	<0.5	<0.5	0
	2-methylnaphthalene	mg/kg	0.5	<0.5	<0.5	0
	3-methylcholanthrene	mg/kg	0.5	<0.5	<0.5	0
	7,12-dimethylbenz(a)anthracene	mg/kg	0.5	<0.5	<0.5	0
	Acenaphthene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	Acenaphthylene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	Anthracene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	Benz(a)anthracene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	Benzo(a) pyrene	mg/kg	0.5 : 0.05 (Interlab)	<0.5	<0.05	0
	Benzo(a)pyrene TEQ calc (Zero)	mg/kg	0.5	<0.5	<0.5	0
	Benzo(a)pyrene TEQ calc (Half)	mg/kg	0.5	0.6	<0.5	18
	Benzo(a)pyrene TEQ (LOR)	mg/kg	0.5	**1.2**	**<0.5**	**82**
	Benzo(g,h,i)perylene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE

SDG	ALSE-Sydney 17-Dec-18	ENVIROLAB 2018-12-19T00:00:00	
Field ID	BH01@2.00	TRIP1	RPD
Sampled Date/Time	12-12-18 15:00	12-12-18 15:00	

	Benzo(b+j+k)fluoranthene	mg/kg	1 : 0.2 (Interlab)	<1	<0.2	0
	Chrysene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	Dibenz(a,h)anthracene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	Fluoranthene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	Fluorene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	Indeno(1,2,3-c,d)pyrene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	Naphthalene	mg/kg	1 : 0.5 (Interlab)	<1	<0.1	0
	Naphthalene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.1	0
	Phenanthrene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	Pyrene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	PAHs (Sum of total)	mg/kg	0.5	<0.5		
Phenols	2,4,5-trichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2,4,6-trichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2,4-dichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2,4-dimethylphenol	mg/kg	0.5	<0.5	<0.5	0
	2,6-dichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2-chlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2-nitrophenol	mg/kg	0.5	<0.5	<0.5	0
	2-methylphenol	mg/kg	0.5	<0.5	<0.5	0
	3&4-Methylphenol (m&p-cresol)	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	4-chloro-3-methylphenol	mg/kg	0.5 : 5 (Interlab)	<0.5	<5	0
	Pentachlorophenol	mg/kg	1 : 5 (Interlab)	<1	<5	0
	Phenol	mg/kg	0.5	<0.5	<0.5	0
PCBs	PCBs (Sum of total)	mg/kg	0.1	<0.1	<0.1	0
Chlorinated Hydrocarbons	1,1,2,2-tetrachloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,1,1,2-tetrachloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,1,2-trichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,1,1-trichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,1-dichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,1-dichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,1-dichloropropene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,2,3-trichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,2-dibromo-3-chloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,2-dichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,2-dichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,3-dichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	2,2-dichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Bromodichloromethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Bromoform	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Carbon tetrachloride	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Chlorodibromomethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Chloroethane	mg/kg	5 : 1 (Interlab)	<5	<1	0
	Chloroform	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Chloromethane	mg/kg	5 : 1 (Interlab)	<5	<1	0
	cis-1,2-dichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	cis-1,3-dichloropropene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Dibromomethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Hexachlorocyclopentadiene	mg/kg	2.5 : 2 (Interlab)	<2.5	<2	0
	Hexachloroethane	mg/kg	0.5	<0.5	<0.5	0
	Hexachlorobutadiene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Trichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Tetrachloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	trans-1,2-dichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	trans-1,3-dichloropropene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Vinyl chloride	mg/kg	5 : 1 (Interlab)	<5	<1	0
Organochlorine Pesticides	a-BHC	µg/kg	500 : 100 (Interlab)	<500	<100	0
	a-BHC	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Aldrin	µg/kg	500 : 100 (Interlab)	<500	<100	0
	Aldrin	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Dieldrin	µg/kg	500 : 100 (Interlab)	<500	<100	0
	Dieldrin	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Aldrin + Dieldrin	mg/kg	0.05	<0.05		
	b-BHC	µg/kg	500 : 100 (Interlab)	<500	<100	0
	b-BHC	µg/kg	50 : 500 (Interlab)	<50	<100	0
	chlordane	µg/kg	50	<50		
	Chlordane (cis)	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Chlordane (trans)	µg/kg	50 : 500 (Interlab)	<50	<100	0
	d-BHC	µg/kg	500 : 100 (Interlab)	<500	<100	0
	d-BHC	µg/kg	50 : 500 (Interlab)	<50	<100	0
	DDD	µg/kg	500 : 100 (Interlab)	<500	<100	0
	DDD	µg/kg	50 : 500 (Interlab)	<50	<100	0
	4,4-DDE	µg/kg	500 : 100 (Interlab)	<500	<100	0
	4,4-DDE	µg/kg	50 : 500 (Interlab)	<50	<100	0
	DDT	µg/kg	200 : 500 (Interlab)	<200	<100	0
	DDT	µg/kg	1000 : 500 (Interlab)	<1000	<100	0
	DDT+DDE+DDD	µg/kg	50 : 100 (Interlab)	<50	<100	0
	Endosulfan	µg/kg	50	<50		
	Endrin ketone	µg/kg	50 : 500 (Interlab)	<50	<500	0
	Endosulfan I	µg/kg	500 : 100 (Interlab)	<500	<100	0

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE

	SDG		ALSE-Sydney 17-Dec-18	ENVIROLAB 2018-12-19T00:00:00		
	Field ID		BH01@2.00	TRIP1		**RPD**
	Sampled Date/Time		12-12-18 15:00	12-12-18 15:00		
	Endosulfan I	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Endosulfan II	µg/kg	500 : 100 (Interlab)	<500	<100	0
	Endosulfan II	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Endosulfan sulphate	µg/kg	500 : 100 (Interlab)	<500	<100	0
	Endosulfan sulphate	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Endrin	µg/kg	500 : 100 (Interlab)	<500	<100	0
	Endrin	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Endrin aldehyde	µg/kg	50 : 500 (Interlab)	<50	<100	0
	g-BHC (Lindane)	µg/kg	500 : 100 (Interlab)	<500	<100	0
	g-BHC (Lindane)	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Heptachlor	µg/kg	500 : 100 (Interlab)	<500	<100	0
	Heptachlor	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Heptachlor epoxide	µg/kg	500 : 100 (Interlab)	<500	<100	0
	Heptachlor epoxide	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Methoxychlor	µg/kg	200 : 1000 (Interlab)	<200	<100	0
Organophosphorous Pesticides	Azinophos methyl	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Bromophos-ethyl	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Carbophenothion	mg/kg	0.05	<0.05		
	Chlorfenvinphos	mg/kg	0.5	<0.5		
	Chlorfenvinphos	mg/kg	0.05	<0.05		
	Chlorpyrifos	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	Chlorpyrifos	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Chlorpyrifos-methyl	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	Chlorpyrifos-methyl	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Demeton-S-methyl	mg/kg	0.05	<0.05		
	Diazinon	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	Diazinon	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Dichlorvos	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	Dichlorvos	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Dimethoate	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	Dimethoate	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Ethion	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	Ethion	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Fenamiphos	mg/kg	0.05	<0.05		
	Fenthion	mg/kg	0.5	<0.5		
	Fenthion	mg/kg	0.05	<0.05		
	Malathion	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	Malathion	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Methyl parathion	mg/kg	0.2	<0.2		
	Monocrotophos	mg/kg	0.2	<0.2		
	Parathion	mg/kg	0.2 : 0.1 (Interlab)	<0.2	<0.1	0
	Pirimphos-ethyl	mg/kg	0.5	<0.5		
	Pirimphos-ethyl	mg/kg	0.05	<0.05		
	Prothiofos	mg/kg	0.5	<0.5		
	Prothiofos	mg/kg	0.05	<0.05		
Pesticides	Chlorobenzilate	mg/kg	0.5	<0.5		
	Carbazole	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
Herbicides	Pronamide	mg/kg	0.5	<0.5		
Halogenated Hydrocarbons	1,2-dibromoethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	cis-1,4-Dichloro-2-butene	mg/kg	0.5	<0.5		
	trans-1,4-Dichloro-2-butene	mg/kg	0.5	<0.5		
	Pentachloroethane	mg/kg	0.5	<0.5	<0.5	0
	Bromomethane	mg/kg	5 : 1 (Interlab)	<5	<1	0
	Dichlorodifluoromethane	mg/kg	5 : 1 (Interlab)	<5	<1	0
	Iodomethane	mg/kg	0.5	<0.5		
	Trichlorofluoromethane	mg/kg	5 : 1 (Interlab)	<5	<1	0
Halogenated Benzenes	1,2,3-trichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,2,4-trichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2-dichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,3-dichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,4-dichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	2-chlorotoluene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	4-chlorotoluene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Bromobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Chlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Hexachlorobenzene	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Hexachlorobenzene	µg/kg	1000 : 500 (Interlab)	<1000	<100	0
	Pentachlorobenzene	mg/kg	0.5	<0.5	<0.5	0
Explosives	1,3,5-Trinitrobenzene	mg/kg	0.5	<0.5		
	2,4-Dinitrotoluene	mg/kg	1	<1		
	2,6-dinitrotoluene	mg/kg	1	<1	<1	0
	Nitrobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
Phthalates	Bis(2-ethylhexyl) phthalate	mg/kg	5 : 1 (Interlab)	<5	<1	0
	Butyl benzyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Diethylphthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Dimethyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE

			SDG	ALSE-Sydney 17-Dec-18	ENVIROLAB 2018-12-19T00:00:00	
			Field ID	BH01@2.00	TRIP1	**RPD**
			Sampled Date/Time	12-12-18 15:00	12-12-18 15:00	
	Di-n-butyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Di-n-octyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
Amino Aliphatics	N-nitrosodiethylamine	mg/kg	0.5	<0.5		
	N-nitrosodi-n-butylamine	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	N-nitrosodi-n-propylamine	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	N-Nitrosomethylethylamine	mg/kg	0.5	<0.5		
Amino Aromatics	1-naphthylamine	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	N-Nitrosodiphenyl & Diphenylamine	mg/kg	1	<1		
Anilines	2-nitroaniline	mg/kg	1	<1	<1	0
	3-nitroaniline	mg/kg	1	<1	<1	0
	4-chloroaniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	4-nitroaniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	2-methyl-5-nitroaniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Aniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
Nitroaromatics	2-Picoline	mg/kg	0.5	<0.5		
	4-aminobiphenyl	mg/kg	0.5	<0.5		
	Pentachloronitrobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
Solvents	Methyl Ethyl Ketone	mg/kg	5	<5		
	2-hexanone (MBK)	mg/kg	5	<5		
	4-Methyl-2-pentanone	mg/kg	5	<5		
	Carbon disulfide	mg/kg	0.5	<0.5		
	Isophorone	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Vinyl acetate	mg/kg	5	<5		

*RPDs have only been considered where a concentration is greater than 1 times the EQL.
**High RPDs are in bold (Acceptable RPDs for each EQL multiplier range are: 80 (1-10 x EQL); 50 (10-30 x
***Interlab Duplicates are matched on a per compound basis as methods vary between laboratories. Any n

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE

SDG	ALSE-Sydney 19-Dec-18	ENVIROLAB 2018-12-21T00:00:00	
Field ID	MW04@3.00	TRIP 4	RPD
Sampled Date/Time	19-12-18 15:00	19-12-18 15:00	

Chem_Group	ChemName	Units	EQL			
PAH/Phenols	Acetophenone	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
SVOCs	2-(acetylamino) fluorene	mg/kg	0.5	<0.5	<0.5	0
	3,3-Dichlorobenzidine	mg/kg	0.5	<0.5		
	4-(dimethylamino) azobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	4-bromophenyl phenyl ether	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	4-chlorophenyl phenyl ether	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	4-Nitroquinoline-N-oxide	mg/kg	0.5	<0.5		
	Azobenzene	mg/kg	1	<1	<1	0
	Bis(2-chloroethoxy) methane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Bis(2-chloroethyl)ether	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Dibenzofuran	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Hexachloropropene	mg/kg	0.5	<0.5	<0.5	0
	Methapyrilene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	N-nitrosomorpholine	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	N-nitrosopiperidine	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	N-nitrosopyrrolidine	mg/kg	1	<1		
	Phenacetin	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
Asbestos	Asbestos fibres	-	0.1			
Inorganics	Moisture Content	%	1	23.1		
Metals	Arsenic	mg/kg	5 : 4 (Interlab)	<5	<4	0
	Cadmium	mg/kg	1 : 0.4 (Interlab)	<1	<0.4	0
	Chromium (III+VI)	mg/kg	2 : 1 (Interlab)	<2	2	0
	Copper	mg/kg	5 : 1 (Interlab)	<5	<1	0
	Lead	mg/kg	5 : 1 (Interlab)	<5	<1	0
	Mercury	mg/kg	0.1	<0.1	<0.1	0
	Nickel	mg/kg	2 : 1 (Interlab)	<2	<1	0
	Zinc	mg/kg	5 : 1 (Interlab)	14	8	55
TPH	C6-C9	mg/kg	10 : 25 (Interlab)	<10	<25	0
	C10-C14	mg/kg	50	<50	<50	0
	C15-C28	mg/kg	100	<100	<100	0
	C29-C36	mg/kg	100	<100	<100	0
	C10-C36 (Sum of total)	mg/kg	50	<50		
TRH	C6-C10	mg/kg	10 : 25 (Interlab)	<10	<25	0
	>C6-C10 less BTEX (F1)	mg/kg	10 : 25 (Interlab)	<10	<25	0
	C10-C16	mg/kg	50	<50	<50	0
	>C10-C16 less Naphthalene (F2)	mg/kg	50	<50	<50	0
	C16-C34	mg/kg	100	<100	<100	0
	C34-C40	mg/kg	100	<100	<100	0
	>C10 - C40 (Sum of total)	mg/kg	50	<50	<50	0
BTEX	Benzene	mg/kg	0.2	<0.2	<0.2	0
	Benzene	mg/kg	0.2	<0.2	<0.2	0
	Toluene	mg/kg	0.5	<0.5	<0.5	0
	Toluene	mg/kg	0.5	<0.5	<0.5	0
	Ethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Ethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Xylene (m & p)	mg/kg	0.5 : 2 (Interlab)	<0.5	<2	0
	Xylene (m & p)	mg/kg	0.5 : 2 (Interlab)	<0.5	<2	0
	Xylene (o)	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Xylene (o)	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Xylene Total	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Total BTEX	mg/kg	0.2	<0.2		
MAH	1,2,4-trimethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,3,5-trimethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Isopropylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	n-butylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	n-propylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	p-isopropyltoluene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	sec-butylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Styrene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	tert-butylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
PAH	2-chloronaphthalene	mg/kg	0.5	<0.5	<0.5	0
	2-methylnaphthalene	mg/kg	0.5	<0.5	<0.5	0
	3-methylcholanthrene	mg/kg	0.5	<0.5	<0.5	0
	7,12-dimethylbenz(a)anthracene	mg/kg	0.5	<0.5	<0.5	0
	Acenaphthene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Acenaphthylene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Anthracene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Benz(a)anthracene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Benzo(a) pyrene	mg/kg	0.5 : 0.05 (Interlab)	<0.5	<0.5	0
	Benzo(a)pyrene TEQ calc (Zero)	mg/kg	0.5	<0.5		
	Benzo(a)pyrene TEQ calc (Half)	mg/kg	0.5	0.6		
	Benzo(a)pyrene TEQ (LOR)	mg/kg	0.5	1.2		
	Benzo(g,h,i)perylene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE

	SDG		ALSE-Sydney 19-Dec-18	ENVIROLAB 2018-12-21T00:00:00		
	Field ID		MW04@3.00	TRIP 4		**RPD**
	Sampled Date/Time		19-12-18 15:00	19-12-18 15:00		
	Benzo(b+j+k)fluoranthene	mg/kg	1 : 0.2 (Interlab)	<1	<1	0
	Chrysene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Dibenz(a,h)anthracene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Fluoranthene	mg/kg	0.5 : 0.1 (Interlab)	0.7	<0.5	33
	Fluorene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Indeno(1,2,3-c,d)pyrene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Naphthalene	mg/kg	1 : 0.5 (Interlab)	<1	<0.5	0
	Naphthalene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Phenanthrene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Pyrene	mg/kg	0.5 : 0.1 (Interlab)	0.7	<0.5	33
	PAHs (Sum of total)	mg/kg	0.5	1.4		
Phenols	2,4,5-trichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2,4,6-trichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2,4-dichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2,4-dimethylphenol	mg/kg	0.5	<0.5	<0.5	0
	2,6-dichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2-chlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2-nitrophenol	mg/kg	0.5	<0.5	<0.5	0
	2-methylphenol	mg/kg	0.5	<0.5	<0.5	0
	3&4-Methylphenol (m&p-cresol)	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	4-chloro-3-methylphenol	mg/kg	0.5 : 5 (Interlab)	<0.5	<5	0
	Pentachlorophenol	mg/kg	1 : 5 (Interlab)	<1	<5	0
	Phenol	mg/kg	0.5	<0.5	<0.5	0
PCBs	PCBs (Sum of total)	mg/kg	0.1	<0.1	<0.1	0
Chlorinated Hydrocarbons	1,1,2,2-tetrachloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,1,1,2-tetrachloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,1,2-trichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,1,1-trichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,1-dichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,1-dichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,1-dichloropropene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,2,3-trichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,2-dibromo-3-chloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,2-dichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,2-dichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,3-dichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	2,2-dichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Bromodichloromethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Bromoform	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Carbon tetrachloride	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Chlorodibromomethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Chloroethane	mg/kg	5 : 1 (Interlab)	<5	<1	0
	Chloroform	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Chloromethane	mg/kg	5 : 1 (Interlab)	<5	<1	0
	cis-1,2-dichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	cis-1,3-dichloropropene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Dibromomethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Hexachlorocyclopentadiene	mg/kg	2.5 : 2 (Interlab)	<2.5	<2	0
	Hexachloroethane	mg/kg	0.5	<0.5	<0.5	0
	Hexachlorobutadiene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Trichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Tetrachloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	trans-1,2-dichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	trans-1,3-dichloropropene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Vinyl chloride	mg/kg	5 : 1 (Interlab)	<5	<1	0
Organochlorine Pesticides	a-BHC	µg/kg	500 : 100 (Interlab)	<500	<100	0
	a-BHC	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Aldrin	µg/kg	500 : 100 (Interlab)	<500	<100	0
	Aldrin	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Dieldrin	µg/kg	500 : 100 (Interlab)	<500	<100	0
	Dieldrin	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Aldrin + Dieldrin	mg/kg	0.05	<0.05		
	b-BHC	µg/kg	500 : 100 (Interlab)	<500	<100	0
	b-BHC	µg/kg	50 : 500 (Interlab)	<50	<100	0
	chlordane	µg/kg	50	<50		
	Chlordane (cis)	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Chlordane (trans)	µg/kg	50 : 500 (Interlab)	<50	<100	0
	d-BHC	µg/kg	500 : 100 (Interlab)	<500	<100	0
	d-BHC	µg/kg	50 : 500 (Interlab)	<50	<100	0
	DDD	µg/kg	500 : 100 (Interlab)	<500	<100	0
	DDD	µg/kg	50 : 500 (Interlab)	<50	<100	0
	4,4-DDE	µg/kg	500 : 100 (Interlab)	<500	<100	0
	4,4-DDE	µg/kg	50 : 500 (Interlab)	<50	<100	0
	DDT	µg/kg	200 : 500 (Interlab)	<200	<100	0
	DDT	µg/kg	1000 : 500 (Interlab)	<1000	<100	0
	DDT+DDE+DDD	µg/kg	50 : 100 (Interlab)	<50	<100	0
	Endosulfan	µg/kg	50	<50		
	Endrin ketone	µg/kg	50 : 500 (Interlab)	<50	<500	0
	Endosulfan I	µg/kg	500 : 100 (Interlab)	<500	<100	0

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE

			SDG	ALSE-Sydney 19-Dec-18	ENVIROLAB 2018-12-21T00:00:00	
			Field ID	MW04@3.00	TRIP 4	**RPD**
			Sampled Date/Time	19-12-18 15:00	19-12-18 15:00	
	Endosulfan I	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Endosulfan II	µg/kg	500 : 100 (Interlab)	<500	<100	0
	Endosulfan II	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Endosulfan sulphate	µg/kg	500 : 100 (Interlab)	<500	<100	0
	Endosulfan sulphate	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Endrin	µg/kg	500 : 100 (Interlab)	<500	<100	0
	Endrin	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Endrin aldehyde	µg/kg	50 : 500 (Interlab)	<50	<100	0
	g-BHC (Lindane)	µg/kg	500 : 100 (Interlab)	<500	<100	0
	g-BHC (Lindane)	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Heptachlor	µg/kg	500 : 100 (Interlab)	<500	<100	0
	Heptachlor	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Heptachlor epoxide	µg/kg	500 : 100 (Interlab)	<500	<100	0
	Heptachlor epoxide	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Methoxychlor	µg/kg	200 : 1000 (Interlab)	<200	<100	0
Organophosphorous Pesticides	Azinophos methyl	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Bromophos-ethyl	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Carbophenothion	mg/kg	0.05	<0.05		
	Chlorfenvinphos	mg/kg	0.5	<0.5		
	Chlorfenvinphos	mg/kg	0.05	<0.05		
	Chlorpyrifos	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	Chlorpyrifos	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Chlorpyrifos-methyl	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	Chlorpyrifos-methyl	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Demeton-S-methyl	mg/kg	0.05	<0.05		
	Diazinon	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	Diazinon	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Dichlorvos	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	Dichlorvos	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Dimethoate	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	Dimethoate	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Ethion	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	Ethion	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Fenamiphos	mg/kg	0.05	<0.05		
	Fenthion	mg/kg	0.5	<0.5		
	Fenthion	mg/kg	0.05	<0.05		
	Malathion	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	Malathion	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Methyl parathion	mg/kg	0.2	<0.2		
	Monocrotophos	mg/kg	0.2	<0.2		
	Parathion	mg/kg	0.2 : 0.1 (Interlab)	<0.2	<0.1	0
	Pirimphos-ethyl	mg/kg	0.5	<0.5		
	Pirimphos-ethyl	mg/kg	0.05	<0.05		
	Prothiofos	mg/kg	0.5	<0.5		
	Prothiofos	mg/kg	0.05	<0.05		
Pesticides	Chlorobenzilate	mg/kg	0.5	<0.5		
	Carbazole	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
Herbicides	Pronamide	mg/kg	0.5	<0.5		
Halogenated Hydrocarbons	1,2-dibromoethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	cis-1,4-Dichloro-2-butene	mg/kg	0.5	<0.5		
	trans-1,4-Dichloro-2-butene	mg/kg	0.5	<0.5		
	Pentachloroethane	mg/kg	0.5	<0.5	<0.5	0
	Bromomethane	mg/kg	5 : 1 (Interlab)	<5	<1	0
	Dichlorodifluoromethane	mg/kg	5 : 1 (Interlab)	<5	<1	0
	Iodomethane	mg/kg	0.5	<0.5		
	Trichlorofluoromethane	mg/kg	5 : 1 (Interlab)	<5	<1	0
Halogenated Benzenes	1,2,3-trichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,2,4-trichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2-dichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,3-dichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,4-dichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	2-chlorotoluene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	4-chlorotoluene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Bromobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Chlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Hexachlorobenzene	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Hexachlorobenzene	µg/kg	1000 : 500 (Interlab)	<1000	<100	0
	Pentachlorobenzene	mg/kg	0.5	<0.5	<0.5	0
Explosives	1,3,5-Trinitrobenzene	mg/kg	0.5	<0.5		
	2,4-Dinitrotoluene	mg/kg	1	<1		
	2,6-dinitrotoluene	mg/kg	1	<1	<1	0
	Nitrobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
Phthalates	Bis(2-ethylhexyl) phthalate	mg/kg	5 : 1 (Interlab)	<5	<1	0
	Butyl benzyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Diethylphthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Dimethyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE

			SDG	ALSE-Sydney 19-Dec-18	ENVIROLAB 2018-12-21T00:00:00	
			Field ID	MW04@3.00	TRIP 4	**RPD**
			Sampled Date/Time	19-12-18 15:00	19-12-18 15:00	
	Di-n-butyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Di-n-octyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
Amino Aliphatics	N-nitrosodiethylamine	mg/kg	0.5	<0.5		
	N-nitrosodi-n-butylamine	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	N-nitrosodi-n-propylamine	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	N-Nitrosomethylethylamine	mg/kg	0.5	<0.5		
Amino Aromatics	1-naphthylamine	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	N-Nitrosodiphenyl & Diphenylamine	mg/kg	1	<1		
Anilines	2-nitroaniline	mg/kg	1	<1	<1	0
	3-nitroaniline	mg/kg	1	<1	<1	0
	4-chloroaniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	4-nitroaniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	2-methyl-5-nitroaniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Aniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
Nitroaromatics	2-Picoline	mg/kg	0.5	<0.5		
	4-aminobiphenyl	mg/kg	0.5	<0.5		
	Pentachloronitrobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
Solvents	Methyl Ethyl Ketone	mg/kg	5	<5		
	2-hexanone (MBK)	mg/kg	5	<5		
	4-Methyl-2-pentanone	mg/kg	5	<5		
	Carbon disulfide	mg/kg	0.5	<0.5		
	Isophorone	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Vinyl acetate	mg/kg	5	<5		

*RPDs have only been considered where a concentration is greater than 1 times the EQL.
**High RPDs are in bold (Acceptable RPDs for each EQL multiplier range are: 80 (1-10 x EQL); 50 (10-30 x
***Interlab Duplicates are matched on a per compound basis as methods vary between laboratories. Any n

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE

SDG	ALSE-Sydney 19-Dec-18	ENVIROLAB 2018-12-21T00:00:00	
Field ID	MW03@1.00	TRIP 3	RPD
Sampled Date/Time	19-12-18 15:00	19-12-18 15:00	

Chem_Group	ChemName	Units	EQL			
PAH/Phenols	Acetophenone	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
SVOCs	2-(acetylamino) fluorene	mg/kg	0.5	<0.5	<0.5	0
	3,3-Dichlorobenzidine	mg/kg	0.5	<0.5		
	4-(dimethylamino) azobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	4-bromophenyl phenyl ether	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	4-chlorophenyl phenyl ether	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	4-Nitroquinoline-N-oxide	mg/kg	0.5	<0.5		
	Azobenzene	mg/kg	1	<1	<1	0
	Bis(2-chloroethoxy) methane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Bis(2-chloroethyl)ether	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Dibenzofuran	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Hexachloropropene	mg/kg	0.5	<0.5	<0.5	0
	Methapyrilene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	N-nitrosomorpholine	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	N-nitrosopiperidine	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	N-nitrosopyrrolidine	mg/kg	1	<1		
	Phenacetin	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
Asbestos	Asbestos fibres	-	0.1	0.0E0	0.0E0	0
Inorganics	Moisture Content	%	1	7.7		
Metals	Arsenic	mg/kg	5 : 4 (Interlab)	<5	5	0
	Cadmium	mg/kg	1 : 0.4 (Interlab)	<1	<0.4	0
	Chromium (III+VI)	mg/kg	2 : 1 (Interlab)	**<2**	**7**	**111**
	Copper	mg/kg	5 : 1 (Interlab)	**<5**	**56**	**167**
	Lead	mg/kg	5 : 1 (Interlab)	**<5**	**120**	**184**
	Mercury	mg/kg	0.1	<0.1	0.2	67
	Nickel	mg/kg	2 : 1 (Interlab)	<2	4	67
	Zinc	mg/kg	5 : 1 (Interlab)	**<5**	**73**	**174**
TPH	C6-C9	mg/kg	10 : 25 (Interlab)	<10	<25	0
	C10-C14	mg/kg	50	<50	<50	0
	C15-C28	mg/kg	100	<100	<100	0
	C29-C36	mg/kg	100	<100	<100	0
	C10-C36 (Sum of total)	mg/kg	50	<50		
TRH	C6-C10	mg/kg	10 : 25 (Interlab)	<10	<25	0
	>C6-C10 less BTEX (F1)	mg/kg	10 : 25 (Interlab)	<10	<25	0
	C10-C16	mg/kg	50	<50	<50	0
	>C10-C16 less Naphthalene (F2)	mg/kg	50	<50	<50	0
	C16-C34	mg/kg	100	<100	<100	0
	C34-C40	mg/kg	100	<100	<100	0
	>C10 - C40 (Sum of total)	mg/kg	50	<50	<50	0
BTEX	Benzene	mg/kg	0.2	<0.2	<0.2	0
	Benzene	mg/kg	0.2	<0.2	<0.2	0
	Toluene	mg/kg	0.5	<0.5	<0.5	0
	Toluene	mg/kg	0.5	<0.5	<0.5	0
	Ethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Ethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Xylene (m & p)	mg/kg	0.5 : 2 (Interlab)	<0.5	<2	0
	Xylene (m & p)	mg/kg	0.5 : 2 (Interlab)	<0.5	<2	0
	Xylene (o)	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Xylene (o)	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Xylene Total	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Total BTEX	mg/kg	0.2	<0.2		
MAH	1,2,4-trimethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,3,5-trimethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Isopropylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	n-butylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	n-propylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	p-isopropyltoluene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	sec-butylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Styrene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	tert-butylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
PAH	2-chloronaphthalene	mg/kg	0.5	<0.5	<0.5	0
	2-methylnaphthalene	mg/kg	0.5	<0.5	<0.5	0
	3-methylcholanthrene	mg/kg	0.5	<0.5	<0.5	0
	7,12-dimethylbenz(a)anthracene	mg/kg	0.5	<0.5	<0.5	0
	Acenaphthene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Acenaphthylene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Anthracene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Benz(a)anthracene	mg/kg	0.5 : 0.1 (Interlab)	1.2	2	50
	Benzo(a) pyrene	mg/kg	0.5 : 0.05 (Interlab)	1.2	2	50
	Benzo(a)pyrene TEQ calc (Zero)	mg/kg	0.5	1.5		
	Benzo(a)pyrene TEQ calc (Half)	mg/kg	0.5	1.8		
	Benzo(a)pyrene TEQ (LOR)	mg/kg	0.5	2.1		
	Benzo(g,h,i)perylene	mg/kg	0.5 : 0.1 (Interlab)	0.6	1	50

10026439
Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE

SDG	ALSE-Sydney 19-Dec-18	ENVIROLAB 2018-12-21T00:00:00			
Field ID	MW03@1.00	TRIP 3	**RPD**		
Sampled Date/Time	19-12-18 15:00	19-12-18 15:00			

	Benzo(b+j+k)fluoranthene	mg/kg	1 : 0.2 (Interlab)	2	3	40
	Chrysene	mg/kg	0.5 : 0.1 (Interlab)	1	1	0
	Dibenz(a,h)anthracene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Fluoranthene	mg/kg	0.5 : 0.1 (Interlab)	2.4	2	18
	Fluorene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Indeno(1,2,3-c,d)pyrene	mg/kg	0.5 : 0.1 (Interlab)	**<0.5**	**2**	**120**
	Naphthalene	mg/kg	1 : 0.5 (Interlab)	<1	<0.5	0
	Naphthalene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Phenanthrene	mg/kg	0.5 : 0.1 (Interlab)	1.8	0.8	77
	Pyrene	mg/kg	0.5 : 0.1 (Interlab)	2.1	3	35
	PAHs (Sum of total)	mg/kg	0.5	12.3		
Phenols	2,4,5-trichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2,4,6-trichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2,4-dichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2,4-dimethylphenol	mg/kg	0.5	<0.5	<0.5	0
	2,6-dichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2-chlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2-nitrophenol	mg/kg	0.5	<0.5	<0.5	0
	2-methylphenol	mg/kg	0.5	<0.5	<0.5	0
	3&4-Methylphenol (m&p-cresol)	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	4-chloro-3-methylphenol	mg/kg	0.5 : 5 (Interlab)	<0.5	<5	0
	Pentachlorophenol	mg/kg	1 : 5 (Interlab)	<1	<5	0
	Phenol	mg/kg	0.5	<0.5	<0.5	0
PCBs	PCBs (Sum of total)	mg/kg	0.1	<0.1	<0.1	0
Chlorinated Hydrocarbons	1,1,2,2-tetrachloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,1,1,2-tetrachloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,1,2-trichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,1,1-trichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,1-dichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,1-dichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,1-dichloropropene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,2,3-trichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,2-dibromo-3-chloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,2-dichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,2-dichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,3-dichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	2,2-dichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Bromodichloromethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Bromoform	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Carbon tetrachloride	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Chlorodibromomethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Chloroethane	mg/kg	5 : 1 (Interlab)	<5	<1	0
	Chloroform	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Chloromethane	mg/kg	5 : 1 (Interlab)	<5	<1	0
	cis-1,2-dichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	cis-1,3-dichloropropene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Dibromomethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Hexachlorocyclopentadiene	mg/kg	2.5 : 2 (Interlab)	<2.5	<2	0
	Hexachloroethane	mg/kg	0.5	<0.5	<0.5	0
	Hexachlorobutadiene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Trichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Tetrachloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	trans-1,2-dichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	trans-1,3-dichloropropene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Vinyl chloride	mg/kg	5 : 1 (Interlab)	<5	<1	0
Organochlorine Pesticides	a-BHC	µg/kg	500 : 100 (Interlab)	<500	<100	0
	a-BHC	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Aldrin	µg/kg	500 : 100 (Interlab)	<500	<100	0
	Aldrin	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Dieldrin	µg/kg	500 : 100 (Interlab)	<500	<100	0
	Dieldrin	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Aldrin + Dieldrin	mg/kg	0.05	<0.05		
	b-BHC	µg/kg	500 : 100 (Interlab)	<500	<100	0
	b-BHC	µg/kg	50 : 500 (Interlab)	<50	<100	0
	chlordane	µg/kg	50	<50		
	Chlordane (cis)	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Chlordane (trans)	µg/kg	50 : 500 (Interlab)	<50	<100	0
	d-BHC	µg/kg	500 : 100 (Interlab)	<500	<100	0
	d-BHC	µg/kg	50 : 500 (Interlab)	<50	<100	0
	DDD	µg/kg	500 : 100 (Interlab)	<500	<100	0
	DDD	µg/kg	50 : 500 (Interlab)	<50	<100	0
	4,4-DDE	µg/kg	500 : 100 (Interlab)	<500	<100	0
	4,4-DDE	µg/kg	50 : 500 (Interlab)	<50	<100	0
	DDT	µg/kg	200 : 500 (Interlab)	<200	<100	0
	DDT	µg/kg	1000 : 500 (Interlab)	<1000	<100	0
	DDT+DDE+DDD	µg/kg	50 : 100 (Interlab)	<50	<100	0
	Endosulfan	µg/kg	50	<50		
	Endrin ketone	µg/kg	50 : 500 (Interlab)	<50	<500	0
	Endosulfan I	µg/kg	500 : 100 (Interlab)	<500	<100	0

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE

			SDG	ALSE-Sydney 19-Dec-18	ENVIROLAB 2018-12-21T00:00:00	
			Field ID	MW03@1.00	TRIP 3	**RPD**
			Sampled Date/Time	19-12-18 15:00	19-12-18 15:00	
	Endosulfan I	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Endosulfan II	µg/kg	500 : 100 (Interlab)	<500	<100	0
	Endosulfan II	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Endosulfan sulphate	µg/kg	500 : 100 (Interlab)	<500	<100	0
	Endosulfan sulphate	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Endrin	µg/kg	500 : 100 (Interlab)	<500	<100	0
	Endrin	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Endrin aldehyde	µg/kg	50 : 500 (Interlab)	<50	<100	0
	g-BHC (Lindane)	µg/kg	500 : 100 (Interlab)	<500	<100	0
	g-BHC (Lindane)	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Heptachlor	µg/kg	500 : 100 (Interlab)	<500	<100	0
	Heptachlor	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Heptachlor epoxide	µg/kg	500 : 100 (Interlab)	<500	<100	0
	Heptachlor epoxide	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Methoxychlor	µg/kg	200 : 1000 (Interlab)	<200	<100	0
Organophosphorous Pesticides	Azinophos methyl	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Bromophos-ethyl	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Carbophenothion	mg/kg	0.05	<0.05		
	Chlorfenvinphos	mg/kg	0.5	<0.5		
	Chlorfenvinphos	mg/kg	0.05	<0.05		
	Chlorpyrifos	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	Chlorpyrifos	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Chlorpyrifos-methyl	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	Chlorpyrifos-methyl	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Demeton-S-methyl	mg/kg	0.05	<0.05		
	Diazinon	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	Diazinon	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Dichlorvos	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	Dichlorvos	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Dimethoate	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	Dimethoate	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Ethion	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	Ethion	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Fenamiphos	mg/kg	0.05	<0.05		
	Fenthion	mg/kg	0.5	<0.5		
	Fenthion	mg/kg	0.05	<0.05		
	Malathion	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.1	0
	Malathion	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Methyl parathion	mg/kg	0.2	<0.2		
	Monocrotophos	mg/kg	0.2	<0.2		
	Parathion	mg/kg	0.2 : 0.1 (Interlab)	<0.2	<0.1	0
	Pirimphos-ethyl	mg/kg	0.5	<0.5		
	Pirimphos-ethyl	mg/kg	0.05	<0.05		
	Prothiofos	mg/kg	0.5	<0.5		
	Prothiofos	mg/kg	0.05	<0.05		
Pesticides	Chlorobenzilate	mg/kg	0.5	<0.5		
	Carbazole	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
Herbicides	Pronamide	mg/kg	0.5	<0.5		
Halogenated Hydrocarbons	1,2-dibromoethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	cis-1,4-Dichloro-2-butene	mg/kg	0.5	<0.5		
	trans-1,4-Dichloro-2-butene	mg/kg	0.5	<0.5		
	Pentachloroethane	mg/kg	0.5	<0.5	<0.5	0
	Bromomethane	mg/kg	5 : 1 (Interlab)	<5	<1	0
	Dichlorodifluoromethane	mg/kg	5 : 1 (Interlab)	<5	<1	0
	Iodomethane	mg/kg	0.5	<0.5		
	Trichlorofluoromethane	mg/kg	5 : 1 (Interlab)	<5	<1	0
Halogenated Benzenes	1,2,3-trichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,2,4-trichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2-dichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,3-dichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,4-dichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	2-chlorotoluene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	4-chlorotoluene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Bromobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Chlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Hexachlorobenzene	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Hexachlorobenzene	µg/kg	1000 : 500 (Interlab)	<1000	<100	0
	Pentachlorobenzene	mg/kg	0.5	<0.5	<0.5	0
Explosives	1,3,5-Trinitrobenzene	mg/kg	0.5	<0.5		
	2,4-Dinitrotoluene	mg/kg	1	<1		
	2,6-dinitrotoluene	mg/kg	1	<1	<1	0
	Nitrobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
Phthalates	Bis(2-ethylhexyl) phthalate	mg/kg	5 : 1 (Interlab)	<5	<1	0
	Butyl benzyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Diethylphthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Dimethyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE

				SDG	ALSE-Sydney 19-Dec-18	ENVIROLAB 2018-12-21T00:00:00
				Field ID	MW03@1.00	TRIP 3 **RPD**
				Sampled Date/Time	19-12-18 15:00	19-12-18 15:00
	Di-n-butyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Di-n-octyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
Amino Aliphatics	N-nitrosodiethylamine	mg/kg	0.5	<0.5		
	N-nitrosodi-n-butylamine	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	N-nitrosodi-n-propylamine	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	N-Nitrosomethylethylamine	mg/kg	0.5	<0.5		
Amino Aromatics	1-naphthylamine	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	N-Nitrosodiphenyl & Diphenylamine	mg/kg	1	<1		
Anilines	2-nitroaniline	mg/kg	1	<1	<1	0
	3-nitroaniline	mg/kg	1	<1	<1	0
	4-chloroaniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	4-nitroaniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	2-methyl-5-nitroaniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Aniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
Nitroaromatics	2-Picoline	mg/kg	0.5	<0.5		
	4-aminobiphenyl	mg/kg	0.5	<0.5		
	Pentachloronitrobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
Solvents	Methyl Ethyl Ketone	mg/kg	5	<5		
	2-hexanone (MBK)	mg/kg	5	<5		
	4-Methyl-2-pentanone	mg/kg	5	<5		
	Carbon disulfide	mg/kg	0.5	<0.5		
	Isophorone	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Vinyl acetate	mg/kg	5	<5		

*RPDs have only been considered where a concentration is greater than 1 times the EQL.
**High RPDs are in bold (Acceptable RPDs for each EQL multiplier range are: 80 (1-10 x EQL); 50 (10-30 x
***Interlab Duplicates are matched on a per compound basis as methods vary between laboratories. Any n

10026439
Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE-

SDG	ALSE-Sydney 13-Feb-19	ENVIROLAB 2019-02-14T00:00:00	
Field ID	BH45@2.2	TRIP2@2.2	RPD
Sampled Date/Time	11-02-19	11-02-19	

Chem_Group	ChemName	Units	EQL			
PAH/Phenols	Acetophenone	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
SVOCs	2-(acetylamino) fluorene	mg/kg	0.5	<0.5	<0.5	0
	3,3-Dichlorobenzidine	mg/kg	0.5	<0.5		
	4-(dimethylamino) azobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	4-bromophenyl phenyl ether	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	4-chlorophenyl phenyl ether	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	4-Nitroquinoline-N-oxide	mg/kg	0.5	<0.5		
	Azobenzene	mg/kg	1	<1	<1	0
	Bis(2-chloroethoxy) methane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Bis(2-chloroethyl)ether	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Dibenzofuran	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Hexachloropropene	mg/kg	0.5	<0.5	<0.5	0
	Methapyrilene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	N-nitrosomorpholine	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	N-nitrosopiperidine	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	N-nitrosopyrrolidine	mg/kg	1	<1		
	Phenacetin	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
Asbestos	Asbestos fibres	-	0.1			
Inorganics	Moisture Content	%	1	5.7		
Metals	Arsenic	mg/kg	5 : 4 (Interlab)	<5	<4	0
	Cadmium	mg/kg	1 : 0.4 (Interlab)	<1	<0.4	0
	Chromium (III+VI)	mg/kg	2 : 1 (Interlab)	<2	<1	0
	Copper	mg/kg	5 : 1 (Interlab)	<5	<1	0
	Lead	mg/kg	5 : 1 (Interlab)	<5	<1	0
	Mercury	mg/kg	0.1	<0.1	<0.1	0
	Nickel	mg/kg	2 : 1 (Interlab)	<2	<1	0
	Zinc	mg/kg	5 : 1 (Interlab)	<5	1	0
TPH	C6-C9	mg/kg	10 : 25 (Interlab)	<10	<25	0
	C10-C14	mg/kg	50	240	240	0
	C15-C28	mg/kg	100	720	580	22
	C29-C36	mg/kg	100	<100	<100	0
	C10-C36 (Sum of total)	mg/kg	50	960		
TRH	C6-C10	mg/kg	10 : 25 (Interlab)	<10	<25	0
	>C6-C10 less BTEX (F1)	mg/kg	10 : 25 (Interlab)	<10	<25	0
	C10-C16	mg/kg	50	450	450	0
	>C10-C16 less Naphthalene (F2)	mg/kg	50	450	450	0
	C16-C34	mg/kg	100	490	360	31
	C34-C40	mg/kg	100	<100	<100	0
	>C10 - C40 (Sum of total)	mg/kg	50	940	810	15
BTEX	Benzene	mg/kg	0.2			
	Benzene	mg/kg	0.2	<0.2	<0.2	0
	Toluene	mg/kg	0.5			
	Toluene	mg/kg	0.5	<0.5	<0.5	0
	Ethylbenzene	mg/kg	0.5 : 1 (Interlab)			
	Ethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Xylene (m & p)	mg/kg	0.5 : 2 (Interlab)			
	Xylene (m & p)	mg/kg	0.5 : 2 (Interlab)	<0.5	<2	0
	Xylene (o)	mg/kg	0.5 : 1 (Interlab)			
	Xylene (o)	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Xylene Total	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Total BTEX	mg/kg	0.2	<0.2		
MAH	1,2,4-trimethylbenzene	mg/kg	0.5 : 1 (Interlab)	**<0.5**	**3**	**143**
	1,3,5-trimethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Isopropylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	n-butylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	n-propylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	p-isopropyltoluene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	sec-butylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Styrene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	tert-butylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
PAH	2-chloronaphthalene	mg/kg	0.5	<0.5	<0.5	0
	2-methylnaphthalene	mg/kg	0.5	0.5	<0.5	0
	3-methylcholanthrene	mg/kg	0.5	<0.5	<0.5	0
	7,12-dimethylbenz(a)anthracene	mg/kg	0.5	<0.5	<0.5	0
	Acenaphthene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Acenaphthylene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Anthracene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Benz(a)anthracene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Benzo(a) pyrene	mg/kg	0.5 : 0.05 (Interlab)	<0.5	<0.5	0
	Benzo(a)pyrene TEQ calc (Zero)	mg/kg	0.5	<0.5		
	Benzo(a)pyrene TEQ calc (Half)	mg/kg	0.5	0.6		
	Benzo(a)pyrene TEQ (LOR)	mg/kg	0.5	1.2		
	Benzo(g,h,i)perylene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE-

SDG	ALSE-Sydney 13-Feb-19	ENVIROLAB 2019-02-14T00:00:00	
Field ID	BH45@2.2	TRIP2@2.2	RPD
Sampled Date/Time	11-02-19	11-02-19	

	Benzo(b+j+k)fluoranthene	mg/kg	1 : 0.2 (Interlab)	<1	<1	0
	Chrysene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Dibenz(a,h)anthracene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Fluoranthene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Fluorene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Indeno(1,2,3-c,d)pyrene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Naphthalene	mg/kg	1 : 0.5 (Interlab)	<1	<0.5	0
	Naphthalene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Phenanthrene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Pyrene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	PAHs (Sum of total)	mg/kg	0.5	<0.5		
Phenols	2,4,5-trichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2,4,6-trichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2,4-dichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2,4-dimethylphenol	mg/kg	0.5	<0.5	<0.5	0
	2,6-dichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2-chlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2-nitrophenol	mg/kg	0.5	<0.5	<0.5	0
	2-methylphenol	mg/kg	0.5	<0.5	<0.5	0
	3&4-Methylphenol (m&p-cresol)	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	4-chloro-3-methylphenol	mg/kg	0.5 : 5 (Interlab)	<0.5	<5	0
	Pentachlorophenol	mg/kg	1 : 5 (Interlab)	<1	<5	0
	Phenol	mg/kg	0.5	<0.5	<0.5	0
PCBs	PCBs (Sum of total)	mg/kg	0.1	<0.1	<0.1	0
Chlorinated Hydrocarbons	1,1,2,2-tetrachloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,1,1,2-tetrachloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,1,2-trichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,1,1-trichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,1-dichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,1-dichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,1-dichloropropene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,2,3-trichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,2-dibromo-3-chloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,2-dichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,2-dichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,3-dichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	2,2-dichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Bromodichloromethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Bromoform	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Carbon tetrachloride	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Chlorodibromomethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Chloroethane	mg/kg	5 : 1 (Interlab)	<5	<1	0
	Chloroform	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Chloromethane	mg/kg	5 : 1 (Interlab)	<5	<1	0
	cis-1,2-dichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	cis-1,3-dichloropropene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Dibromomethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Hexachlorocyclopentadiene	mg/kg	2.5 : 2 (Interlab)	<2.5	<2	0
	Hexachloroethane	mg/kg	0.5	<0.5	<0.5	0
	Hexachlorobutadiene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Trichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Tetrachloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	trans-1,2-dichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	trans-1,3-dichloropropene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Vinyl chloride	mg/kg	5 : 1 (Interlab)	<5	<1	0
Organochlorine Pesticides	a-BHC	µg/kg	500 : 100 (Interlab)			
	a-BHC	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Aldrin	µg/kg	500 : 100 (Interlab)			
	Aldrin	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Dieldrin	µg/kg	500 : 100 (Interlab)			
	Dieldrin	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Aldrin + Dieldrin	mg/kg	0.05	<0.05		
	b-BHC	µg/kg	500 : 100 (Interlab)			
	b-BHC	µg/kg	50 : 500 (Interlab)	<50	<100	0
	chlordane	µg/kg	50	<50		
	Chlordane (cis)	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Chlordane (trans)	µg/kg	50 : 500 (Interlab)	<50	<100	0
	d-BHC	µg/kg	500 : 100 (Interlab)			
	d-BHC	µg/kg	50 : 500 (Interlab)	<50	<100	0
	DDD	µg/kg	500 : 100 (Interlab)			
	DDD	µg/kg	50 : 500 (Interlab)	<50	<100	0
	4,4-DDE	µg/kg	500 : 100 (Interlab)			
	4,4-DDE	µg/kg	50 : 500 (Interlab)	<50	<100	0
	DDT	µg/kg	200 : 500 (Interlab)	<200	<100	0
	DDT	µg/kg	1000 : 500 (Interlab)			
	DDT+DDE+DDD	µg/kg	50 : 100 (Interlab)	<50	<100	0
	Endosulfan	µg/kg	50	<50		
	Endrin ketone	µg/kg	50 : 500 (Interlab)	<50	<500	0
	Endosulfan I	µg/kg	500 : 100 (Interlab)			

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE-

SDG	ALSE-Sydney 13-Feb-19	ENVIROLAB 2019-02-14T00:00:00	
Field ID	BH45@2.2	TRIP2@2.2	RPD
Sampled Date/Time	11-02-19	11-02-19	

	Endosulfan I	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Endosulfan II	µg/kg	500 : 100 (Interlab)			
	Endosulfan II	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Endosulfan sulphate	µg/kg	500 : 100 (Interlab)			
	Endosulfan sulphate	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Endrin	µg/kg	500 : 100 (Interlab)			
	Endrin	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Endrin aldehyde	µg/kg	50 : 500 (Interlab)	<50	<100	0
	g-BHC (Lindane)	µg/kg	500 : 100 (Interlab)			
	g-BHC (Lindane)	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Heptachlor	µg/kg	500 : 100 (Interlab)			
	Heptachlor	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Heptachlor epoxide	µg/kg	500 : 100 (Interlab)			
	Heptachlor epoxide	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Methoxychlor	µg/kg	200 : 1000 (Interlab)	<200	<100	0
Organophosphorous Pesticides	Azinophos methyl	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Bromophos-ethyl	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Carbophenothion	mg/kg	0.05	<0.05		
	Chlorfenvinphos	mg/kg	0.5			
	Chlorfenvinphos	mg/kg	0.05	<0.05		
	Chlorpyrifos	mg/kg	0.5 : 0.1 (Interlab)			
	Chlorpyrifos	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Chlorpyrifos-methyl	mg/kg	0.5 : 0.1 (Interlab)			
	Chlorpyrifos-methyl	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Demeton-S-methyl	mg/kg	0.05	<0.05		
	Diazinon	mg/kg	0.5 : 0.1 (Interlab)			
	Diazinon	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Dichlorvos	mg/kg	0.5 : 0.1 (Interlab)			
	Dichlorvos	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Dimethoate	mg/kg	0.5 : 0.1 (Interlab)			
	Dimethoate	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Ethion	mg/kg	0.5 : 0.1 (Interlab)			
	Ethion	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Fenamiphos	mg/kg	0.05	<0.05		
	Fenthion	mg/kg	0.5			
	Fenthion	mg/kg	0.05	<0.05		
	Malathion	mg/kg	0.5 : 0.1 (Interlab)			
	Malathion	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Methyl parathion	mg/kg	0.2	<0.2		
	Monocrotophos	mg/kg	0.2	<0.2		
	Parathion	mg/kg	0.2 : 0.1 (Interlab)	<0.2	<0.1	0
	Pirimphos-ethyl	mg/kg	0.5			
	Pirimphos-ethyl	mg/kg	0.05	<0.05		
	Prothiofos	mg/kg	0.5			
	Prothiofos	mg/kg	0.05	<0.05		
Pesticides	Chlorobenzilate	mg/kg	0.5	<0.5		
	Carbazole	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
Herbicides	Pronamide	mg/kg	0.5	<0.5		
Halogenated Hydrocarbons	1,2-dibromoethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	cis-1,4-Dichloro-2-butene	mg/kg	0.5	<0.5		
	trans-1,4-Dichloro-2-butene	mg/kg	0.5	<0.5		
	Pentachloroethane	mg/kg	0.5	<0.5	<0.5	0
	Bromomethane	mg/kg	5 : 1 (Interlab)	<5	<1	0
	Dichlorodifluoromethane	mg/kg	5 : 1 (Interlab)	<5	<1	0
	Iodomethane	mg/kg	0.5	<0.5		
	Trichlorofluoromethane	mg/kg	5 : 1 (Interlab)	<5	<1	0
Halogenated Benzenes	1,2,3-trichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,2,4-trichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2-dichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,3-dichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,4-dichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	2-chlorotoluene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	4-chlorotoluene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Bromobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Chlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Hexachlorobenzene	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Hexachlorobenzene	µg/kg	1000 : 500 (Interlab)	<1000	<100	0
	Pentachlorobenzene	mg/kg	0.5	<0.5	<0.5	0
Explosives	1,3,5-Trinitrobenzene	mg/kg	0.5	<0.5		
	2,4-Dinitrotoluene	mg/kg	1	<1		
	2,6-dinitrotoluene	mg/kg	1	<1	<1	0
	Nitrobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
Phthalates	Bis(2-ethylhexyl) phthalate	mg/kg	5 : 1 (Interlab)	<5	<1	0
	Butyl benzyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Diethylphthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Dimethyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE

			SDG	ALSE-Sydney 13-Feb-19	ENVIROLAB 2019-02-14T00:00:00	
			Field ID	BH45@2.2	TRIP2@2.2	**RPD**
			Sampled Date/Time	11-02-19	11-02-19	
	Di-n-butyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Di-n-octyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
Amino Aliphatics	N-nitrosodiethylamine	mg/kg	0.5	<0.5		
	N-nitrosodi-n-butylamine	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	N-nitrosodi-n-propylamine	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	N-Nitrosomethylethylamine	mg/kg	0.5	<0.5		
Amino Aromatics	1-naphthylamine	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	N-Nitrosodiphenyl & Diphenylamine	mg/kg	1	<1		
Anilines	2-nitroaniline	mg/kg	1	<1	<1	0
	3-nitroaniline	mg/kg	1	<1	<1	0
	4-chloroaniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	4-nitroaniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	2-methyl-5-nitroaniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Aniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
Nitroaromatics	2-Picoline	mg/kg	0.5	<0.5		
	4-aminobiphenyl	mg/kg	0.5	<0.5		
	Pentachloronitrobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
Solvents	Methyl Ethyl Ketone	mg/kg	5	<5		
	2-hexanone (MBK)	mg/kg	5	<5		
	4-Methyl-2-pentanone	mg/kg	5	<5		
	Carbon disulfide	mg/kg	0.5	<0.5		
	Isophorone	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Vinyl acetate	mg/kg	5	<5		

*RPDs have only been considered where a concentration is greater than 1 times the EQL.
**High RPDs are in bold (Acceptable RPDs for each EQL multiplier range are: 80 (1-10 x EQL); 50 (10-30 x
***Interlab Duplicates are matched on a per compound basis as methods vary between laboratories. Any n

10026439
Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE-

SDG	ALSE-Sydney 13-Feb-19	ENVIROLAB 2019-02-14T00:00:00	
Field ID	BH30@2.7	TRIP@2.7	RPD
Sampled Date/Time	11-02-19	11-02-19	

Chem_Group	ChemName	Units	EQL			
PAH/Phenols	Acetophenone	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
SVOCs	2-(acetylamino) fluorene	mg/kg	0.5	<0.5	<0.5	0
	3,3-Dichlorobenzidine	mg/kg	0.5	<0.5		
	4-(dimethylamino) azobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	4-bromophenyl phenyl ether	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	4-chlorophenyl phenyl ether	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	4-Nitroquinoline-N-oxide	mg/kg	0.5	<0.5		
	Azobenzene	mg/kg	1	<1	<1	0
	Bis(2-chloroethoxy) methane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Bis(2-chloroethyl)ether	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Dibenzofuran	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Hexachloropropene	mg/kg	0.5	<0.5	<0.5	0
	Methapyrilene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	N-nitrosomorpholine	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	N-nitrosopiperidine	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	N-nitrosopyrrolidine	mg/kg	1	<1		
	Phenacetin	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
Asbestos	Asbestos fibres	-	0.1			
Inorganics	Moisture Content	%	1	17.5		
Metals	Arsenic	mg/kg	5 : 4 (Interlab)	<5	<4	0
	Cadmium	mg/kg	1 : 0.4 (Interlab)	<1	<0.4	0
	Chromium (III+VI)	mg/kg	2 : 1 (Interlab)	<2	1	0
	Copper	mg/kg	5 : 1 (Interlab)	**11**	**2**	**138**
	Lead	mg/kg	5 : 1 (Interlab)	**142**	**21**	**148**
	Mercury	mg/kg	0.1	<0.1	<0.1	0
	Nickel	mg/kg	2 : 1 (Interlab)	**17**	**<1**	**178**
	Zinc	mg/kg	5 : 1 (Interlab)	**769**	**95**	**156**
TPH	C6-C9	mg/kg	10 : 25 (Interlab)	<10	<25	0
	C10-C14	mg/kg	50	<50	<50	0
	C15-C28	mg/kg	100	<100	<100	0
	C29-C36	mg/kg	100	<100	<100	0
	C10-C36 (Sum of total)	mg/kg	50	<50		
TRH	C6-C10	mg/kg	10 : 25 (Interlab)	<10	<25	0
	>C6-C10 less BTEX (F1)	mg/kg	10 : 25 (Interlab)	<10	<25	0
	C10-C16	mg/kg	50	<50	<50	0
	>C10-C16 less Naphthalene (F2)	mg/kg	50	<50	<50	0
	C16-C34	mg/kg	100	<100	<100	0
	C34-C40	mg/kg	100	<100	<100	0
	>C10 - C40 (Sum of total)	mg/kg	50	<50	<50	0
BTEX	Benzene	mg/kg	0.2			
	Benzene	mg/kg	0.2	<0.2	<0.2	0
	Toluene	mg/kg	0.5			
	Toluene	mg/kg	0.5	<0.5	<0.5	0
	Ethylbenzene	mg/kg	0.5 : 1 (Interlab)			
	Ethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Xylene (m & p)	mg/kg	0.5 : 2 (Interlab)			
	Xylene (m & p)	mg/kg	0.5 : 2 (Interlab)	<0.5	<2	0
	Xylene (o)	mg/kg	0.5 : 1 (Interlab)			
	Xylene (o)	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Xylene Total	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Total BTEX	mg/kg	0.2	<0.2		
MAH	1,2,4-trimethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,3,5-trimethylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Isopropylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	n-butylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	n-propylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	p-isopropyltoluene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	sec-butylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Styrene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	tert-butylbenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
PAH	2-chloronaphthalene	mg/kg	0.5	<0.5	<0.5	0
	2-methylnaphthalene	mg/kg	0.5	<0.5	<0.5	0
	3-methylcholanthrene	mg/kg	0.5	<0.5	<0.5	0
	7,12-dimethylbenz(a)anthracene	mg/kg	0.5	<0.5	<0.5	0
	Acenaphthene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Acenaphthylene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Anthracene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Benz(a)anthracene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Benzo(a) pyrene	mg/kg	0.5 : 0.05 (Interlab)	<0.5	<0.5	0
	Benzo(a)pyrene TEQ calc (Zero)	mg/kg	0.5	<0.5		
	Benzo(a)pyrene TEQ calc (Half)	mg/kg	0.5	0.6		
	Benzo(a)pyrene TEQ (LOR)	mg/kg	0.5	1.2		
	Benzo(g,h,i)perylene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE-

SDG	ALSE-Sydney 13-Feb-19	ENVIROLAB 2019-02-14T00:00:00	
Field ID	BH30@2.7	TRIP@2.7	RPD
Sampled Date/Time	11-02-19	11-02-19	

	Benzo(b+j+k)fluoranthene	mg/kg	1 : 0.2 (Interlab)	<1	<1	0
	Chrysene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Dibenz(a,h)anthracene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Fluoranthene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Fluorene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Indeno(1,2,3-c,d)pyrene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Naphthalene	mg/kg	1 : 0.5 (Interlab)	<1	<0.5	0
	Naphthalene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Phenanthrene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	Pyrene	mg/kg	0.5 : 0.1 (Interlab)	<0.5	<0.5	0
	PAHs (Sum of total)	mg/kg	0.5	<0.5		
Phenols	2,4,5-trichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2,4,6-trichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2,4-dichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2,4-dimethylphenol	mg/kg	0.5	<0.5	<0.5	0
	2,6-dichlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2-chlorophenol	mg/kg	0.5	<0.5	<0.5	0
	2-nitrophenol	mg/kg	0.5	<0.5	<0.5	0
	2-methylphenol	mg/kg	0.5	<0.5	<0.5	0
	3&4-Methylphenol (m&p-cresol)	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	4-chloro-3-methylphenol	mg/kg	0.5 : 5 (Interlab)	<0.5	<5	0
	Pentachlorophenol	mg/kg	1 : 5 (Interlab)	<1	<5	0
	Phenol	mg/kg	0.5	<0.5	<0.5	0
PCBs	PCBs (Sum of total)	mg/kg	0.1	<0.1	<0.1	0
Chlorinated Hydrocarbons	1,1,2,2-tetrachloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,1,1,2-tetrachloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,1,2-trichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,1,1-trichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,1-dichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,1-dichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,1-dichloropropene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,2,3-trichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,2-dibromo-3-chloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,2-dichloroethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,2-dichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,3-dichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	2,2-dichloropropane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Bromodichloromethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Bromoform	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Carbon tetrachloride	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Chlorodibromomethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Chloroethane	mg/kg	5 : 1 (Interlab)	<5	<1	0
	Chloroform	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Chloromethane	mg/kg	5 : 1 (Interlab)	<5	<1	0
	cis-1,2-dichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	cis-1,3-dichloropropene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Dibromomethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Hexachlorocyclopentadiene	mg/kg	2.5 : 2 (Interlab)	<2.5	<2	0
	Hexachloroethane	mg/kg	0.5	<0.5	<0.5	0
	Hexachlorobutadiene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	Trichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Tetrachloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	trans-1,2-dichloroethene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	trans-1,3-dichloropropene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Vinyl chloride	mg/kg	5 : 1 (Interlab)	<5	<1	0
Organochlorine Pesticides	a-BHC	µg/kg	500 : 100 (Interlab)			
	a-BHC	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Aldrin	µg/kg	500 : 100 (Interlab)			
	Aldrin	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Dieldrin	µg/kg	500 : 100 (Interlab)			
	Dieldrin	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Aldrin + Dieldrin	mg/kg	0.05	<0.05		
	b-BHC	µg/kg	500 : 100 (Interlab)			
	b-BHC	µg/kg	50 : 500 (Interlab)	<50	<100	0
	chlordane	µg/kg	50	<50		
	Chlordane (cis)	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Chlordane (trans)	µg/kg	50 : 500 (Interlab)	<50	<100	0
	d-BHC	µg/kg	500 : 100 (Interlab)			
	d-BHC	µg/kg	50 : 500 (Interlab)	<50	<100	0
	DDD	µg/kg	500 : 100 (Interlab)			
	DDD	µg/kg	50 : 500 (Interlab)	<50	<100	0
	4,4-DDE	µg/kg	500 : 100 (Interlab)			
	4,4-DDE	µg/kg	50 : 500 (Interlab)	<50	<100	0
	DDT	µg/kg	200 : 500 (Interlab)	<200	<100	0
	DDT	µg/kg	1000 : 500 (Interlab)			
	DDT+DDE+DDD	µg/kg	50 : 100 (Interlab)	<50	<100	0
	Endosulfan	µg/kg	50	<50		
	Endrin ketone	µg/kg	50 : 500 (Interlab)	<50	<500	0
	Endosulfan I	µg/kg	500 : 100 (Interlab)			

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE-

SDG	ALSE-Sydney 13-Feb-19	ENVIROLAB 2019-02-14T00:00:00	
Field ID	BH30@2.7	TRIP@2.7	RPD
Sampled Date/Time	11-02-19	11-02-19	

	Endosulfan I	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Endosulfan II	µg/kg	500 : 100 (Interlab)			
	Endosulfan II	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Endosulfan sulphate	µg/kg	500 : 100 (Interlab)			
	Endosulfan sulphate	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Endrin	µg/kg	500 : 100 (Interlab)			
	Endrin	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Endrin aldehyde	µg/kg	50 : 500 (Interlab)	<50	<100	0
	g-BHC (Lindane)	µg/kg	500 : 100 (Interlab)			
	g-BHC (Lindane)	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Heptachlor	µg/kg	500 : 100 (Interlab)			
	Heptachlor	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Heptachlor epoxide	µg/kg	500 : 100 (Interlab)			
	Heptachlor epoxide	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Methoxychlor	µg/kg	200 : 1000 (Interlab)	<200	<100	0
Organophosphorous Pesticides	Azinophos methyl	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Bromophos-ethyl	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Carbophenothion	mg/kg	0.05	<0.05		
	Chlorfenvinphos	mg/kg	0.5			
	Chlorfenvinphos	mg/kg	0.05	<0.05		
	Chlorpyrifos	mg/kg	0.5 : 0.1 (Interlab)			
	Chlorpyrifos	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Chlorpyrifos-methyl	mg/kg	0.5 : 0.1 (Interlab)			
	Chlorpyrifos-methyl	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Demeton-S-methyl	mg/kg	0.05	<0.05		
	Diazinon	mg/kg	0.5 : 0.1 (Interlab)			
	Diazinon	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Dichlorvos	mg/kg	0.5 : 0.1 (Interlab)			
	Dichlorvos	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Dimethoate	mg/kg	0.5 : 0.1 (Interlab)			
	Dimethoate	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Ethion	mg/kg	0.5 : 0.1 (Interlab)			
	Ethion	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Fenamiphos	mg/kg	0.05	<0.05		
	Fenthion	mg/kg	0.5			
	Fenthion	mg/kg	0.05	<0.05		
	Malathion	mg/kg	0.5 : 0.1 (Interlab)			
	Malathion	mg/kg	0.05 : 0.1 (Interlab)	<0.05	<0.1	0
	Methyl parathion	mg/kg	0.2	<0.2		
	Monocrotophos	mg/kg	0.2	<0.2		
	Parathion	mg/kg	0.2 : 0.1 (Interlab)	<0.2	<0.1	0
	Pirimphos-ethyl	mg/kg	0.5			
	Pirimphos-ethyl	mg/kg	0.05	<0.05		
	Prothiofos	mg/kg	0.5			
	Prothiofos	mg/kg	0.05	<0.05		
Pesticides	Chlorobenzilate	mg/kg	0.5	<0.5		
	Carbazole	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
Herbicides	Pronamide	mg/kg	0.5	<0.5		
Halogenated Hydrocarbons	1,2-dibromoethane	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	cis-1,4-Dichloro-2-butene	mg/kg	0.5	<0.5		
	trans-1,4-Dichloro-2-butene	mg/kg	0.5	<0.5		
	Pentachloroethane	mg/kg	0.5	<0.5	<0.5	0
	Bromomethane	mg/kg	5 : 1 (Interlab)	<5	<1	0
	Dichlorodifluoromethane	mg/kg	5 : 1 (Interlab)	<5	<1	0
	Iodomethane	mg/kg	0.5	<0.5		
	Trichlorofluoromethane	mg/kg	5 : 1 (Interlab)	<5	<1	0
Halogenated Benzenes	1,2,3-trichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	1,2,4-trichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,2-dichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,3-dichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	1,4-dichlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<0.5	0
	2-chlorotoluene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	4-chlorotoluene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Bromobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Chlorobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Hexachlorobenzene	µg/kg	50 : 500 (Interlab)	<50	<100	0
	Hexachlorobenzene	µg/kg	1000 : 500 (Interlab)	<1000	<100	0
	Pentachlorobenzene	mg/kg	0.5	<0.5	<0.5	0
Explosives	1,3,5-Trinitrobenzene	mg/kg	0.5	<0.5		
	2,4-Dinitrotoluene	mg/kg	1	<1		
	2,6-dinitrotoluene	mg/kg	1	<1	<1	0
	Nitrobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
Phthalates	Bis(2-ethylhexyl) phthalate	mg/kg	5 : 1 (Interlab)	<5	<1	0
	Butyl benzyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Diethylphthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Dimethyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0

Field Duplicates (soil)
Filter: SDG in('ALSE-Sydney 13-Feb-19','ALSE-Sydney 19-Dec-18','ALSE

			SDG	ALSE-Sydney 13-Feb-19	ENVIROLAB 2019-02-14T00:00:00	
			Field ID	BH30@2.7	TRIP@2.7	**RPD**
			Sampled Date/Time	11-02-19	11-02-19	
	Di-n-butyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Di-n-octyl phthalate	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
Amino Aliphatics	N-nitrosodiethylamine	mg/kg	0.5	<0.5		
	N-nitrosodi-n-butylamine	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	N-nitrosodi-n-propylamine	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	N-Nitrosomethylethylamine	mg/kg	0.5	<0.5		
Amino Aromatics	1-naphthylamine	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	N-Nitrosodiphenyl & Diphenylamine	mg/kg	1	<1		
Anilines	2-nitroaniline	mg/kg	1	<1	<1	0
	3-nitroaniline	mg/kg	1	<1	<1	0
	4-chloroaniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	4-nitroaniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	2-methyl-5-nitroaniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Aniline	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
Nitroaromatics	2-Picoline	mg/kg	0.5	<0.5		
	4-aminobiphenyl	mg/kg	0.5	<0.5		
	Pentachloronitrobenzene	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
Solvents	Methyl Ethyl Ketone	mg/kg	5	<5		
	2-hexanone (MBK)	mg/kg	5	<5		
	4-Methyl-2-pentanone	mg/kg	5	<5		
	Carbon disulfide	mg/kg	0.5	<0.5		
	Isophorone	mg/kg	0.5 : 1 (Interlab)	<0.5	<1	0
	Vinyl acetate	mg/kg	5	<5		

*RPDs have only been considered where a concentration is greater than 1 times the EQL.
**High RPDs are in bold (Acceptable RPDs for each EQL multiplier range are: 80 (1-10 x EQL); 50 (10-30 x
***Interlab Duplicates are matched on a per compound basis as methods vary between laboratories. Any n

Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020
10026439

ARCADIS Design & Consultancy for natural and built assets

				Asbestos Identification in Soil		PAH/Phenols	SVOCs																	Asbestos								
							pH (F)	Weight Used for % Calculation	Net Acid Soluble Sulfur (in acid units)	Organic Fibre	Synthetic Mineral Fibre	Acetophenone	2-(acetylamino) fluorene	3,3-Dichlorobenzidine	4-(dimethylamino) azobenzene	4-bromophenyl phenyl ether	4-chlorophenyl phenyl ether	4-Nitroquinoline-N-oxide	Azobenzene	Bis(2-chloroethoxy) methane	Bis(2-chloroethyl)ether	Dibenzofuran	Hexachloropropene	Methapyrilene	N-nitrosomorpholine	N-nitrosopiperidine	N-nitrosopyrrolidine	Phenacetin	Weight of sample	Asbestos (Trace)	Asbestos fibres	Asbestos Type	Description	Approved Identifier:	Asbestos (Fines and Fibrous <7mm)	Asbestos (Fines and Fibrous FA+AF)	Asbestos Containing Material (as 15% Asbestos in A
							pH Unit	kg	mole H+/t	g/kg	g/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	g	Fibres	-	-	--	--	g	% (w/w)	% (w/w)
EQL							0.1	0.0001	10	0.1	0.1	0.5	0.5	0.5	0.5	0.5	0.5	0.5	1	0.5	0.5	0.5	0.5	0.5	0.5	0.5	1	0.5	0.01	5	0.1				0.0004	0.001	0.01
PFAS NEMP 2018 Table 2 Health Industrial/Commercial																																					
PFAS NEMP 2018 Table 3 Interim EIE Commercial/Industrial																																					
NEPM 2013 Table 7 Asbestos HSL																																				0.001	
NEPM 2013 Table 1A(1) HILs Comm/Ind D Soil																																					
NEPM 2013 Table 1A(3) Comm/Ind D Soil HSL for Vapour Intrusion, Sand																																					
0-1m																																					
1-2m																																					
2-4m																																					
>4m																																					
NEPM 2013 Table 1B(6) ESLs for Comm/Ind, Coarse Soil																																					
0-2m																																					
NEPM 2013 Table 1B(7) Management Limits Comm / Ind, Coarse Soil																																					
Location_Code	Sample_Depth_Range	Sampled_Date_Time	Lab_Report_Number																																		
BH01@0.50		12-Dec-18	ES1838116	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	24.3	1	0	1	1	1	-	-	-
BH01@2.00		12-Dec-18	ES1838116	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	-	-	-	-	-	-	-	-	-
BH02@1.00		12-Dec-18	ES1838116	-	0.296	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	296	-	0	1	1	1	<0.0004	<0.001	<0.01
BH02@2.50		12-Dec-18	ES1838116	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	-	-	-	-	-	-	-	-	-
BH03@1.00		12-Dec-18	ES1838118	-	0.149	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	149	1	0	1	1	1	<0.0004	<0.001	<0.01
BH03@2.00		12-Dec-18	ES1838116	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	-	-	-	-	-	-	-	-	-
BH04@0.20		12-Dec-18	ES1838118	-	0.542	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	542	1	0	1	1	1	<0.0004	<0.001	<0.01
BH05@1.00		12-Dec-18	ES1838118	-	0.214	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	214	1	0	1	1	1	<0.0004	<0.001	<0.01
BH06@0.50		14-Dec-18	ES1838116	-	0.263	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	263	-	0	1	1	1	<0.0004	<0.001	<0.01
BH06@2.40		14-Dec-18	ES1838116	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	-	-	-	-	-	-	-	-	-
BH07@0.20		14-Dec-18	ES1838118	-	0.245	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	245	1	0	1	1	1	<0.0004	<0.001	<0.01
BH08@1.00		14-Dec-18	ES1838116	-	0.282	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	282	-	0	1	1	1	<0.0004	<0.001	<0.01
BH08@3.00		14-Dec-18	ES1838116	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	-	-	-	-	-	-	-	-	-
BH09@1 .50		14-Dec-18	ES1838116	-	0.263	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	263	-	0	1	1	1	<0.0004	<0.001	<0.01
BH09@3.00		14-Dec-18	ES1838116	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	-	-	-	-	-	-	-	-	-
BH10@.020		14-Dec-18	ES1838116	-	0.177	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	177	-	0	1	1	1	<0.0004	<0.001	<0.01
BH10@4.00		14-Dec-18	ES1838116	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	-	-	-	-	-	-	-	-	-
BH11@1 .00		14-Dec-18	ES1838116	-	0.175	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	175	-	0	1	1	1	<0.0004	<0.001	<0.01
BH11@3.00		14-Dec-18	ES1838116	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	-	-	-	-	-	-	-	-	-
BH12@1.00		13-Dec-18	ES1838116	-	0.241	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	241	-	0	1	1	1	<0.0004	<0.001	<0.01
BH13@1.50		14-Dec-18	ES1838118	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	5.77	1	0	1	1	1	-	-	-
BH14@0.80		14-Dec-18	ES1838118	-	0.224	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	224	1	0	1	1	1	<0.0004	<0.001	<0.01
BH14@2.00		14-Dec-18	ES1838118	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	-	-	-	-	-	-	-	-	-
BH15@1.50		13-Dec-18	ES1838116	-	0.242	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	242	-	0	1	1	1	<0.0004	<0.001	<0.01
BH16@0.50		14-Dec-18	ES1838116	-	0.199	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	199	-	0	1	1	1	<0.0004	<0.001	<0.01
BH16@3.00		14-Dec-18	ES1838116	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	-	-	-	-	-	-	-	-	-
BH17@1.50		14-Dec-18	ES1838116	-	0.21	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	4.7	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	210	-	0	1	1	1	<0.0004	<0.001	<0.01
BH18@1.00		14-Dec-18	ES1838116	-	0.102	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	102	-	0	1	1	1	<0.0004	<0.001	<0.01
BH18@3.00		14-Dec-18	ES1838116	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	-	-	-	-	-	-	-	-	-
BH19@0.40		13-Dec-18	ES1838116	-	0.137	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	2	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	137	-	0	1	1	1	<0.0004	<0.001	<0.01
BH19@4.00		13-Dec-18	ES1838118	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	-	-	-	-	-	-	-	-	-
BH21@1.00		14-Dec-18	ES1838118	-	0.243	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	243	1	0	1	1	1	<0.0004	<0.001	<0.01
BH21@3.00		14-Dec-18	ES1838118	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	-	-	-	-	-	-	-	-	-
BH22@1.00		12-Dec-18	ES1838118	-	0.284	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	284	1	0	1	1	1	<0.0004	<0.001	<0.01
BH23@1.00		13-Dec-18	ES1838118	-	0.292	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	292	1	0	1	1	1	<0.0004	<0.001	<0.01
BH23@2.00		13-Dec-18	ES1838118	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH23@3.00		13-Dec-18	ES1838118	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	-	-	-	-	-	-	-	-	-
BH24@1.50		13-Dec-18	ES1838116	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	37.5	1	0	1	1	1	-	-	-
BH24@4.50		13-Dec-18	ES1838116	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	-	-	-	-	-	-	-	-	-
BH25@1.00		12-Dec-18	ES1838118	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	27.1	1	0	1	1	1	-	-	-
BH26@1 .00		13-Dec-18	ES1838118	-	0.34	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	340	1	0	1	1	1	<0.0004	<0.001	<0.01
BH26@3.00		13-Dec-18	ES1838118	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	-	-	-	-	-	-	-	-	-

Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020
10026439

ARCADIS Design & Consultancy for natural and built assets

				Asbestos Identification in Soil		PAH/Phenols	SVOCs																Asbestos								
			pH (F)	Weight Used for % Calculation	Net Acid Soluble Sulfur (in acid units)	Organic Fibre	Synthetic Mineral Fibre	Acetophenone	2-(acetylamino) fluorene	3,3-Dichlorobenzidine	4-(dimethylamino) azobenzene	4-bromophenyl phenyl ether	4-chlorophenyl phenyl ether	4-Nitroquinoline-N-oxide	Azobenzene	Bis(2-chloroethoxy) methane	Bis(2-chloroethyl)ether	Dibenzofuran	Hexachloropropene	Methapyrilene	N-nitrosomorpholine	N-nitrosopiperidine	N-nitrosopyrrolidine	Phenacetin	Weight of sample	Asbestos (Trace)	Asbestos fibres	Asbestos Type	Description	Approved Identifier:	Asbestos (Fines and Fibrous <7mm)	Asbestos (Fines and Fibrous FA+AF)	Asbestos Containing Material (as 15% Asbestos in A
			pH Unit	kg	mole H+/t	g/kg	g/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	g	Fibres	-	-	--	--	g	% (w/w)	% (w/w)
EQL			0.1	0.0001	10	0.1	0.1	0.5	0.5	0.5	0.5	0.5	0.5	0.5	1	0.5	0.5	0.5	0.5	0.5	0.5	0.5	1	0.5	0.01	5	0.1				0.0004	0.001	0.01
PFAS NEMP 2018 Table 2 Health Industrial/Commercial																																	
PFAS NEMP 2018 Table 3 Interim EIE Commercial/Industrial																																	
NEPM 2013 Table 7 Asbestos HSL																																0.001	
NEPM 2013 Table 1A(1) HILs Comm/Ind D Soil																																	
NEPM 2013 Table 1A(3) Comm/Ind D Soil HSL for Vapour Intrusion, Sand																																	
0-1m																																	
1-2m																																	
2-4m																																	
>4m																																	
NEPM 2013 Table 1B(6) ESLs for Comm/Ind, Coarse Soil																																	
0-2m																																	
NEPM 2013 Table 1B(7) Management Limits Comm / Ind, Coarse Soil																																	
Location_Code	**Sample_Depth_Range**	**Sampled_Date_Time**	**Lab_Report_Number**																														
BH27@0.50		13-Dec-18	ES1838118	-	0.395	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	395	1	0	1	1	1	<0.0004	<0.001	<0.01
BH28@0.50		13-Dec-18	ES1838118	-	0.184	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	184	1	0	1	1	1	<0.0004	<0.001	<0.01
BH28@3.00		13-Dec-18	ES1838118	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	-	-	-	-	-	-	-	-	-
BH29@0.4		11-Feb-19	ES1904527	-	0.0398	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	1.7	<0.5	<0.5	<0.5	<0.5	<1	<0.5	39.8	1	0	1	1	1	<0.0004	<0.001	<0.01
BH30@0.8		11-Feb-19	ES1904527	-	0.113	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	113	1	0	1	1	1	<0.0004	<0.001	<0.01
BH30@2.7		11-Feb-19	ES1904527	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	-	-	-	-	-	-	-	-	-
BH31@0.2		11-Feb-19	ES1904527	-	0.0448	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	44.8	1	0	1	1	1	<0.0004	<0.001	<0.01
BH31@2.3		11-Feb-19	ES1904527	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	-	-	-	-	-	-	-	-	-
BH32@1		11-Feb-19	ES1904527	-	0.0683	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	68.3	1	0	1	1	1	<0.0004	<0.001	<0.01
BH32@1.9		11-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH33@0.5		11-Feb-19	ES1904527	-	0.0596	-	-	-	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	59.6	1	0	1	1	1	<0.0004	<0.001	<0.01
BH33@2.5		11-Feb-19	ES1904527	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	-	-	-	-	-	-	-	-	-
BH34@0.3		12-Feb-19	ES1904527	-	0.0701	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	70.1	1	0	1	1	1	<0.0004	<0.001	<0.01
BH34@3		12-Feb-19	ES1904527	-	-	-	-	-	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	-	-	-	-	-	-	-	-	-
BH35@0.7		12-Feb-19	ES1904527	-	0.0481	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	48.1	1	0	1	1	1	<0.0004	<0.001	<0.01
BH36@1		12-Feb-19	ES1904527	-	0.0676	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	67.6	1	0	1	1	1	<0.0004	<0.001	<0.01
BH36@1.5		12-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH36@2.1		12-Feb-19	ES1904527	-	-	-	-	-	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	-	-	-	-	-	-	-	-	-
BH37@1.1		12-Feb-19	ES1904527	-	0.0209	-	-	-	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	20.9	1	0	1	1	1	<0.0004	<0.001	<0.01
BH37@1.5		12-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH37@2.7		12-Feb-19	ES1904527	-	-	-	-	-	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	-	-	-	-	-	-	-	-	-
BH38@0.3		12-Feb-19	ES1904527	-	0.0786	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	78.6	1	0	1	1	1	<0.0004	<0.001	<0.01
BH38@1.6		12-Feb-19	ES1904527	-	-	-	0	0	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	31.2	1	0	1	1	1	-	-	-
BH39@0.3		12-Feb-19	ES1904527	-	0.128	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	128	1	0	1	1	1	<0.0004	<0.001	<0.01
BH39@2.5		12-Feb-19	ES1904527	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	-	-	-	-	-	-	-	-	-
BH40@0.3		12-Feb-19	ES1904527	-	0.0888	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	88.8	1	0	1	1	1	<0.0004	<0.001	<0.01
BH41@2		12-Feb-19	ES1904527	-	0.0452	-	-	-	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	45.2	1	0	1	1	1	<0.0004	<0.001	<0.01
BH41@2.4		12-Feb-19	ES1904527	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	-	-	-	-	-	-	-	-	-
BH42@1.5		12-Feb-19	ES1904527	-	0.0508	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	50.8	1	0	1	1	1	<0.0004	<0.001	<0.01
BH44 - PACM		11-Feb-19	ES1904527	-	-	-	0	0	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.29	-	1	1	1	1	-	-	-
BH44@0.3		11-Feb-19	ES1904527	-	0.0673	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	67.3	1	0	1	1	1	<0.0004	<0.001	<0.01
BH44@1		11-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH44@1.3		11-Feb-19	ES1904527	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	2.8	<0.5	<0.5	<0.5	<0.5	<1	<0.5	-	-	-	-	-	-	-	-	-
BH45@0.7		11-Feb-19	ES1904527	-	0.0964	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	96.4	1	0	1	1	1	<0.0004	<0.001	<0.01
BH45@2.2		11-Feb-19	ES1904527	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	-	-	-	-	-	-	-	-	-
BH46@0.3		12-Feb-19	ES1904527	-	0.068	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	68	1	0	1	1	1	<0.0004	<0.001	<0.01
BH47@1.3		11-Feb-19	ES1904527	-	-	-	0	0	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	25	1	0	1	1	1	-	-	-
BH47@2.4		11-Feb-19	ES1904527	-	-	-	-	-	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	-	-	-	-	-	-	-	-	-
BH48@0.1		12-Feb-19	ES1904527	-	0.0176	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	17.6	1	0	1	1	1	<0.0004	<0.001	<0.01
BH49@0.9		11-Feb-19	ES1904527	-	0.023	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	23	1	0	1	1	1	<0.0004	<0.001	<0.01
BH49@2.5		11-Feb-19	ES1904527	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	-	-	-	-	-	-	-	-	-
MW01@1.00		12-Dec-18	ES1838118	-	0.182	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	182	1	0	1	1	1	<0.0004	<0.001	<0.01

Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020
10026439

				Asbestos Identification in Soil		PAH/Phenols	SVOCs																	Asbestos								
	pH (F)	Weight Used for % Calculation	Net Acid Soluble Sulfur (in acid units)	Organic Fibre	Synthetic Mineral Fibre	Acetophenone	2-(acetylamino) fluorene	3,3-Dichlorobenzidine	4-(dimethylamino) azobenzene	4-bromophenyl phenyl ether	4-chlorophenyl phenyl ether	4-Nitroquinoline-N-oxide	Azobenzene	Bis(2-chloroethoxy) methane	Bis(2-chloroethyl)ether	Dibenzofuran	Hexachloropropene	Methapyrilene	N-nitrosomorpholine	N-nitrosopiperidine	N-nitrosopyrrolidine	Phenacetin	Weight of sample	Asbestos (Trace)	Asbestos fibres	Asbestos Type	Description	Approved Identifier:	Asbestos (Fines and Fibrous <7mm)	Asbestos (Fines and Fibrous FA+AF)	Asbestos Containing Material (as 15% Asbestos in A
	pH Unit	kg	mole H+/t	g/kg	g/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	g	Fibres	-	-	--	--	g	% (w/w)	% (w/w)
EQL	0.1	0.0001	10	0.1	0.1	0.5	0.5	0.5	0.5	0.5	0.5	0.5	1	0.5	0.5	0.5	0.5	0.5	0.5	0.5	1	0.5	0.01	5	0.1				0.0004	0.001	0.01
PFAS NEMP 2018 Table 2 Health Industrial/Commercial																															
PFAS NEMP 2018 Table 3 Interim EIE Commercial/Industrial																															
NEPM 2013 Table 7 Asbestos HSL																														0.001	
NEPM 2013 Table 1A(1) HILs Comm/Ind D Soil																															
NEPM 2013 Table 1A(3) Comm/Ind D Soil HSL for Vapour Intrusion, Sand																															
0-1m																															
1-2m																															
2-4m																															
>4m																															
NEPM 2013 Table 1B(6) ESLs for Comm/Ind, Coarse Soil																															
0-2m																															
NEPM 2013 Table 1B(7) Management Limits Comm / Ind, Coarse Soil																															
Location_Code	**Sample_Depth_Range**	**Sampled_Date_Time**	**Lab_Report_Number**																													
MW01@4.00		12-Dec-18	ES1838118	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	-	-	-	-	-	-	-	-
MW02@1.00		12-Dec-18	ES1838116	-	0.306	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	306	-	0	1	1	1	<0.0004	<0.001	<0.01
MW02@6.00		12-Dec-18	ES1838116	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	-	-	-	-	-	-	-	-	-
MW03@1.00		19-Dec-18	ES1838498	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	370	1	0	1	1	1	-	-	-
MW04@0.50		19-Dec-18	ES1838498	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	506	1	1	1	1	1	-	-	-
MW04@3.00		19-Dec-18	ES1838498	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	-	-	-	-	-	-	-	-	-
MW05@1.00		19-Dec-18	ES1838498	-	0.406	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	406	1	1	1	1	1	0.147	0.036	<0.01
MW05@3.00		19-Dec-18	ES1838498	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	-	-	-	-	-	-	-	-	-
MW06@1.50		13-Dec-18	ES1838116	-	0.339	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	339	-	0	1	1	1	<0.0004	<0.001	<0.01
MW06@4.50		13-Dec-18	ES1838116	-	-	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	-	-	-	-	-	-	-	-	-
MW07@1.00		19-Dec-18	ES1838498	-	0.338	-	-	-	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<0.5	338	1	0	1	1	1	<0.0004	<0.001	<0.01
Near BH48 - ACM		12-Feb-19	ES1904527	-	-	-	0	0	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	46.1	-	1	1	1	1	-	-	-

Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020
10026439

					Inorganics	PFOS/PFOA																										
						Fibrous Asbestos >7mm	Moisture Content	4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	N-Methyl perfluorooctane sulfonamide (NMeFOSA)	N-Methylperfluorooctanesulfonamidoethanol (N-MeFOSE)	N-methylperfluorooctane sulfonamidoacetic acid (NMeFOSAA)	N-Ethyl perfluorooctane sulfonamide (NEtFOSA)	N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	N-ethyl-perfluorooctanesulfonamidoacetic acid (NEtFOSAA)	Perfluorodecanesulfonic acid (PFDS)	Perfluorooctanesulfonic acid (PFOS)	Perfluorooctanoic acid (PFOA)	Perfluorohexane sulfonic acid (PFHxS)	Perfluoropentane sulfonic acid (PFPeS)	Perfluoropentanoic acid (PFPeA)	Perfluoroheptane sulfonic acid (PFHpS)	Perfluorobutanoic acid (PFBA)	Perfluorodecanoic acid (PFDA)	Perfluorobutane sulfonic acid (PFBS)	Perfluorododecanoic acid (PFDoDA)	Perfluoroheptanoic acid (PFHpA)	Perfluorononanoic acid (PFNA)	Perfluorohexanoic acid (PFHxA)	Perfluorooctane sulfonamide (PFOSA)
						g	%	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg
EQL						0.0004	0.1	0.0005	0.0005	0.0005	0.0005	0.0005	0.0005	0.0002	0.0005	0.0005	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.001	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002
PFAS NEMP 2018 Table 2 Health Industrial/Commercial																		50														
PFAS NEMP 2018 Table 3 Interim EIE Commercial/Industrial																	0.14															
NEPM 2013 Table 7 Asbestos HSL																																
NEPM 2013 Table 1A(1) HILs Comm/Ind D Soil																																
NEPM 2013 Table 1A(3) Comm/Ind D Soil HSL for Vapour Intrusion, Sand																																
0-1m																																
1-2m																																
2-4m																																
>4m																																
NEPM 2013 Table 1B(6) ESLs for Comm/Ind, Coarse Soil																																
0-2m																																
NEPM 2013 Table 1B(7) Management Limits Comm / Ind, Coarse Soil																																
Location_Code	**Sample_Depth_Range**	**Sampled_Date_Time**	**Lab_Report_Number**																													
BH01@0.50		12-Dec-18	ES1838116	-	8.8	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH01@2.00		12-Dec-18	ES1838116	-	31	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH02@1.00		12-Dec-18	ES1838116	-	12.4	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH02@2.50		12-Dec-18	ES1838116	-	25.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH03@1.00		12-Dec-18	ES1838118	-	25.4	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH03@2.00		12-Dec-18	ES1838116	-	20.9	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH04@0.20		12-Dec-18	ES1838118	-	8.7	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH05@1.00		12-Dec-18	ES1838118	-	11.3	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH06@0.50		14-Dec-18	ES1838116	-	9.4	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0002	0.0005	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
BH06@2.40		14-Dec-18	ES1838116	-	12.2	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH07@0.20		14-Dec-18	ES1838118	-	10.4	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH08@1.00		14-Dec-18	ES1838116	-	11.2	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH08@3.00		14-Dec-18	ES1838116	-	22.2	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH09@1 .50		14-Dec-18	ES1838116	-	8.3	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH09@3.00		14-Dec-18	ES1838116	-	17.6	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH10@.020		14-Dec-18	ES1838116	-	5.4	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH10@4.00		14-Dec-18	ES1838116	-	31.7	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH11@1 .00		14-Dec-18	ES1838116	-	32.6	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH11@3.00		14-Dec-18	ES1838116	-	34.6	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0002	0.0007	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
BH12@1.00		13-Dec-18	ES1838116	-	18.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH13@1.50		14-Dec-18	ES1838118	-	41.8	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH14@0.80		14-Dec-18	ES1838118	-	6	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0002	0.0003	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
BH14@2.00		14-Dec-18	ES1838118	-	12.7	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH15@1.50		13-Dec-18	ES1838116	-	6.9	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH16@0.50		14-Dec-18	ES1838116	-	4.6	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH16@3.00		14-Dec-18	ES1838116	-	21.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH17@1.50		14-Dec-18	ES1838116	-	13	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH18@1.00		14-Dec-18	ES1838116	-	39.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH18@3.00		14-Dec-18	ES1838116	-	23	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH19@0.40		13-Dec-18	ES1838116	-	5.7	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0002	0.0003	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
BH19@4.00		13-Dec-18	ES1838118	-	16.5	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH21@1.00		14-Dec-18	ES1838118	-	5.2	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH21@3.00		14-Dec-18	ES1838118	-	20.5	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH22@1.00		12-Dec-18	ES1838118	-	12.7	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH23@1.00		13-Dec-18	ES1838118	-	8.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH23@2.00		13-Dec-18	ES1838118	-	1.7	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0002	0.0003	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
BH23@3.00		13-Dec-18	ES1838118	-	7.8	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH24@1.50		13-Dec-18	ES1838116	-	1.4	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH24@4.50		13-Dec-18	ES1838116	-	18.8	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH25@1.00		12-Dec-18	ES1838118	-	5	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH26@1 .00		13-Dec-18	ES1838118	-	20.3	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH26@3.00		13-Dec-18	ES1838118	-	10.5	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020
10026439

		Inorganics	PFOS/PFOA																										
	Fibrous Asbestos >7mm	Moisture Content	4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	N-Methyl perfluorooctane sulfonamide (NMeFOSA)	N-Methylperfluorooctanesulfonamidoethanol (N-MeFOSE)	N-methylperfluorooctane sulfonamidoacetic acid (NMeFOSAA)	N-Ethyl perfluorooctane sulfonamide (NEtFOSA)	N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	N-ethyl-perfluorooctanesulfonamidoacetic acid (NEtFOSAA)	Perfluorodecanesulfonic acid (PFDS)	Perfluorooctanesulfonic acid (PFOS)	Perfluorooctanoic acid (PFOA)	Perfluorohexane sulfonic acid (PFHxS)	Perfluoropentane sulfonic acid (PFPeS)	Perfluoropentanoic acid (PFPeA)	Perfluoroheptane sulfonic acid (PFHpS)	Perfluorobutanoic acid (PFBA)	Perfluorodecanoic acid (PFDA)	Perfluorobutane sulfonic acid (PFBS)	Perfluorododecanoic acid (PFDoDA)	Perfluoroheptanoic acid (PFHpA)	Perfluorononanoic acid (PFNA)	Perfluorohexanoic acid (PFHxA)	Perfluorooctane sulfonamide (PFOSA)
	g	%	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg
EQL	0.0004	0.1	0.0005	0.0005	0.0005	0.0005	0.0005	0.0005	0.0002	0.0005	0.0005	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.001	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002
PFAS NEMP 2018 Table 2 Health Industrial/Commercial															50														
PFAS NEMP 2018 Table 3 Interim EIE Commercial/Industrial														0.14															
NEPM 2013 Table 7 Asbestos HSL																													
NEPM 2013 Table 1A(1) HILs Comm/Ind D Soil																													
NEPM 2013 Table 1A(3) Comm/Ind D Soil HSL for Vapour Intrusion, Sand																													
0-1m																													
1-2m																													
2-4m																													
>4m																													
NEPM 2013 Table 1B(6) ESLs for Comm/Ind, Coarse Soil																													
0-2m																													
NEPM 2013 Table 1B(7) Management Limits Comm / Ind, Coarse Soil																													

Location_Code	Sample_Depth_Range	Sampled_Date_Time	Lab_Report_Number																											
BH27@0.50		13-Dec-18	ES1838118	-	2.6	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH28@0.50		13-Dec-18	ES1838118	-	4	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH28@3.00		13-Dec-18	ES1838118	-	19.4	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0002	0.0003	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
BH29@0.4		11-Feb-19	ES1904527	<0.0004	7.8	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH30@0.8		11-Feb-19	ES1904527	<0.0004	9.5	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH30@2.7		11-Feb-19	ES1904527	-	17.5	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH31@0.2		11-Feb-19	ES1904527	<0.0004	8.3	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH31@2.3		11-Feb-19	ES1904527	-	9.6	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH32@1		11-Feb-19	ES1904527	<0.0004	14.4	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH32@1.9		11-Feb-19	ES1904527	-	10.4	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
BH33@0.5		11-Feb-19	ES1904527	<0.0004	32.7	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH33@2.5		11-Feb-19	ES1904527	-	18.6	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH34@0.3		12-Feb-19	ES1904527	<0.0004	9.2	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH34@3		12-Feb-19	ES1904527	-	25.2	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH35@0.7		12-Feb-19	ES1904527	<0.0004	15.3	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH36@1		12-Feb-19	ES1904527	<0.0004	13.4	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH36@1.5		12-Feb-19	ES1904527	-	24	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
BH36@2.1		12-Feb-19	ES1904527	-	16.3	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH37@1.1		12-Feb-19	ES1904527	<0.0004	25.5	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH37@1.5		12-Feb-19	ES1904527	-	36.9	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
BH37@2.7		12-Feb-19	ES1904527	-	25.9	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH38@0.3		12-Feb-19	ES1904527	<0.0004	8.7	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH38@1.6		12-Feb-19	ES1904527	-	21.2	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
BH39@0.3		12-Feb-19	ES1904527	<0.0004	11.8	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH39@2.5		12-Feb-19	ES1904527	-	13.5	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH40@0.3		12-Feb-19	ES1904527	<0.0004	9.4	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH41@2		12-Feb-19	ES1904527	<0.0004	26.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH41@2.4		12-Feb-19	ES1904527	-	15.4	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH42@1.5		12-Feb-19	ES1904527	<0.0004	24.5	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH44 - PACM		11-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH44@0.3		11-Feb-19	ES1904527	<0.0004	12	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH44@1		11-Feb-19	ES1904527	-	8	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
BH44@1.3		11-Feb-19	ES1904527	-	10.8	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH45@0.7		11-Feb-19	ES1904527	<0.0004	9.7	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH45@2.2		11-Feb-19	ES1904527	-	5.7	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH46@0.3		12-Feb-19	ES1904527	<0.0004	6	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH47@1.3		11-Feb-19	ES1904527	-	16.5	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH47@2.4		11-Feb-19	ES1904527	-	10.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH48@0.1		12-Feb-19	ES1904527	<0.0004	15.7	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH49@0.9		11-Feb-19	ES1904527	<0.0004	7.5	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH49@2.5		11-Feb-19	ES1904527	-	18.2	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW01@1.00		12-Dec-18	ES1838118	-	10	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0002	0.0004	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002

Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020
10026439

		Inorganics	PFOS/PFOA																										
	Fibrous Asbestos >7mm	Moisture Content	4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	N-Methyl perfluorooctane sulfonamide (NMeFOSA)	N-Methylperfluorooctanesulfonamidoethanol (N-MeFOSE)	N-methylperfluorooctane sulfonamidoacetic acid (NMeFOSAA)	N-Ethyl perfluorooctane sulfonamide (NEtFOSA)	N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	N-ethyl-perfluorooctanesulfonamidoacetic acid (NEtFOSAA)	Perfluorodecanesulfonic acid (PFDS)	Perfluorooctanesulfonic acid (PFOS)	Perfluorooctanoic acid (PFOA)	Perfluorohexane sulfonic acid (PFHxS)	Perfluoropentane sulfonic acid (PFPeS)	Perfluoropentanoic acid (PFPeA)	Perfluoroheptane sulfonic acid (PFHpS)	Perfluorobutanoic acid (PFBA)	Perfluorodecanoic acid (PFDA)	Perfluorobutane sulfonic acid (PFBS)	Perfluorododecanoic acid (PFDoDA)	Perfluoroheptanoic acid (PFHpA)	Perfluorononanoic acid (PFNA)	Perfluorohexanoic acid (PFHxA)	Perfluorooctane sulfonamide (PFOSA)
	g	%	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg
EQL	0.0004	0.1	0.0005	0.0005	0.0005	0.0005	0.0005	0.0005	0.0002	0.0005	0.0005	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.001	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002	0.0002
PFAS NEMP 2018 Table 2 Health Industrial/Commercial															50													
PFAS NEMP 2018 Table 3 Interim EIE Commercial/Industrial														0.14														
NEPM 2013 Table 7 Asbestos HSL																												
NEPM 2013 Table 1A(1) HILs Comm/Ind D Soil																												
NEPM 2013 Table 1A(3) Comm/Ind D Soil HSL for Vapour Intrusion, Sand																												
0-1m																												
1-2m																												
2-4m																												
>4m																												
NEPM 2013 Table 1B(6) ESLs for Comm/Ind, Coarse Soil																												
0-2m																												
NEPM 2013 Table 1B(7) Management Limits Comm / Ind, Coarse Soil																												

Location_Code	Sample_Depth_Range	Sampled_Date_Time	Lab_Report_Number																										
MW01@4.00		12-Dec-18	ES1838118	-	21.4	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW02@1.00		12-Dec-18	ES1838116	-	23.4	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW02@6.00		12-Dec-18	ES1838116	-	21.6	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW03@1.00		19-Dec-18	ES1838498	-	7.7	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW04@0.50		19-Dec-18	ES1838498	-	20.7	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
MW04@3.00		19-Dec-18	ES1838498	-	23.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW05@1.00		19-Dec-18	ES1838498	-	8.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW05@3.00		19-Dec-18	ES1838498	-	6.6	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW06@1.50		13-Dec-18	ES1838116	-	17.5	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
MW06@4.50		13-Dec-18	ES1838116	-	23.9	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0002	0.0004	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
MW07@1.00		19-Dec-18	ES1838498	-	6.3	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	<0.0002	<0.0005	<0.0005	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.001	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002
Near BH48 - ACM		12-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020
10026439

								Metals								TPH					TRH							BTEX							
				Perfluorotetradecanoic acid (PFTeDA)	Perfluorotridecanoic acid (PFTrDA)	Perfluoroundecanoic acid (PFUnDA)	Sum of PFHxS and PFOS	Sum of PFAS	Sum of PFAS (WA DER List)	Arsenic	Cadmium	Chromium (III+VI)	Copper	Lead	Mercury	Nickel	Zinc	C6-C9	C10-C14	C15-C28	C29-C36	C10-C36 (Sum of total)	C6-C10	>C6-C10 less BTEX (F1)	C10-C16	>C10-C16 less Naphthalene (F2)	C16-C34	C34-C40	>C10 - C40 (Sum of total)	Benzene	Toluene	Ethylbenzene	Xylene (m & p)	Xylene (o)	Xylene Total	Total BTEX	1,2,4-trimethylbenzene
				mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg
EQL				0.0005	0.0002	0.0002	0.0002	0.0002	0.0002	5	1	2	5	5	0.1	2	5	10	50	100	100	50	10	10	50	50	100	100	50	0.2	0.5	0.5	0.5	0.5	0.5	0.2	0.5
PFAS NEMP 2018 Table 2 Health Industrial/Commercial							20																												
PFAS NEMP 2018 Table 3 Interim EIE Commercial/Industrial																																			
NEPM 2013 Table 7 Asbestos HSL																																			
NEPM 2013 Table 1A(1) HILs Comm/Ind D Soil										3000	900	3600	240000	1500	730	6000	400000																		
NEPM 2013 Table 1A(3) Comm/Ind D Soil HSL for Vapour Intrusion, Sand																																			
0-1m																							260		NL				3	NL	NL			230		
1-2m																							370		NL				3	NL	NL			NL		
2-4m																							630		NL				3	NL	NL			NL		
>4m																							NL		NL				3	NL	NL			NL		
NEPM 2013 Table 1B(6) ESLs for Comm/Ind, Coarse Soil																																			
0-2m																							215		170	1700	3300		75	135	165			180		
NEPM 2013 Table 1B(7) Management Limits Comm / Ind, Coarse Soil																						700		1000		3500	10000									
Location_Code	Sample_Depth_Range	Sampled_Date_Time	Lab_Report_Number																																
BH01@0.50		12-Dec-18	ES1838116	-	-	-	-	-	-	<5	<1	7	13	26	0.1	2	38	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH01@2.00		12-Dec-18	ES1838116	-	-	-	-	-	-	10	<1	2	8	46	0.3	<2	40	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH02@1.00		12-Dec-18	ES1838116	-	-	-	-	-	-	<5	<1	4	11	23	<0.1	<2	49	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH02@2.50		12-Dec-18	ES1838116	-	-	-	-	-	-	<5	<1	<2	<5	<5	<0.1	<2	<5	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH03@1.00		12-Dec-18	ES1838118	-	-	-	-	-	-	11	<1	268	48	254	2	13	160	<10	<50	110	110	220	<10	<10	<50	<50	180	<100	180	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH03@2.00		12-Dec-18	ES1838116	-	-	-	-	-	-	<5	<1	<2	<5	<5	<0.1	<2	<5	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH04@0.20		12-Dec-18	ES1838118	-	-	-	-	-	-	<5	<1	3	<5	<5	<0.1	3	11	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH05@1.00		12-Dec-18	ES1838118	-	-	-	-	-	-	<5	<1	2	12	12	<0.1	<2	49	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH06@0.50		14-Dec-18	ES1838116	<0.0005	<0.0002	<0.0002	0.0005	0.0005	0.0005	9	<1	29	103	110	<0.1	41	233	<10	<50	1120	870	1990	<10	<10	170	170	1670	440	2280	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH06@2.40		14-Dec-18	ES1838116	-	-	-	-	-	-	38	<1	33	45	110	0.9	18	137	<10	<50	160	140	300	<10	<10	<50	<50	270	<100	270	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH07@0.20		14-Dec-18	ES1838118	-	-	-	-	-	-	13	<1	36	110	120	<0.1	33	241	<10	70	1730	1580	3380	<10	<10	140	140	2880	690	3710	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH08@1.00		14-Dec-18	ES1838116	-	-	-	-	-	-	22	6	39	879	1900	<0.1	30	6030	<10	<50	150	380	530	<10	<10	<50	<50	430	330	760	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH08@3.00		14-Dec-18	ES1838116	-	-	-	-	-	-	9	<1	10	64	490	<0.1	14	849	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH09@1 .50		14-Dec-18	ES1838116	-	-	-	-	-	-	7	<1	7	221	142	<0.1	15	608	<10	<50	<100	<100	<50	<10	<10	<50	<50	130	<100	130	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH09@3.00		14-Dec-18	ES1838116	-	-	-	-	-	-	5	<1	8	33	34	<0.1	15	79	<10	<50	170	140	310	<10	<10	<50	<50	250	100	350	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH10@.020		14-Dec-18	ES1838116	-	-	-	-	-	-	<5	<1	7	28	39	<0.1	78	72	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH10@4.00		14-Dec-18	ES1838116	-	-	-	-	-	-	<5	<1	13	8	17	0.1	<2	54	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH11@1 .00		14-Dec-18	ES1838116	-	-	-	-	-	-	<5	<1	13	73	66	0.1	8	215	<10	<50	140	120	260	<10	<10	<50	<50	220	<100	220	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH11@3.00		14-Dec-18	ES1838116	<0.0005	<0.0002	<0.0002	0.0007	0.0007	0.0007	<5	<1	2	<5	<5	<0.1	<2	26	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH12@1.00		13-Dec-18	ES1838116	-	-	-	-	-	-	6	<1	11	24	48	<0.1	3	24	<10	<50	<100	<100	<50	<10	<10	<50	<50	130	<100	130	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH13@1.50		14-Dec-18	ES1838118	-	-	-	-	-	-	7	<1	6	17	11	0.1	13	26	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH14@0.80		14-Dec-18	ES1838118	<0.0005	<0.0002	<0.0002	0.0003	0.0003	0.0003	<5	<1	<2	<5	<5	<0.1	<2	<5	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH14@2.00		14-Dec-18	ES1838118	-	-	-	-	-	-	<5	<1	<2	<5	<5	<0.1	<2	11	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH15@1.50		13-Dec-18	ES1838116	-	-	-	-	-	-	<5	<1	32	74	56	0.4	5	304	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH16@0.50		14-Dec-18	ES1838116	-	-	-	-	-	-	<5	<1	3	24	115	<0.1	2	172	<10	<50	100	<100	100	<10	<10	<50	<50	150	<100	150	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH16@3.00		14-Dec-18	ES1838116	-	-	-	-	-	-	<5	<1	15	6	16	0.1	<2	47	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH17@1.50		14-Dec-18	ES1838116	-	-	-	-	-	-	11	1	15	34	50	<0.1	11	68	<10	<50	1570	1150	2720	<10	<10	120	120	2270	800	3190	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH18@1.00		14-Dec-18	ES1838116	-	-	-	-	-	-	<5	<1	29	14	13	<0.1	14	95	<10	<50	180	140	320	<10	<10	<50	<50	280	<100	280	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH18@3.00		14-Dec-18	ES1838116	-	-	-	-	-	-	14	<1	4	<5	<5	<0.1	<2	51	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH19@0.40		13-Dec-18	ES1838116	<0.0005	<0.0002	<0.0002	0.0003	0.0003	0.0003	<5	<1	12	51	59	0.2	16	88	<10	<50	420	230	650	<10	<10	<50	<50	600	120	720	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH19@4.00		13-Dec-18	ES1838118	-	-	-	-	-	-	<5	<1	9	12	30	0.4	3	28	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH21@1.00		14-Dec-18	ES1838118	-	-	-	-	-	-	<5	<1	<2	<5	<5	<0.1	<2	30	<10	<50	590	300	890	<10	<10	<50	<50	820	140	960	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH21@3.00		14-Dec-18	ES1838118	-	-	-	-	-	-	<5	<1	<2	<5	<5	<0.1	<2	12	<10	<50	240	120	360	<10	<10	<50	<50	350	<100	350	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH22@1.00		12-Dec-18	ES1838118	-	-	-	-	-	-	10	<1	4	22	273	<0.1	2	81	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH23@1.00		13-Dec-18	ES1838118	-	-	-	-	-	-	<5	<1	9	116	145	0.2	8	164	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH23@2.00		13-Dec-18	ES1838118	<0.0005	<0.0002	<0.0002	0.0003	0.0003	0.0003	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH23@3.00		13-Dec-18	ES1838118	-	-	-	-	-	-	<5	<1	<2	<5	<5	<0.1	<2	11	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH24@1.50		13-Dec-18	ES1838116	-	-	-	-	-	-	<5	<1	<2	<5	<5	<0.1	<2	16	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH24@4.50		13-Dec-18	ES1838116	-	-	-	-	-	-	<5	<1	<2	<5	<5	<0.1	<2	9	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH25@1.00		12-Dec-18	ES1838118	-	-	-	-	-	-	<5	<1	<2	<5	<5	<0.1	<2	12	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH26@1 .00		13-Dec-18	ES1838118	-	-	-	-	-	-	<5	<1	<2	<5	<5	<0.1	<2	22	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH26@3.00		13-Dec-18	ES1838118	-	-	-	-	-	-	<5	<1	<2	<5	<5	<0.1	<2	<5	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5

Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020
10026439

								Metals								TPH					TRH							BTEX							
				Perfluorotetradecanoic acid (PFTeDA)	Perfluorotridecanoic acid (PFTrDA)	Perfluoroundecanoic acid (PFUnDA)	Sum of PFHxS and PFOS	Sum of PFAS	Sum of PFAS (WA DER List)	Arsenic	Cadmium	Chromium (III+VI)	Copper	Lead	Mercury	Nickel	Zinc	C6-C9	C10-C14	C15-C28	C29-C36	C10-C36 (Sum of total)	C6-C10	>C6-C10 less BTEX (F1)	C10-C16	>C10-C16 less Naphthalene (F2)	C16-C34	C34-C40	>C10 - C40 (Sum of total)	Benzene	Toluene	Ethylbenzene	Xylene (m & p)	Xylene (o)	Xylene Total	Total BTEX	1,2,4-trimethylbenzene
				mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg
EQL				0.0005	0.0002	0.0002	0.0002	0.0002	0.0002	5	1	2	5	5	0.1	2	5	10	50	100	100	50	10	10	50	50	100	100	50	0.2	0.5	0.5	0.5	0.5	0.5	0.2	0.5
PFAS NEMP 2018 Table 2 Health Industrial/Commercial							20																												
PFAS NEMP 2018 Table 3 Interim EIE Commercial/Industrial																																			
NEPM 2013 Table 7 Asbestos HSL																																			
NEPM 2013 Table 1A(1) HILs Comm/Ind D Soil										3000	900	3600	240000	1500	730	6000	400000																		
NEPM 2013 Table 1A(3) Comm/Ind D Soil HSL for Vapour Intrusion, Sand																																			
0-1m																							260		NL				3	NL	NL			230		
1-2m																							370		NL				3	NL	NL			NL		
2-4m																							630		NL				3	NL	NL			NL		
>4m																							NL		NL				3	NL	NL			NL		
NEPM 2013 Table 1B(6) ESLs for Comm/Ind, Coarse Soil																																			
0-2m																							215		170	1700	3300		75	135	165			180		
NEPM 2013 Table 1B(7) Management Limits Comm / Ind, Coarse Soil																						700		1000		3500	10000									
Location_Code	Sample_Depth_Range	Sampled_Date_Time	Lab_Report_Number																																
BH27@0.50		13-Dec-18	ES1838118	-	-	-	-	-	-	<5	<1	4	6	8	<0.1	3	27	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH28@0.50		13-Dec-18	ES1838118	-	-	-	-	-	-	<5	<1	<2	<5	<5	<0.1	<2	12	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH28@3.00		13-Dec-18	ES1838118	<0.0005	<0.0002	<0.0002	0.0003	0.0003	0.0003	<5	<1	<2	<5	<5	<0.1	<2	22	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH29@0.4		11-Feb-19	ES1904527	-	-	-	-	-	-	<5	<1	12	129	68	0.1	13	110	<10	<50	280	140	420	<10	<10	<50	<50	370	<100	370	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH30@0.8		11-Feb-19	ES1904527	-	-	-	-	-	-	<5	<1	6	8	52	<0.1	3	80	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH30@2.7		11-Feb-19	ES1904527	-	-	-	-	-	-	<5	<1	<2	11	142	<0.1	17	769	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH31@0.2		11-Feb-19	ES1904527	-	-	-	-	-	-	<5	<1	<2	<5	7	<0.1	<2	74	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH31@2.3		11-Feb-19	ES1904527	-	-	-	-	-	-	5	<1	<2	<5	<5	<0.1	<2	<5	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH32@1		11-Feb-19	ES1904527	-	-	-	-	-	-	<5	<1	26	147	282	0.4	7	230	<10	<50	110	110	220	<10	<10	<50	<50	190	<100	190	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH32@1.9		11-Feb-19	ES1904527	<0.0005	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH33@0.5		11-Feb-19	ES1904527	-	-	-	-	-	-	16	<1	8	15	79	<0.1	6	213	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH33@2.5		11-Feb-19	ES1904527	-	-	-	-	-	-	<5	<1	3	<5	<5	<0.1	<2	<5	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH34@0.3		12-Feb-19	ES1904527	-	-	-	-	-	-	<5	<1	11	20	44	<0.1	29	249	<10	<50	120	<100	120	<10	<10	<50	<50	190	<100	190	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH34@3		12-Feb-19	ES1904527	-	-	-	-	-	-	<5	<1	3	<5	<5	<0.1	2	5	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH35@0.7		12-Feb-19	ES1904527	-	-	-	-	-	-	6	<1	4	33	35	<0.1	18	340	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH36@1		12-Feb-19	ES1904527	-	-	-	-	-	-	11	1	177	360	39	<0.1	335	72	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH36@1.5		12-Feb-19	ES1904527	<0.0005	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH36@2.1		12-Feb-19	ES1904527	-	-	-	-	-	-	<5	<1	<2	<5	<5	<0.1	<2	<5	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH37@1.1		12-Feb-19	ES1904527	-	-	-	-	-	-	<5	<1	<2	9	34	<0.1	9	10	<10	<50	790	1470	2260	<10	<10	<50	<50	1930	930	2860	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH37@1.5		12-Feb-19	ES1904527	<0.0005	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH37@2.7		12-Feb-19	ES1904527	-	-	-	-	-	-	15	<1	34	1200	692	<0.1	309	410	<10	<50	1990	1170	3160	<10	<10	120	120	2820	700	3640	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH38@0.3		12-Feb-19	ES1904527	-	-	-	-	-	-	<5	<1	8	16	15	<0.1	5	12	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH38@1.6		12-Feb-19	ES1904527	<0.0005	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<5	<1	2	<5	<5	<0.1	<2	<5	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH39@0.3		12-Feb-19	ES1904527	-	-	-	-	-	-	<5	<1	48	104	235	0.1	26	195	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH39@2.5		12-Feb-19	ES1904527	-	-	-	-	-	-	<5	<1	<2	<5	<5	<0.1	<2	15	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH40@0.3		12-Feb-19	ES1904527	-	-	-	-	-	-	8	<1	26	46	80	<0.1	28	127	<10	<50	180	<100	180	<10	<10	<50	<50	220	<100	220	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH41@2		12-Feb-19	ES1904527	-	-	-	-	-	-	47	2	42	285	72	0.1	225	451	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH41@2.4		12-Feb-19	ES1904527	-	-	-	-	-	-	6	<1	<2	<5	<5	<0.1	<2	<5	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH42@1.5		12-Feb-19	ES1904527	-	-	-	-	-	-	40	<1	19	154	98	0.1	54	241	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH44 - PACM		11-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH44@0.3		11-Feb-19	ES1904527	-	-	-	-	-	-	<5	<1	9	160	116	<0.1	6	195	<10	<50	320	180	500	<10	<10	<50	<50	440	100	540	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH44@1		11-Feb-19	ES1904527	<0.0005	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH44@1.3		11-Feb-19	ES1904527	-	-	-	-	-	-	<5	<1	10	35	42	<0.1	9	80	<10	<50	970	440	1410	<10	<10	<50	<50	1300	210	1510	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH45@0.7		11-Feb-19	ES1904527	-	-	-	-	-	-	6	<1	7	124	215	0.1	5	472	<10	<50	130	<100	130	<10	<10	<50	<50	200	<100	200	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH45@2.2		11-Feb-19	ES1904527	-	-	-	-	-	-	<5	<1	<2	<5	<5	<0.1	<2	<5	<10	240	720	<100	960	<10	<10	450	450	490	<100	940	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH46@0.3		12-Feb-19	ES1904527	-	-	-	-	-	-	<5	<1	4	<5	13	<0.1	<2	8	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH47@1.3		11-Feb-19	ES1904527	-	-	-	-	-	-	11	<1	6	7	31	<0.1	2	49	14	<50	<100	<100	<50	16	16	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH47@2.4		11-Feb-19	ES1904527	-	-	-	-	-	-	<5	<1	<2	<5	<5	<0.1	<2	<5	1770	7130	15,100	<100	22,200	2560	2440	11,800	11,800	9900	<100	21,700	3.4	1.8	30.9	77.9	1.8	79.7	116	146
BH48@0.1		12-Feb-19	ES1904527	-	-	-	-	-	-	<5	<1	20	136	72	0.5	14	271	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH49@0.9		11-Feb-19	ES1904527	-	-	-	-	-	-	<5	<1	6	9	64	<0.1	11	78	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
BH49@2.5		11-Feb-19	ES1904527	-	-	-	-	-	-	<5	<1	<2	<5	<5	<0.1	<2	<5	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
MW01@1.00		12-Dec-18	ES1838118	<0.0005	<0.0002	<0.0002	0.0004	0.0004	0.0004	<5	<1	<2	<5	<5	<0.1	<2	14	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5

Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020
10026439

								Metals								TPH					TRH							BTEX							
	Perfluorotetradecanoic acid (PFTeDA)	Perfluorotridecanoic acid (PFTrDA)	Perfluoroundecanoic acid (PFUnDA)	Sum of PFHxS and PFOS	Sum of PFAS	Sum of PFAS (WA DER List)	Arsenic	Cadmium	Chromium (III+VI)	Copper	Lead	Mercury	Nickel	Zinc	C6-C9	C10-C14	C15-C28	C29-C36	C10-C36 (Sum of total)	C6-C10	>C6-C10 less BTEX (F1)	C10-C16	>C10-C16 less Naphthalene (F2)	C16-C34	C34-C40	>C10 - C40 (Sum of total)	Benzene	Toluene	Ethylbenzene	Xylene (m & p)	Xylene (o)	Xylene Total	Total BTEX	1,2,4-trimethylbenzene
	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg
EQL	0.0005	0.0002	0.0002	0.0002	0.0002	0.0002	5	1	2	5	5	0.1	2	5	10	50	100	100	50	10	10	50	50	100	100	50	0.2	0.5	0.5	0.5	0.5	0.5	0.2	0.5
PFAS NEMP 2018 Table 2 Health Industrial/Commercial				20																														
PFAS NEMP 2018 Table 3 Interim EIE Commercial/Industrial																																		
NEPM 2013 Table 7 Asbestos HSL																																		
NEPM 2013 Table 1A(1) HILs Comm/Ind D Soil							3000	900	3600	240000	1500	730	6000	400000																				
NEPM 2013 Table 1A(3) Comm/Ind D Soil HSL for Vapour Intrusion, Sand																																		
0-1m																					260		NL				3	NL	NL			230		
1-2m																					370		NL				3	NL	NL			NL		
2-4m																					630		NL				3	NL	NL			NL		
>4m																					NL		NL				3	NL	NL			NL		
NEPM 2013 Table 1B(6) ESLs for Comm/Ind, Coarse Soil																																		
0-2m																					215		170	1700	3300		75	135	165			180		
NEPM 2013 Table 1B(7) Management Limits Comm / Ind, Coarse Soil																				700		1000		3500	10000									

Location_Code	Sample_Depth_Range	Sampled_Date_Time	Lab_Report_Number																																
MW01@4.00		12-Dec-18	ES1838118	-	-	-	-	-	-	<5	<1	<2	<5	<5	<0.1	<2	75	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
MW02@1.00		12-Dec-18	ES1838116	-	-	-	-	-	-	<5	<1	10	17	37	0.1	<2	124	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
MW02@6.00		12-Dec-18	ES1838116	-	-	-	-	-	-	<5	<1	5	15	16	<0.1	<2	31	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
MW03@1.00		19-Dec-18	ES1838498	-	-	-	-	-	-	<5	<1	<2	<5	<5	<0.1	<2	<5	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
MW04@0.50		19-Dec-18	ES1838498	<0.0005	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<5	<1	9	29	64	0.2	5	81	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
MW04@3.00		19-Dec-18	ES1838498	-	-	-	-	-	-	<5	<1	<2	<5	<5	<0.1	<2	14	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
MW05@1.00		19-Dec-18	ES1838498	-	-	-	-	-	-	44	20	11	133	937	0.4	13	118	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
MW05@3.00		19-Dec-18	ES1838498	-	-	-	-	-	-	<5	8	<2	<5	12	0.1	<2	15	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
MW06@1.50		13-Dec-18	ES1838116	-	-	-	-	-	-	<5	<1	<2	<5	<5	<0.1	<2	7	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
MW06@4.50		13-Dec-18	ES1838116	<0.0005	<0.0002	<0.0002	0.0004	0.0004	0.0004	<5	<1	<2	<5	<5	<0.1	<2	14	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
MW07@1.00		19-Dec-18	ES1838498	<0.0005	<0.0002	<0.0002	<0.0002	<0.0002	<0.0002	<5	<1	3	<5	<5	<0.1	<2	5	<10	<50	<100	<100	<50	<10	<10	<50	<50	<100	<100	<50	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.5
Near BH48 - ACM		12-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020
10026439

				MAH								PAH																										Ph					
				1,3,5-trimethylbenzene	Isopropylbenzene	n-butylbenzene	n-propylbenzene	p-isopropyltoluene	sec-butylbenzene	Styrene	tert-butylbenzene	2-chloronaphthalene	2-methylnaphthalene	3-methylcholanthrene	7,12-dimethylbenz(a)anthracene	Acenaphthene	Acenaphthylene	Anthracene	Benz(a)anthracene	Benzo(a) pyrene	Benzo(a)pyrene TEQ calc (Zero)	Benzo(a)pyrene TEQ calc (Half)	Benzo(a)pyrene TEQ (LOR)	Benzo(g,h,i)perylene	Benzo(b+j+k)fluoranthene	Chrysene	Dibenz(a,h)anthracene	Fluoranthene	Fluorene	Indeno(1,2,3-c,d)pyrene	Naphthalene	Phenanthrene	Pyrene	PAHs (Sum of total)	2,4,5-trichlorophenol	2,4,6-trichlorophenol	2,4-dichlorophenol	2,4-dimethylphenol	2,6-dichlorophenol	2-chlorophenol
				mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg
EQL				0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	1	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5
PFAS NEMP 2018 Table 2 Health Industrial/Commercial																																									
PFAS NEMP 2018 Table 3 Interim EIE Commercial/Industrial																																									
NEPM 2013 Table 7 Asbestos HSL																																									
NEPM 2013 Table 1A(1) HILs Comm/Ind D Soil																								40										4000								
NEPM 2013 Table 1A(3) Comm/Ind D Soil HSL for Vapour Intrusion, Sand																																									
0-1m																															NL										
1-2m																															NL										
2-4m																															NL										
>4m																															NL										
NEPM 2013 Table 1B(6) ESLs for Comm/Ind, Coarse Soil																																									
0-2m																					1.4																					
NEPM 2013 Table 1B(7) Management Limits Comm / Ind, Coarse Soil																																									
Location_Code	Sample_Depth_Range	Sampled_Date_Time	Lab_Report_Number																																							
BH01@0.50		12-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH01@2.00		12-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH02@1.00		12-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH02@2.50		12-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH03@1.00		12-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.9	0.6	0.8	1.1	1.4	0.5	1	0.7	<0.5	1.7	<0.5	<0.5	<0.5	0.9	1.6	7.9	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH03@2.00		12-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH04@0.20		12-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH05@1.00		12-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH06@0.50		14-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	1.8	<0.5	<0.5	<0.5	0.6	1.9	4.3	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH06@2.40		14-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	5.1	0.8	<0.5	<0.5	0.8	1.3	<0.5	2	1.3	<0.5	4.9	<0.5	<0.5	<0.5	0.7	6.5	21.3	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH07@0.20		14-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH08@1.00		14-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH08@3.00		14-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH09@1 .50		14-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.7	0.6	0.8	1	1.3	<0.5	1	0.6	<0.5	2	<0.5	<0.5	<0.5	1.2	1.8	7.9	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH09@3.00		14-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.8	0.8	1.1	1.4	1.6	0.5	2	0.6	<0.5	2.3	<0.5	<0.5	<0.5	1.2	2.2	10.4	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH10@.020		14-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH10@4.00		14-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH11@1 .00		14-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	1	1.3	1.6	1.9	0.5	2	1	<0.5	3.5	<0.5	<0.5	<0.5	2.8	3.3	15.9	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH11@3.00		14-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH12@1.00		13-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.8	1.6	1.2	1.6	1.8	2.1	0.6	2	1.4	<0.5	4.5	<0.5	<0.5	<0.5	3.3	4.5	19.9	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH13@1.50		14-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH14@0.80		14-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH14@2.00		14-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH15@1.50		13-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	0.6	<0.5	<0.5	<0.5	<0.5	0.5	1.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH16@0.50		14-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.1	2.6	2.3	3.1	3.3	3.6	1	4	2.2	<0.5	5.9	0.6	0.9	0.5 - 3	4	6	31.7	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH16@3.00		14-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH17@1.50		14-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	3.3	<0.5	<0.5	3.6	2.6	11.4	17.7	11.9	17.6	17.6	17.6	6	21	14.1	1.1	44.7	5.1	5.4	2 - 4.3	42	42.2	233	<0.5	<0.5	<0.5	0.6	<0.5	<0.5
BH18@1.00		14-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH18@3.00		14-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH19@0.40		13-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.5	<0.5	<0.5	2.8	<0.5	7.7	9.2	6.2	9	9	9	2.4	10	7.5	0.6	21.5	3.6	2.1	<0.5	24.6	21.5	120	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH19@4.00		13-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH21@1.00		14-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH21@3.00		14-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH22@1.00		12-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.5	<0.5	<0.5	0.7	1.2	0.5	1	<0.5	<0.5	1.1	<0.5	<0.5	<0.5	<0.5	1.1	4.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH23@1.00		13-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.7	0.6	0.8	1	1.3	<0.5	1	0.6	<0.5	1.3	<0.5	<0.5	<0.5	<0.5	1.4	5.6	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH23@2.00		13-Dec-18	ES1838118	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH23@3.00		13-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH24@1.50		13-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH24@4.50		13-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH25@1.00		12-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH26@1 .00		13-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH26@3.00		13-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5

Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020
10026439

				MAH								PAH																														Ph					
				1,3,5-trimethylbenzene	Isopropylbenzene	n-butylbenzene	n-propylbenzene	p-isopropyltoluene	sec-butylbenzene	Styrene	tert-butylbenzene	2-chloronaphthalene	2-methylnaphthalene	3-methylcholanthrene	7,12-dimethylbenz(a)anthracene	Acenaphthene	Acenaphthylene	Anthracene	Benz(a)anthracene	Benzo(a) pyrene	Benzo(a)pyrene TEQ calc (Zero)	Benzo(a)pyrene TEQ calc (Half)	Benzo(a)pyrene TEQ (LOR)	Benzo(g,h,i)perylene	Benzo(b+j+k)fluoranthene	Chrysene	Dibenz(a,h)anthracene	Fluoranthene	Fluorene	Indeno(1,2,3-c,d)pyrene	Naphthalene	Phenanthrene	Pyrene	PAHs (Sum of total)	2,4,5-trichlorophenol	2,4,6-trichlorophenol	2,4-dichlorophenol	2,4-dimethylphenol	2,6-dichlorophenol	2-chlorophenol
				mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg
EQL				0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	1	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5
PFAS NEMP 2018 Table 2 Health Industrial/Commercial																																															
PFAS NEMP 2018 Table 3 Interim EIE Commercial/Industrial																																															
NEPM 2013 Table 7 Asbestos HSL																																															
NEPM 2013 Table 1A(1) HILs Comm/Ind D Soil																								40																								
NEPM 2013 Table 1A(3) Comm/Ind D Soil HSL for Vapour Intrusion, Sand																																															
0-1m																																NL																
1-2m																																NL																
2-4m																																NL																
>4m																																NL																
NEPM 2013 Table 1B(6) ESLs for Comm/Ind, Coarse Soil																																															
0-2m																				1.4																												
NEPM 2013 Table 1B(7) Management Limits Comm / Ind, Coarse Soil																																															
Location_Code	Sample_Depth_Range	Sampled_Date_Time	Lab_Report_Number																																												
BH27@0.50		13-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH28@0.50		13-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH28@3.00		13-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH29@0.4		11-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	1.7	<0.5	<0.5	<0.5	1.9	3.3	7.3	5.7	8.1	8.1	8.1	2.3	8	5.5	0.6	14.7	2.8	2	1.8 - 2	14	14.2	84.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH30@0.8		11-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH30@2.7		11-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH31@0.2		11-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH31@2.3		11-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH32@1		11-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.7	3.2	3.2	4.2	4.5	4.7	2	5	2.9	<0.5	5.3	<0.5	1.5	<0.5	2.5	5.6	31.9	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH32@1.9		11-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH33@0.5		11-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<3	<3	<3	<3	<3	<3	<3	<3	<3	<2.4	<2.4	<2.4	<3	<6	<3	<3	<3	<3	<3	<1	<3	<3	<2.4	<3	<3	<3	<3	<3	<3
BH33@2.5		11-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH34@0.3		12-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.1	0.9	1.1	1.4	1.7	<0.5	1	0.9	<0.5	2.6	<0.5	<0.5	<0.5	2.3	2.5	11.9	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH34@3		12-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<3	<3	<3	<3	<3	<3	<3	<3	<3	<2.4	<2.4	<2.4	<3	<6	<3	<3	<3	<3	<3	<1	<3	<3	<2.4	<3	<3	<3	<3	<3	<3
BH35@0.7		12-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH36@1		12-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH36@1.5		12-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH36@2.1		12-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<3	<3	<3	<3	<3	<3	<3	<3	<3	<2.4	<2.4	<2.4	<3	<6	<3	<3	<3	<3	<3	<1	<3	<3	<2.4	<3	<3	<3	<3	<3	<3
BH37@1.1		12-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<3	<3	<3	<3	<3	<3	<3	<3	<3	<2.4	<2.4	<2.4	<3	<6	<3	<3	<3	<3	<3	<1	<3	<3	<2.4	<3	<3	<3	<3	<3	<3
BH37@1.5		12-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH37@2.7		12-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<3	<3	<3	<3	<3	<3	4.4	4.2	<3	<2.4	<2.4	<2.4	<3	<6	<3	<3	7.6	3.2	<3	<1	9	6.6	35	<3	<3	<3	<3	<3	<3
BH38@0.3		12-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH38@1.6		12-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<3	<3	<3	<3	<3	<3	<3	<3	<3	<2.4	<2.4	<2.4	<3	<6	<3	<3	<3	<3	<3	<1	<3	<3	<2.4	<3	<3	<3	<3	<3	<3
BH39@0.3		12-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH39@2.5		12-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH40@0.3		12-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH41@2		12-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<3	<3	<3	<3	<3	<3	<3	<3	<3	<2.4	<2.4	<2.4	<3	<6	<3	<3	<3	<3	<3	<1	<3	<3	<2.4	<3	<3	<3	<3	<3	<3
BH41@2.4		12-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH42@1.5		12-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH44 - PACM		11-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH44@0.3		11-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.5	<0.5	<0.5	0.8	<0.5	1.4	4.5	3.8	5	5.3	5.5	2.1	6	5.2	<0.5	9.7	0.8	1.2	<1 - 1	9.2	10.6	56.3	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH44@1		11-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH44@1.3		11-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	2.3	<0.5	<0.5	4	<0.5	6.5	13.9	9.6	13.8	13.8	13.8	3.8	17	13.3	0.7	35.9	3.6	2.8	<1 - 3.6	44.5	37.5	197	<0.5	<0.5	<0.5	0.7	<0.5	<0.5
BH45@0.7		11-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	1	4.1	3.3	4.4	4.6	4.9	1.7	5	3	<0.5	7.5	<0.5	1.4	<0.5	4.1	7	38.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH45@2.2		11-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH46@0.3		12-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH47@1.3		11-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	<0.5	<0.5	0.6	1.2	<0.5	<1	0.5	<0.5	1.2	<0.5	<0.5	<0.5	0.7	1.1	4.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH47@2.4		11-Feb-19	ES1904527	43.6	11.6	22	40	6.5	12.3	<0.5	<0.5	<3	19.2	<3	<3	<3	<3	<3	<3	<3	<2.4	<2.4	<2.4	<3	<6	<3	<3	<3	<3	<3	14 - 15.1	<3	<3	15.1	<3	<3	<3	<3	<3	<3
BH48@0.1		12-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH49@0.9		11-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH49@2.5		11-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
MW01@1.00		12-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	0.6	1.2	<0.5	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5

Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020
10026439

| | | |

Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020
10026439

				enols						PCBs	Chlorinated Hydrocarbons																													
				2-nitrophenol	2-methylphenol	3&4-Methylphenol (m&p-cresol)	4-chloro-3-methylphenol	Pentachlorophenol	Phenol	PCBs (Sum of total)	1,1,2,2-tetrachloroethane	1,1,1,2-tetrachloroethane	1,1,2-trichloroethane	1,1,1-trichloroethane	1,1-dichloroethane	1,1-dichloroethene	1,1-dichloropropene	1,2,3-trichloropropane	1,2-dibromo-3-chloropropane	1,2-dichloroethane	1,2-dichloropropane	1,3-dichloropropane	2,2-dichloropropane	Bromodichloromethane	Bromoform	Carbon tetrachloride	Chlorodibromomethane	Chloroethane	Chloroform	Chloromethane	cis-1,2-dichloroethene	cis-1,3-dichloropropene	Dibromomethane	Hexachlorocyclopentadiene	Hexachloroethane	Hexachlorobutadiene	Trichloroethene	Tetrachloroethene	trans-1,2-dichloroethene	trans-1,3-dichloropropene
				mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg
EQL				0.5	0.5	0.5	0.5	1	0.5	0.1	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	5	0.5	5	0.5	0.5	0.5	2.5	0.5	0.5	0.5	0.5	0.5	0.5
PFAS NEMP 2018 Table 2 Health Industrial/Commercial																																							
PFAS NEMP 2018 Table 3 Interim EIE Commercial/Industrial																																							
NEPM 2013 Table 7 Asbestos HSL																																							
NEPM 2013 Table 1A(1) HILs Comm/Ind D Soil								660	240000	7																														
NEPM 2013 Table 1A(3) Comm/Ind D Soil HSL for Vapour Intrusion, Sand																																							
0-1m																																							
1-2m																																							
2-4m																																							
>4m																																							
NEPM 2013 Table 1B(6) ESLs for Comm/Ind, Coarse Soil																																							
0-2m																																							
NEPM 2013 Table 1B(7) Management Limits Comm / Ind, Coarse Soil																																							
Location_Code	Sample_Depth_Range	Sampled_Date_Time	Lab_Report_Number																																					
BH01@0.50		12-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH01@2.00		12-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH02@1.00		12-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH02@2.50		12-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH03@1.00		12-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH03@2.00		12-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH04@0.20		12-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH05@1.00		12-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH06@0.50		14-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH06@2.40		14-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH07@0.20		14-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH08@1.00		14-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH08@3.00		14-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH09@1 .50		14-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH09@3.00		14-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH10@.020		14-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH10@4.00		14-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH11@1 .00		14-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH11@3.00		14-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH12@1.00		13-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH13@1.50		14-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH14@0.80		14-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH14@2.00		14-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH15@1.50		13-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH16@0.50		14-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH16@3.00		14-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH17@1.50		14-Dec-18	ES1838116	<0.5	<0.5	0.8	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH18@1.00		14-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH18@3.00		14-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH19@0.40		13-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH19@4.00		13-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH21@1.00		14-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH21@3.00		14-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH22@1.00		12-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH23@1.00		13-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH23@2.00		13-Dec-18	ES1838118	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH23@3.00		13-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH24@1.50		13-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH24@4.50		13-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH25@1.00		12-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH26@1 .00		13-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH26@3.00		13-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5

Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020
10026439

				enols						PCBs	Chlorinated Hydrocarbons																													
				2-nitrophenol	2-methylphenol	3&4-Methylphenol (m&p-cresol)	4-chloro-3-methylphenol	Pentachlorophenol	Phenol	PCBs (Sum of total)	1,1,2,2-tetrachloroethane	1,1,1,2-tetrachloroethane	1,1,2-trichloroethane	1,1,1-trichloroethane	1,1-dichloroethane	1,1-dichloroethene	1,1-dichloropropene	1,2,3-trichloropropane	1,2-dibromo-3-chloropropane	1,2-dichloroethane	1,2-dichloropropane	1,3-dichloropropane	2,2-dichloropropane	Bromodichloromethane	Bromoform	Carbon tetrachloride	Chlorodibromomethane	Chloroethane	Chloroform	Chloromethane	cis-1,2-dichloroethene	cis-1,3-dichloropropene	Dibromomethane	Hexachlorocyclopentadiene	Hexachloroethane	Hexachlorobutadiene	Trichloroethene	Tetrachloroethene	trans-1,2-dichloroethene	trans-1,3-dichloropropene
Location_Code	Sample_Depth_Range	Sampled_Date_Time	Lab_Report_Number	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg
EQL				0.5	0.5	0.5	0.5	1	0.5	0.1	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	5	0.5	5	0.5	0.5	0.5	2.5	0.5	0.5	0.5	0.5	0.5	0.5
PFAS NEMP 2018 Table 2 Health Industrial/Commercial																																								
PFAS NEMP 2018 Table 3 Interim EIE Commercial/Industrial																																								
NEPM 2013 Table 7 Asbestos HSL																																								
NEPM 2013 Table 1A(1) HILs Comm/Ind D Soil								660	240000	7																														
NEPM 2013 Table 1A(3) Comm/Ind D Soil HSL for Vapour Intrusion, Sand																																								
0-1m																																								
1-2m																																								
2-4m																																								
>4m																																								
NEPM 2013 Table 1B(6) ESLs for Comm/Ind, Coarse Soil																																								
0-2m																																								
NEPM 2013 Table 1B(7) Management Limits Comm / Ind, Coarse Soil																																								
BH27@0.50		13-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH28@0.50		13-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH28@3.00		13-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH29@0.4		11-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH30@0.8		11-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH30@2.7		11-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH31@0.2		11-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH31@2.3		11-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH32@1		11-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH32@1.9		11-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH33@0.5		11-Feb-19	ES1904527	<3	<3	<3	<3	<6	<3	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<3	<3	<3	<0.5	<0.5	<0.5	<0.5
BH33@2.5		11-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH34@0.3		12-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH34@3		12-Feb-19	ES1904527	<3	<3	<3	<3	<6	<3	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<3	<3	<3	<0.5	<0.5	<0.5	<0.5
BH35@0.7		12-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH36@1		12-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH36@1.5		12-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH36@2.1		12-Feb-19	ES1904527	<3	<3	<3	<3	<6	<3	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<3	<3	<3	<0.5	<0.5	<0.5	<0.5
BH37@1.1		12-Feb-19	ES1904527	<3	<3	<3	<3	<6	<3	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<3	<3	<3	<0.5	<0.5	<0.5	<0.5
BH37@1.5		12-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH37@2.7		12-Feb-19	ES1904527	<3	<3	<3	<3	<6	<3	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<3	<3	<3	<0.5	<0.5	<0.5	<0.5
BH38@0.3		12-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH38@1.6		12-Feb-19	ES1904527	<3	<3	<3	<3	<6	<3	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<3	<3	<3	<0.5	<0.5	<0.5	<0.5
BH39@0.3		12-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<1	<0.5	0.7	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH39@2.5		12-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH40@0.3		12-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<1	<0.5	0.3	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH41@2		12-Feb-19	ES1904527	<3	<3	<3	<3	<6	<3	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<3	<3	<3	<0.5	<0.5	<0.5	<0.5
BH41@2.4		12-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH42@1.5		12-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH44 - PACM		11-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH44@0.3		11-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH44@1		11-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH44@1.3		11-Feb-19	ES1904527	<0.5	<0.5	0.9	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH45@0.7		11-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH45@2.2		11-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH46@0.3		12-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH47@1.3		11-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH47@2.4		11-Feb-19	ES1904527	<3	<3	<3	<3	<6	<3	<0.2	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<3	<3	<3	<0.5	<0.5	<0.5	<0.5
BH48@0.1		12-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH49@0.9		11-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
BH49@2.5		11-Feb-19	ES1904527	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
MW01@1.00		12-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5

Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020
10026439

	enols						PCBs	Chlorinated Hydrocarbons																															
	2-nitrophenol	2-methylphenol	3&4-Methylphenol (m&p-cresol)	4-chloro-3-methylphenol	Pentachlorophenol	Phenol	PCBs (Sum of total)	1,1,2,2-tetrachloroethane	1,1,1,2-tetrachloroethane	1,1,2-trichloroethane	1,1,1-trichloroethane	1,1-dichloroethane	1,1-dichloroethene	1,1-dichloropropene	1,2,3-trichloropropane	1,2-dibromo-3-chloropropane	1,2-dichloroethane	1,2-dichloropropane	1,3-dichloropropane	2,2-dichloropropane	Bromodichloromethane	Bromoform	Carbon tetrachloride	Chlorodibromomethane	Chloroethane	Chloroform	Chloromethane	cis-1,2-dichloroethene	cis-1,3-dichloropropene	Dibromomethane	Hexachlorocyclopentadiene	Hexachloroethane	Hexachlorobutadiene	Trichloroethene	Tetrachloroethene	trans-1,2-dichloroethene	trans-1,3-dichloropropene
	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg
EQL	0.5	0.5	0.5	0.5	1	0.5	0.1	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	5	0.5	5	0.5	0.5	0.5	2.5	0.5	0.5	0.5	0.5	0.5	0.5
PFAS NEMP 2018 Table 2 Health Industrial/Commercial																																						
PFAS NEMP 2018 Table 3 Interim EIE Commercial/Industrial																																						
NEPM 2013 Table 7 Asbestos HSL																																						
NEPM 2013 Table 1A(1) HILs Comm/Ind D Soil					660	240000	7																															
NEPM 2013 Table 1A(3) Comm/Ind D Soil HSL for Vapour Intrusion, Sand																																						
0-1m																																						
1-2m																																						
2-4m																																						
>4m																																						
NEPM 2013 Table 1B(6) ESLs for Comm/Ind, Coarse Soil																																						
0-2m																																						
NEPM 2013 Table 1B(7) Management Limits Comm / Ind, Coarse Soil																																						

Location_Code	Sample_Depth_Range	Sampled_Date_Time	Lab_Report_Number																																					
MW01@4.00		12-Dec-18	ES1838118	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
MW02@1.00		12-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
MW02@6.00		12-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
MW03@1.00		19-Dec-18	ES1838498	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
MW04@0.50		19-Dec-18	ES1838498	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
MW04@3.00		19-Dec-18	ES1838498	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
MW05@1.00		19-Dec-18	ES1838498	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
MW05@3.00		19-Dec-18	ES1838498	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
MW06@1.50		13-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
MW06@4.50		13-Dec-18	ES1838116	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
MW07@1.00		19-Dec-18	ES1838498	<0.5	<0.5	<0.5	<0.5	<1	<0.5	<0.1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<0.5	<5	<0.5	<0.5	<0.5	<2.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5
Near BH48 - ACM		12-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020
10026439

ARCADIS Design & Consultancy for natural and built assets

				Organochlorine Pesticides																										Organopho								
				Vinyl chloride	a-BHC	Aldrin	Dieldrin	Aldrin + Dieldrin	b-BHC	chlordane	Chlordane (cis)	Chlordane (trans)	d-BHC	DDD	4,4-DDE	DDT	DDT+DDE+DDD	Endosulfan	Endrin ketone	Endosulfan I	Endosulfan II	Endosulfan sulphate	Endrin	Endrin aldehyde	g-BHC (Lindane)	Heptachlor	Heptachlor epoxide	Methoxychlor	Azinophos methyl	Bromophos-ethyl	Carbophenothion	Chlorfenvinphos	Chlorpyrifos	Chlorpyrifos-methyl	Demeton-S-methyl	Diazinon	Dichlorvos
				mg/kg	µg/kg	µg/kg	µg/kg	mg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg
EQL				5	50	50	50	0.05	50	50	50	50	50	50	50	200	50	50	50	50	50	50	50	50	50	50	50	200	0.05	0.05	0.05	0.05	0.05	0.05	0.05	0.05	0.05
PFAS NEMP 2018 Table 2 Health Industrial/Commercial																																						
PFAS NEMP 2018 Table 3 Interim EIE Commercial/Industrial																																						
NEPM 2013 Table 7 Asbestos HSL																																						
NEPM 2013 Table 1A(1) HILs Comm/Ind D Soil								45		530000							3600000	2000000					100000			50000		2500000					2000				
NEPM 2013 Table 1A(3) Comm/Ind D Soil HSL for Vapour Intrusion, Sand																																						
0-1m																																						
1-2m																																						
2-4m																																						
>4m																																						
NEPM 2013 Table 1B(6) ESLs for Comm/Ind, Coarse Soil																																						
0-2m																																						
NEPM 2013 Table 1B(7) Management Limits Comm / Ind, Coarse Soil																																						
Location_Code	Sample_Depth_Range	Sampled_Date_Time	Lab_Report_Number																																			
BH01@0.50		12-Dec-18	ES1838116	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH01@2.00		12-Dec-18	ES1838116	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH02@1.00		12-Dec-18	ES1838116	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH02@2.50		12-Dec-18	ES1838116	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH03@1.00		12-Dec-18	ES1838118	<5	<50	<50	<500 - 240	0.24	<50	<50	<50	<50	<50	<500 - 140	<500 - 110	<200	250	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH03@2.00		12-Dec-18	ES1838116	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH04@0.20		12-Dec-18	ES1838118	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH05@1.00		12-Dec-18	ES1838118	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH06@0.50		14-Dec-18	ES1838116	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH06@2.40		14-Dec-18	ES1838116	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH07@0.20		14-Dec-18	ES1838118	<5	<50	<50	<500 - 130	0.13	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH08@1.00		14-Dec-18	ES1838116	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH08@3.00		14-Dec-18	ES1838116	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH09@1 .50		14-Dec-18	ES1838116	<5	<50	<50	<500 - 160	0.16	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH09@3.00		14-Dec-18	ES1838116	<5	<50	<50	<500 - 330	0.33	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH10@.020		14-Dec-18	ES1838116	<5	<50	<50	<500 - 110	0.11	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH10@4.00		14-Dec-18	ES1838116	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH11@1 .00		14-Dec-18	ES1838116	<5	<50	<50	<500 - 190	0.19	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH11@3.00		14-Dec-18	ES1838116	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH12@1.00		13-Dec-18	ES1838116	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH13@1.50		14-Dec-18	ES1838118	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH14@0.80		14-Dec-18	ES1838118	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH14@2.00		14-Dec-18	ES1838118	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH15@1.50		13-Dec-18	ES1838116	<5	<50	<50	<500 - 70	0.07	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH16@0.50		14-Dec-18	ES1838116	<5	<50	<50	<500 - 110	0.11	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH16@3.00		14-Dec-18	ES1838116	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH17@1.50		14-Dec-18	ES1838116	<5	<250	<250	<250	<0.25	<250	<250	<250	<250	<250	<250	<250	<1000	<250	<250	<250	<250	<250	<250	<250	<250	<250	<250	<250	<1000	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25
BH18@1.00		14-Dec-18	ES1838116	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH18@3.00		14-Dec-18	ES1838116	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH19@0.40		13-Dec-18	ES1838116	<5	<250	<250	<250	<0.25	<250	<250	<250	<250	<250	<250	<500 - 330	<1000	330	<250	<250	<250	<250	<250	<250	<250	<250	<250	<250	<1000	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25
BH19@4.00		13-Dec-18	ES1838118	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<500 - 50	<200	50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH21@1.00		14-Dec-18	ES1838118	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH21@3.00		14-Dec-18	ES1838118	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH22@1.00		12-Dec-18	ES1838118	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH23@1.00		13-Dec-18	ES1838118	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH23@2.00		13-Dec-18	ES1838118	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH23@3.00		13-Dec-18	ES1838116	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH24@1.50		13-Dec-18	ES1838116	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH24@4.50		13-Dec-18	ES1838116	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH25@1.00		12-Dec-18	ES1838118	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH26@1 .00		13-Dec-18	ES1838118	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH26@3.00		13-Dec-18	ES1838118	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05

Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020
10026439

				Organochlorine Pesticides																										Organopho									
				Vinyl chloride	a-BHC	Aldrin	Dieldrin	Aldrin + Dieldrin	b-BHC	chlordane	Chlordane (cis)	Chlordane (trans)	d-BHC	DDD	4,4-DDE	DDT	DDT+DDE+DDD	Endosulfan	Endrin ketone	Endosulfan I	Endosulfan II	Endosulfan sulphate	Endrin	Endrin aldehyde	g-BHC (Lindane)	Heptachlor	Heptachlor epoxide	Methoxychlor	Azinophos methyl	Bromophos-ethyl	Carbophenothion	Chlorfenvinphos	Chlorpyrifos	Chlorpyrifos-methyl	Demeton-S-methyl	Diazinon	Dichlorvos
				mg/kg	µg/kg	µg/kg	µg/kg	mg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	µg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg
EQL				5	50	50	50	0.05	50	50	50	50	50	50	50	200	50	50	50	50	50	50	50	50	50	50	50	200	0.05	0.05	0.05	0.05	0.05	0.05	0.05	0.05	0.05
PFAS NEMP 2018 Table 2 Health Industrial/Commercial																																						
PFAS NEMP 2018 Table 3 Interim EIE Commercial/Industrial																																						
NEPM 2013 Table 7 Asbestos HSL																																						
NEPM 2013 Table 1A(1) HILs Comm/Ind D Soil								45		530000							3600000	2000000					100000			50000		2500000					2000				
NEPM 2013 Table 1A(3) Comm/Ind D Soil HSL for Vapour Intrusion, Sand																																						
0-1m																																						
1-2m																																						
2-4m																																						
>4m																																						
NEPM 2013 Table 1B(6) ESLs for Comm/Ind, Coarse Soil																																						
0-2m																																						
NEPM 2013 Table 1B(7) Management Limits Comm / Ind, Coarse Soil																																						

Location_Code	Sample_Depth_Range	Sampled_Date_Time	Lab_Report_Number																																			
BH27@0.50		13-Dec-18	ES1838118	<5	<50	<50	<500 - 80	0.08	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH28@0.50		13-Dec-18	ES1838118	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH28@3.00		13-Dec-18	ES1838118	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH29@0.4		11-Feb-19	ES1904527	<5	<50	<50	390	0.39	<50	<50	<50	<50	<50	<50	190	<200	190	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH30@0.8		11-Feb-19	ES1904527	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH30@2.7		11-Feb-19	ES1904527	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH31@0.2		11-Feb-19	ES1904527	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH31@2.3		11-Feb-19	ES1904527	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH32@1		11-Feb-19	ES1904527	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	120	<200	120	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH32@1.9		11-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH33@0.5		11-Feb-19	ES1904527	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH33@2.5		11-Feb-19	ES1904527	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH34@0.3		12-Feb-19	ES1904527	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH34@3		12-Feb-19	ES1904527	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH35@0.7		12-Feb-19	ES1904527	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH36@1		12-Feb-19	ES1904527	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH36@1.5		12-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH36@2.1		12-Feb-19	ES1904527	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH37@1.1		12-Feb-19	ES1904527	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH37@1.5		12-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH37@2.7		12-Feb-19	ES1904527	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH38@0.3		12-Feb-19	ES1904527	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH38@1.6		12-Feb-19	ES1904527	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH39@0.3		12-Feb-19	ES1904527	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH39@2.5		12-Feb-19	ES1904527	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH40@0.3		12-Feb-19	ES1904527	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH41@2		12-Feb-19	ES1904527	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH41@2.4		12-Feb-19	ES1904527	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH42@1.5		12-Feb-19	ES1904527	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH44 - PACM		11-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH44@0.3		11-Feb-19	ES1904527	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH44@1		11-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH44@1.3		11-Feb-19	ES1904527	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH45@0.7		11-Feb-19	ES1904527	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH45@2.2		11-Feb-19	ES1904527	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH46@0.3		12-Feb-19	ES1904527	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH47@1.3		11-Feb-19	ES1904527	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH47@2.4		11-Feb-19	ES1904527	<5	<250	<250	<250	<0.08	<250	<80	<250	<250	<250	<250	<250	<1000	<80	<150	<250	<250	<250	<250	<250	<250	<250	<250	<250	<250	<1000	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25	<0.25
BH48@0.1		12-Feb-19	ES1904527	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH49@0.9		11-Feb-19	ES1904527	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
BH49@2.5		11-Feb-19	ES1904527	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05
MW01@1.00		12-Dec-18	ES1838118	<5	<50	<50	<50	<0.05	<50	<50	<50	<50	<50	<50	<50	<200	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<200	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05

Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020
10026439

| | | |

Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020
10026439

				sphorous Pesticides										Pesticides		Herbicides	Halogenated Hydrocarbons								Halogenated Benzenes										Explosives			
				Dimethoate	Ethion	Fenamiphos	Fenthion	Malathion	Methyl parathion	Monocrotophos	Parathion	Pirimphos-ethyl	Prothiofos	Chlorobenzilate	Carbazole	Pronamide	1,2-dibromoethane	cis-1,4-Dichloro-2-butene	trans-1,4-Dichloro-2-butene	Pentachloroethane	Bromomethane	Dichlorodifluoromethane	Iodomethane	Trichlorofluoromethane	1,2,3-trichlorobenzene	1,2,4-trichlorobenzene	1,2-dichlorobenzene	1,3-dichlorobenzene	1,4-dichlorobenzene	2-chlorotoluene	4-chlorotoluene	Bromobenzene	Chlorobenzene	Hexachlorobenzene	Pentachlorobenzene	1,3,5-Trinitrobenzene	2,4-Dinitrotoluene	2,6-dinitrotoluene	Nitrobenzene
				mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	µg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg
EQL				0.05	0.05	0.05	0.05	0.05	0.2	0.2	0.2	0.05	0.05	0.5	0.5	0.5	0.5	0.5	0.5	0.5	5	5	0.5	5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	50	0.5	0.5	1	1	0.5
PFAS NEMP 2018 Table 2 Health Industrial/Commercial																																							
PFAS NEMP 2018 Table 3 Interim EIE Commercial/Industrial																																							
NEPM 2013 Table 7 Asbestos HSL																																							
NEPM 2013 Table 1A(1) HILs Comm/Ind D Soil																																		80000					
NEPM 2013 Table 1A(3) Comm/Ind D Soil HSL for Vapour Intrusion, Sand																																							
0-1m																																							
1-2m																																							
2-4m																																							
>4m																																							
NEPM 2013 Table 1B(6) ESLs for Comm/Ind, Coarse Soil																																							
0-2m																																							
NEPM 2013 Table 1B(7) Management Limits Comm / Ind, Coarse Soil																																							
Location_Code	Sample_Depth_Range	Sampled_Date_Time	Lab_Report_Number																																				
BH01@0.50		12-Dec-18	ES1838116	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH01@2.00		12-Dec-18	ES1838116	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH02@1.00		12-Dec-18	ES1838116	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH02@2.50		12-Dec-18	ES1838116	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH03@1.00		12-Dec-18	ES1838118	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH03@2.00		12-Dec-18	ES1838116	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH04@0.20		12-Dec-18	ES1838118	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH05@1.00		12-Dec-18	ES1838118	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH06@0.50		14-Dec-18	ES1838116	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH06@2.40		14-Dec-18	ES1838116	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	0.6	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	0.8	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH07@0.20		14-Dec-18	ES1838118	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH08@1.00		14-Dec-18	ES1838116	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH08@3.00		14-Dec-18	ES1838116	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH09@1 .50		14-Dec-18	ES1838116	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH09@3.00		14-Dec-18	ES1838116	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH10@.020		14-Dec-18	ES1838116	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH10@4.00		14-Dec-18	ES1838116	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH11@1 .00		14-Dec-18	ES1838116	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH11@3.00		14-Dec-18	ES1838116	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH12@1.00		13-Dec-18	ES1838116	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH13@1.50		14-Dec-18	ES1838118	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH14@0.80		14-Dec-18	ES1838118	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH14@2.00		14-Dec-18	ES1838118	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH15@1.50		13-Dec-18	ES1838116	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH16@0.50		14-Dec-18	ES1838116	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH16@3.00		14-Dec-18	ES1838116	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH17@1.50		14-Dec-18	ES1838116	<0.25	<0.25	<0.25	<0.25	<0.25	<1	<0.2	<1	<0.25	<0.25	<0.5	5.1	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<250	<0.5	<0.5	<1	<1	<0.5
BH18@1.00		14-Dec-18	ES1838116	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH18@3.00		14-Dec-18	ES1838116	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH19@0.40		13-Dec-18	ES1838116	<0.25	<0.25	<0.25	<0.25	<0.25	<1	<1	<1	<0.25	<0.25	<0.5	0.7	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<250	<0.5	<0.5	<1	<1	<0.5
BH19@4.00		13-Dec-18	ES1838118	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH21@1.00		14-Dec-18	ES1838118	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH21@3.00		14-Dec-18	ES1838118	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH22@1.00		12-Dec-18	ES1838118	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH23@1.00		13-Dec-18	ES1838118	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH23@2.00		13-Dec-18	ES1838118	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH23@3.00		13-Dec-18	ES1838118	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH24@1.50		13-Dec-18	ES1838116	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH24@4.50		13-Dec-18	ES1838116	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH25@1.00		12-Dec-18	ES1838118	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH26@1 .00		13-Dec-18	ES1838118	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH26@3.00		13-Dec-18	ES1838118	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5

Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020
10026439

				sphorous Pesticides										Pesticides		Herbicides	Halogenated Hydrocarbons								Halogenated Benzenes										Explosives			
Location_Code	Sample_Depth_Range	Sampled_Date_Time	Lab_Report_Number	Dimethoate	Ethion	Fenamiphos	Fenthion	Malathion	Methyl parathion	Monocrotophos	Parathion	Pirimphos-ethyl	Prothiofos	Chlorobenzilate	Carbazole	Pronamide	1,2-dibromoethane	cis-1,4-Dichloro-2-butene	trans-1,4-Dichloro-2-butene	Pentachloroethane	Bromomethane	Dichlorodifluoromethane	Iodomethane	Trichlorofluoromethane	1,2,3-trichlorobenzene	1,2,4-trichlorobenzene	1,2-dichlorobenzene	1,3-dichlorobenzene	1,4-dichlorobenzene	2-chlorotoluene	4-chlorotoluene	Bromobenzene	Chlorobenzene	Hexachlorobenzene	Pentachlorobenzene	1,3,5-Trinitrobenzene	2,4-Dinitrotoluene	2,6-dinitrotoluene	Nitrobenzene
				mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	µg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg
EQL				0.05	0.05	0.05	0.05	0.05	0.2	0.2	0.2	0.05	0.05	0.5	0.5	0.5	0.5	0.5	0.5	0.5	5	5	0.5	5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	50	0.5	0.5	1	1	0.5
PFAS NEMP 2018 Table 2 Health Industrial/Commercial																																							
PFAS NEMP 2018 Table 3 Interim EIE Commercial/Industrial																																							
NEPM 2013 Table 7 Asbestos HSL																																							
NEPM 2013 Table 1A(1) HILs Comm/Ind D Soil																																		80000					
NEPM 2013 Table 1A(3) Comm/Ind D Soil HSL for Vapour Intrusion, Sand																																							
0-1m																																							
1-2m																																							
2-4m																																							
>4m																																							
NEPM 2013 Table 1B(6) ESLs for Comm/Ind, Coarse Soil																																							
0-2m																																							
NEPM 2013 Table 1B(7) Management Limits Comm / Ind, Coarse Soil																																							
BH27@0.50		13-Dec-18	ES1838118	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH28@0.50		13-Dec-18	ES1838118	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH28@3.00		13-Dec-18	ES1838118	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH29@0.4		11-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	2	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH30@0.8		11-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH30@2.7		11-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH31@0.2		11-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH31@2.3		11-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH32@1		11-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH32@1.9		11-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH33@0.5		11-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<3	<3	<3	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<3	<3	<3	<3	<0.5	<0.5	<0.5	<0.5	<50	<3	<3	<3	<3	<3
BH33@2.5		11-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH34@0.3		12-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH34@3		12-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<3	<3	<3	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<3	<3	<3	<3	<0.5	<0.5	<0.5	<0.5	<50	<3	<3	<3	<3	<3
BH35@0.7		12-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH36@1		12-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH36@1.5		12-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH36@2.1		12-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<3	<3	<3	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<3	<3	<3	<3	<0.5	<0.5	<0.5	<0.5	<50	<3	<3	<3	<3	<3
BH37@1.1		12-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<3	<3	<3	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<3	<3	<3	<3	<0.5	<0.5	<0.5	<0.5	<50	<3	<3	<3	<3	<3
BH37@1.5		12-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH37@2.7		12-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<3	<3	<3	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<3	<3	<3	<3	<0.5	<0.5	<0.5	<0.5	<50	<3	<3	<3	<3	<3
BH38@0.3		12-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH38@1.6		12-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<3	<3	<3	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<3	<3	<3	<3	<0.5	<0.5	<0.5	<0.5	<50	<3	<3	<3	<3	<3
BH39@0.3		12-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH39@2.5		12-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH40@0.3		12-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH41@2		12-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<3	<3	<3	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<3	<3	<3	<3	<0.5	<0.5	<0.5	<0.5	<50	<3	<3	<3	<3	<3
BH41@2.4		12-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH42@1.5		12-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH44 - PACM		11-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH44@0.3		11-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	1.2	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH44@1		11-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH44@1.3		11-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	5.6	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH45@0.7		11-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	0.9	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH45@2.2		11-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH46@0.3		12-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH47@1.3		11-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH47@2.4		11-Feb-19	ES1904527	<0.25	<0.25	<0.25	<0.25	<0.25	<1	<1	<1	<0.25	<0.25	<3	<3	<3	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<3	<3	<3	<3	<0.5	<0.5	<0.5	<0.5	<250	<3	<3	<3	<3	<3
BH48@0.1		12-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH49@0.9		11-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
BH49@2.5		11-Feb-19	ES1904527	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5
MW01@1.00		12-Dec-18	ES1838118	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<50	<0.5	<0.5	<1	<1	<0.5

Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020
10026439

	sphorous Pesticides										Pesticides		Herbicides	Halogenated Hydrocarbons								Halogenated Benzenes										Explosives			
	Dimethoate	Ethion	Fenamiphos	Fenthion	Malathion	Methyl parathion	Monocrotophos	Parathion	Pirimphos-ethyl	Prothiofos	Chlorobenzilate	Carbazole	Pronamide	1,2-dibromoethane	cis-1,4-Dichloro-2-butene	trans-1,4-Dichloro-2-butene	Pentachloroethane	Bromomethane	Dichlorodifluoromethane	Iodomethane	Trichlorofluoromethane	1,2,3-trichlorobenzene	1,2,4-trichlorobenzene	1,2-dichlorobenzene	1,3-dichlorobenzene	1,4-dichlorobenzene	2-chlorotoluene	4-chlorotoluene	Bromobenzene	Chlorobenzene	Hexachlorobenzene	Pentachlorobenzene	1,3,5-Trinitrobenzene	2,4-Dinitrotoluene	2,6-dinitrotoluene	Nitrobenzene
	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	µg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg
EQL	0.05	0.05	0.05	0.05	0.05	0.2	0.2	0.2	0.05	0.05	0.5	0.5	0.5	0.5	0.5	0.5	0.5	5	5	0.5	5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	50	0.5	0.5	1	1	0.5
PFAS NEMP 2018 Table 2 Health Industrial/Commercial																																				
PFAS NEMP 2018 Table 3 Interim EIE Commercial/Industrial																																				
NEPM 2013 Table 7 Asbestos HSL																																				
NEPM 2013 Table 1A(1) HILs Comm/Ind D Soil																															80000					
NEPM 2013 Table 1A(3) Comm/Ind D Soil HSL for Vapour Intrusion, Sand																																				
0-1m																																				
1-2m																																				
2-4m																																				
>4m																																				
NEPM 2013 Table 1B(6) ESLs for Comm/Ind, Coarse Soil																																				
0-2m																																				
NEPM 2013 Table 1B(7) Management Limits Comm / Ind, Coarse Soil																																				

Location_Code	Sample_Depth_Range	Sampled_Date_Time	Lab_Report_Number																																			
MW01@4.00		12-Dec-18	ES1838118	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<0.5
MW02@1.00		12-Dec-18	ES1838116	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<0.5
MW02@6.00		12-Dec-18	ES1838116	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<0.5
MW03@1.00		19-Dec-18	ES1838498	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<0.5
MW04@0.50		19-Dec-18	ES1838498	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<0.5
MW04@3.00		19-Dec-18	ES1838498	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<0.5
MW05@1.00		19-Dec-18	ES1838498	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<0.5
MW05@3.00		19-Dec-18	ES1838498	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<0.5
MW06@1.50		13-Dec-18	ES1838116	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<0.5
MW06@4.50		13-Dec-18	ES1838116	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<0.5
MW07@1.00		19-Dec-18	ES1838498	<0.05	<0.05	<0.05	<0.05	<0.05	<0.2	<0.2	<0.2	<0.05	<0.05	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<0.5
Near BH48 - ACM		12-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020
10026439

				Phthalates						Amino Aliphatics				Amino Aromatics		Anilines						Nitroaromatics			Solvents					
				Bis(2-ethylhexyl) phthalate	Butyl benzyl phthalate	Diethylphthalate	Dimethyl phthalate	Di-n-butyl phthalate	Di-n-octyl phthalate	N-nitrosodiethylamine	N-nitrosodi-n-butylamine	N-nitrosodi-n-propylamine	N-Nitrosomethylethylamine	1-naphthylamine	N-Nitrosodiphenyl & Diphenylamine	2-nitroaniline	3-nitroaniline	4-chloroaniline	4-nitroaniline	2-methyl-5-nitroaniline	Aniline	2-Picoline	4-aminobiphenyl	Pentachloronitrobenzene	Methyl Ethyl Ketone	2-hexanone (MBK)	4-Methyl-2-pentanone	Carbon disulfide	Isophorone	Vinyl acetate
				mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg
EQL				5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	1	1	1	0.5	0.5	0.5	0.5	0.5	0.5	0.5	5	5	5	0.5	0.5	5
PFAS NEMP 2018 Table 2 Health Industrial/Commercial																														
PFAS NEMP 2018 Table 3 Interim EIE Commercial/Industrial																														
NEPM 2013 Table 7 Asbestos HSL																														
NEPM 2013 Table 1A(1) HILs Comm/Ind D Soil																														
NEPM 2013 Table 1A(3) Comm/Ind D Soil HSL for Vapour Intrusion, Sand																														
0-1m																														
1-2m																														
2-4m																														
>4m																														
NEPM 2013 Table 1B(6) ESLs for Comm/Ind, Coarse Soil																														
0-2m																														
NEPM 2013 Table 1B(7) Management Limits Comm / Ind, Coarse Soil																														
Location_Code	Sample_Depth_Range	Sampled_Date_Time	Lab_Report_Number																											
BH01@0.50		12-Dec-18	ES1838116	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH01@2.00		12-Dec-18	ES1838116	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH02@1.00		12-Dec-18	ES1838116	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH02@2.50		12-Dec-18	ES1838116	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH03@1.00		12-Dec-18	ES1838118	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH03@2.00		12-Dec-18	ES1838116	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH04@0.20		12-Dec-18	ES1838118	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH05@1.00		12-Dec-18	ES1838118	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH06@0.50		14-Dec-18	ES1838116	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH06@2.40		14-Dec-18	ES1838116	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH07@0.20		14-Dec-18	ES1838118	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH08@1.00		14-Dec-18	ES1838116	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH08@3.00		14-Dec-18	ES1838116	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH09@1 .50		14-Dec-18	ES1838116	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH09@3.00		14-Dec-18	ES1838116	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH10@.020		14-Dec-18	ES1838116	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH10@4.00		14-Dec-18	ES1838116	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH11@1 .00		14-Dec-18	ES1838116	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH11@3.00		14-Dec-18	ES1838116	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH12@1.00		13-Dec-18	ES1838116	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH13@1.50		14-Dec-18	ES1838118	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH14@0.80		14-Dec-18	ES1838118	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH14@2.00		14-Dec-18	ES1838118	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH15@1.50		13-Dec-18	ES1838116	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH16@0.50		14-Dec-18	ES1838116	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH16@3.00		14-Dec-18	ES1838116	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH17@1.50		14-Dec-18	ES1838116	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH18@1.00		14-Dec-18	ES1838116	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH18@3.00		14-Dec-18	ES1838116	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH19@0.40		13-Dec-18	ES1838116	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH19@4.00		13-Dec-18	ES1838118	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH21@1.00		14-Dec-18	ES1838118	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH21@3.00		14-Dec-18	ES1838118	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH22@1.00		12-Dec-18	ES1838118	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH23@1.00		13-Dec-18	ES1838118	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH23@2.00		13-Dec-18	ES1838118	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH23@3.00		13-Dec-18	ES1838118	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH24@1.50		13-Dec-18	ES1838116	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH24@4.50		13-Dec-18	ES1838116	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH25@1.00		12-Dec-18	ES1838118	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH26@1 .00		13-Dec-18	ES1838118	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH26@3.00		13-Dec-18	ES1838118	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5

Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020
10026439

				Phthalates						Amino Aliphatics				Amino Aromatics		Anilines						Nitroaromatics			Solvents					
				Bis(2-ethylhexyl) phthalate	Butyl benzyl phthalate	Diethylphthalate	Dimethyl phthalate	Di-n-butyl phthalate	Di-n-octyl phthalate	N-nitrosodiethylamine	N-nitrosodi-n-butylamine	N-nitrosodi-n-propylamine	N-Nitrosomethylethylamine	1-naphthylamine	N-Nitrosodiphenyl & Diphenylamine	2-nitroaniline	3-nitroaniline	4-chloroaniline	4-nitroaniline	2-methyl-5-nitroaniline	Aniline	2-Picoline	4-aminobiphenyl	Pentachloronitrobenzene	Methyl Ethyl Ketone	2-hexanone (MBK)	4-Methyl-2-pentanone	Carbon disulfide	Isophorone	Vinyl acetate
				mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg
EQL				5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	1	1	1	0.5	0.5	0.5	0.5	0.5	0.5	0.5	5	5	5	0.5	0.5	5
PFAS NEMP 2018 Table 2 Health Industrial/Commercial																														
PFAS NEMP 2018 Table 3 Interim EIE Commercial/Industrial																														
NEPM 2013 Table 7 Asbestos HSL																														
NEPM 2013 Table 1A(1) HILs Comm/Ind D Soil																														
NEPM 2013 Table 1A(3) Comm/Ind D Soil HSL for Vapour Intrusion, Sand																														
0-1m																														
1-2m																														
2-4m																														
>4m																														
NEPM 2013 Table 1B(6) ESLs for Comm/Ind, Coarse Soil																														
0-2m																														
NEPM 2013 Table 1B(7) Management Limits Comm / Ind, Coarse Soil																														
Location_Code	Sample_Depth_Range	Sampled_Date_Time	Lab_Report_Number																											
BH27@0.50		13-Dec-18	ES1838118	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH28@0.50		13-Dec-18	ES1838118	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH28@3.00		13-Dec-18	ES1838118	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH29@0.4		11-Feb-19	ES1904527	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH30@0.8		11-Feb-19	ES1904527	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH30@2.7		11-Feb-19	ES1904527	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH31@0.2		11-Feb-19	ES1904527	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH31@2.3		11-Feb-19	ES1904527	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH32@1		11-Feb-19	ES1904527	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH32@1.9		11-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH33@0.5		11-Feb-19	ES1904527	<5	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<6	<3	<3	<3	<3	<3	<3	<3	<3	<3	<5	<5	<5	<0.5	<3	<5
BH33@2.5		11-Feb-19	ES1904527	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH34@0.3		12-Feb-19	ES1904527	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH34@3		12-Feb-19	ES1904527	<5	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<6	<3	<3	<3	<3	<3	<3	<3	<3	<3	<5	<5	<5	<0.5	<3	<5
BH35@0.7		12-Feb-19	ES1904527	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH36@1		12-Feb-19	ES1904527	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH36@1.5		12-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH36@2.1		12-Feb-19	ES1904527	<5	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<6	<3	<3	<3	<3	<3	<3	<3	<3	<3	<5	<5	<5	<0.5	<3	<5
BH37@1.1		12-Feb-19	ES1904527	<5	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<6	<3	<3	<3	<3	<3	<3	<3	<3	<3	<5	<5	<5	<0.5	<3	<5
BH37@1.5		12-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH37@2.7		12-Feb-19	ES1904527	<5	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<6	<3	<3	<3	<3	<3	<3	<3	<3	<3	<5	<5	<5	<0.5	<3	<5
BH38@0.3		12-Feb-19	ES1904527	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH38@1.6		12-Feb-19	ES1904527	<5	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<6	<3	<3	<3	<3	<3	<3	<3	<3	<3	<5	<5	<5	<0.5	<3	<5
BH39@0.3		12-Feb-19	ES1904527	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH39@2.5		12-Feb-19	ES1904527	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH40@0.3		12-Feb-19	ES1904527	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH41@2		12-Feb-19	ES1904527	<5	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<6	<3	<3	<3	<3	<3	<3	<3	<3	<3	<5	<5	<5	<0.5	<3	<5
BH41@2.4		12-Feb-19	ES1904527	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH42@1.5		12-Feb-19	ES1904527	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH44 - PACM		11-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH44@0.3		11-Feb-19	ES1904527	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH44@1		11-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BH44@1.3		11-Feb-19	ES1904527	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH45@0.7		11-Feb-19	ES1904527	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH45@2.2		11-Feb-19	ES1904527	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH46@0.3		12-Feb-19	ES1904527	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH47@1.3		11-Feb-19	ES1904527	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH47@2.4		11-Feb-19	ES1904527	<5	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<6	<3	<3	<3	<3	<3	<3	<3	<3	<3	<5	<5	<5	<0.5	<3	<5
BH48@0.1		12-Feb-19	ES1904527	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH49@0.9		11-Feb-19	ES1904527	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
BH49@2.5		11-Feb-19	ES1904527	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
MW01@1.00		12-Dec-18	ES1838118	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5

				Phthalates						Amino Aliphatics				Amino Aromatics		Anilines						Nitroaromatics			Solvents					
				Bis(2-ethylhexyl) phthalate	Butyl benzyl phthalate	Diethylphthalate	Dimethyl phthalate	Di-n-butyl phthalate	Di-n-octyl phthalate	N-nitrosodiethylamine	N-nitrosodi-n-butylamine	N-nitrosodi-n-propylamine	N-Nitrosomethylethylamine	1-naphthylamine	N-Nitrosodiphenyl & Diphenylamine	2-nitroaniline	3-nitroaniline	4-chloroaniline	4-nitroaniline	2-methyl-5-nitroaniline	Aniline	2-Picoline	4-aminobiphenyl	Pentachloronitrobenzene	Methyl Ethyl Ketone	2-hexanone (MBK)	4-Methyl-2-pentanone	Carbon disulfide	Isophorone	Vinyl acetate
				mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg	mg/kg
EQL				5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.5	1	1	1	0.5	0.5	0.5	0.5	0.5	0.5	0.5	5	5	5	0.5	0.5	5
PFAS NEMP 2018 Table 2 Health Industrial/Commercial																														
PFAS NEMP 2018 Table 3 Interim EIE Commercial/Industrial																														
NEPM 2013 Table 7 Asbestos HSL																														
NEPM 2013 Table 1A(1) HILs Comm/Ind D Soil																														
NEPM 2013 Table 1A(3) Comm/Ind D Soil HSL for Vapour Intrusion, Sand																														
0-1m																														
1-2m																														
2-4m																														
>4m																														
NEPM 2013 Table 1B(6) ESLs for Comm/Ind, Coarse Soil																														
0-2m																														
NEPM 2013 Table 1B(7) Management Limits Comm / Ind, Coarse Soil																														
Location_Code	**Sample_Depth_Range**	**Sampled_Date_Time**	**Lab_Report_Number**																												
MW01@4.00		12-Dec-18	ES1838118	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
MW02@1.00		12-Dec-18	ES1838116	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
MW02@6.00		12-Dec-18	ES1838116	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
MW03@1.00		19-Dec-18	ES1838498	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
MW04@0.50		19-Dec-18	ES1838498	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
MW04@3.00		19-Dec-18	ES1838498	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
MW05@1.00		19-Dec-18	ES1838498	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
MW05@3.00		19-Dec-18	ES1838498	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
MW06@1.50		13-Dec-18	ES1838116	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
MW06@4.50		13-Dec-18	ES1838116	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
MW07@1.00		19-Dec-18	ES1838498	<5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<1	<1	<1	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<0.5	<5	<5	<5	<0.5	<0.5	<5
Near BH48 - ACM		12-Feb-19	ES1904527	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

10026439
Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020

	PAH/Phenols	SVOCs																Inorganics	PFOS/PFOA																									
	Acetophenone	2-(acetylamino) fluorene	3,3-Dichlorobenzidine	4-(dimethylamino) azobenzene	4-bromophenyl phenyl ether	4-chlorophenyl phenyl ether	4-Nitroquinoline-N-oxide	Azobenzene	Bis(2-chloroethoxy) methane	Bis(2-chloroethyl)ether	Dibenzofuran	Hexachloropropene	Methapyrilene	N-nitrosomorpholine	N-nitrosopiperidine	N-nitrosopyrrolidine	Phenacetin	Ammonia as N	4:2 Fluorotelomer sulfonic acid (4:2 FTS)	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	N-Methyl perfluorooctane sulfonamide (NMeFOSA)	N-Methylperfluorooctanesulfonamidoethanol (N-MeFOSE)	N-methylperfluorooctane sulfonamidoacetic acid (NMeFOSAA)	N-Ethyl perfluorooctane sulfonamide (NEtFOSA)	N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	N-ethyl-perfluorooctanesulfonamidoacetic acid (NEtFOSAA)	Perfluorodecanesulfonic acid (PFDS)	Perfluorooctanesulfonic acid (PFOS)	Perfluorooctanoic acid (PFOA)	Perfluorohexane sulfonic acid (PFHxS)	Perfluoropentane sulfonic acid (PFPeS)	Perfluoropentanoic acid (PFPeA)	Perfluoroheptane sulfonic acid (PFHpS)	Perfluorobutanoic acid (PFBA)	Perfluorodecanoic acid (PFDA)	Perfluorobutane sulfonic acid (PFBS)	Perfluorododecanoic acid (PFDoDA)	Perfluoroheptanoic acid (PFHpA)	Perfluorononanoic acid (PFNA)	Perfluorohexanoic acid (PFHxA)	Perfluorooctane sulfonamide (PFOSA)	Perfluorotetradecanoic acid (PFTeDA)	Perfluorotridecanoic acid (PFTrDA)
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	mg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
EQL	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	4	2	0.01	0.05	0.05	0.05	0.05	0.05	0.05	0.02	0.05	0.05	0.02	0.02	0.01	0.01	0.02	0.02	0.02	0.02	0.1	0.02	0.02	0.02	0.02	0.02	0.02	0.05	0.02
ANZG (2018) Marine water 95% toxicant DGVs																		0.91																										
PFAS NEMP 2018 Table 5 Interim marine 95%																														0.13	220													
NEPM 2013 Table 1A(4) Comm/Ind HSL D GW for Vapour Intrusion, Sand																																											
2-4m																																											
4-8m																																											
>8m																																											
NEPM 2013 Table 1C GILs, Marine Waters																		0.91																										
Field_ID	**Sampled_Date_Time**	**Lab_Report_Number**																																									
MW01	08-Jan-19	ES1900690	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4	<2	0.01	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.05	<0.02	<0.02	0.03	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	<0.02
MW02	08-Jan-19	ES1900690	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4	<2	0.43	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.05	<0.02	<0.02	0.03	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	<0.02
MW03	08-Jan-19	ES1900690	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4	<2	3.27	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.05	<0.02	<0.02	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	<0.02
MW04	08-Jan-19	ES1900690	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4	<2	0.95	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.05	<0.02	<0.02	0.02	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	<0.02
MW05	08-Jan-19	ES1900690	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4	<2	0.25	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.05	<0.02	<0.02	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	<0.02
MW06	08-Jan-19	ES1900690	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4	<2	0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.05	<0.02	<0.02	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	<0.02
MW07	08-Jan-19	ES1900690	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4	<2	0.02	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.05	<0.02	<0.02	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	<0.02	<0.02	<0.05	<0.02
MW1	19-Feb-19	ES1905103	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4	<2	6.6	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.05	<0.02	<0.02	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	0.04	<0.02	<0.05	<0.02
MW2	19-Feb-19	ES1905103	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4	<2	3.9	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.05	<0.02	<0.02	<0.01	<0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	0.07	<0.02	<0.05	<0.02
MW3	19-Feb-19	ES1905103	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4	<2	3.2	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.05	<0.02	<0.02	0.02	0.01	<0.02	<0.02	<0.02	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	0.08	<0.02	<0.05	<0.02
MW4	19-Feb-19	ES1905103	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4	<2	9	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.02	<0.05	<0.05	<0.02	<0.02	0.03	0.01	0.05	<0.02	0.03	<0.02	<0.1	<0.02	<0.02	<0.02	<0.02	0.03	<0.02	<0.05	<0.02

10026439
Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020

					Metals								TPH					TRH							BTEX							MAH									PAH											
	Perfluoroundecanoic acid (PFUnDA)	Sum of PFHxS and PFOS	Sum of PFAS	Sum of PFAS (WA DER List)	Arsenic (Filtered)	Cadmium (Filtered)	Chromium (III+VI) (Filtered)	Copper (Filtered)	Lead (Filtered)	Mercury (Filtered)	Nickel (Filtered)	Zinc (Filtered)	C6-C9	C10-C14	C15-C28	C29-C36	C10-C36 (Sum of total)	C6-C10	>C6-C10 less BTEX (F1)	C10-C16	>C10-C16 less Naphthalene (F2)	C16-C34	C34-C40	>C10 - C40 (Sum of total)	Benzene	Toluene	Ethylbenzene	Xylene (m & p)	Xylene (o)	Xylene Total	Total BTEX	1,2,4-trimethylbenzene	1,3,5-trimethylbenzene	Isopropylbenzene	n-butylbenzene	n-propylbenzene	p-isopropyltoluene	sec-butylbenzene	Styrene	tert-butylbenzene	2-chloronaphthalene	2-methylnaphthalene	3-methylcholanthrene	7,12-dimethylbenz(a)anthracene	Acenaphthene	Acenaphthylene	Anthracene	Benz(a)anthracene	Benzo(a) pyrene	Benzo(a)pyrene TEQ calc (Zero)	Benzo(g,h,i)perylene	Benzo(b+j+k)fluoranthene
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	ug/L
EQL	0.02	0.01	0.01	0.01	1	0.1	1	1	1	0.1	1	5	20	50	100	50	50	20	20	100	100	100	100	100	1	2	2	2	2	2	1	5	5	5	5	5	5	5	5	5	2	2	2	2	2	2	2	2	2	2	2	4
ANZG (2018) Marine water 95% toxicant DGVs						5.5	4.4	1.3	4.4	0.4	70	15													700																												
PFAS NEMP 2018 Table 5 Interim marine 95%																																																			
NEPM 2013 Table 1A(4) Comm/Ind HSL D GW for Vapour In																																																			
2-4m																			6000		NL				5000	NL	NL			NL																							
4-8m																			6000		NL				5000	NL	NL			NL																							
>8m																			7000		NL				5000	NL	NL			NL																							
NEPM 2013 Table 1C GILs, Marine Waters					13	0.7	4.4	1.3	4.4	0.1	7	15													500																												

Field_ID	Sampled_Date_Time	Lab_Report_Number																																																		
MW01	08-Jan-19	ES1900690	<0.02	0.03	0.03	0.03	<1	<0.1	<1	<1	<1	<0.1	5	1180	<20	<50	<100	<50	<50	<20	<20	<100	<100	<100	<100	<100	<1	<2	<2	<2	<2	<2	<1	<5	<5	<5	<5	<5	<5	<5	<5	<5	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4
MW02	08-Jan-19	ES1900690	<0.02	0.03	0.03	0.03	27	<0.1	<1	<1	<1	<0.1	2	20	<20	<50	<100	<50	<50	<20	<20	<100	<100	<100	<100	<100	<1	<2	<2	<2	<2	<2	<1	<5	<5	<5	<5	<5	<5	<5	<5	<5	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4
MW03	08-Jan-19	ES1900690	<0.02	<0.01	<0.01	<0.01	1	<0.1	<1	<1	<1	<0.1	2	<5	<20	<50	<100	<50	<50	<20	<20	<100	<100	<100	<100	<100	<1	<2	<2	<2	<2	<2	<1	<5	<5	<5	<5	<5	<5	<5	<5	<5	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4
MW04	08-Jan-19	ES1900690	<0.02	0.02	0.02	0.02	8	<0.1	<1	<1	<1	<0.1	1	23	<20	<50	<100	<50	<50	<20	<20	<100	<100	<100	<100	<100	<1	<2	<2	<2	<2	<2	<1	<5	<5	<5	<5	<5	<5	<5	<5	<5	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4
MW05	08-Jan-19	ES1900690	<0.02	<0.01	<0.01	<0.01	4	0.7	<1	1	1	<0.1	2	1550	<20	<50	<100	<50	<50	<20	<20	<100	<100	<100	<100	<100	<1	<2	<2	<2	<2	<2	<1	<5	<5	<5	<5	<5	<5	<5	<5	<5	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4
MW06	08-Jan-19	ES1900690	<0.02	<0.01	<0.01	<0.01	<1	<0.1	<1	4	<1	<0.1	<1	304	<20	<50	<100	<50	<50	<20	<20	<100	<100	<100	<100	<100	<1	<2	<2	<2	<2	<2	<1	<5	<5	<5	<5	<5	<5	<5	<5	<5	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4
MW07	08-Jan-19	ES1900690	<0.02	<0.01	<0.01	<0.01	<1	<0.1	<1	<1	<1	<0.1	<1	1660	<20	<50	<100	<50	<50	<20	<20	<100	<100	<100	<100	<100	<1	<2	<2	<2	<2	<2	<1	<5	<5	<5	<5	<5	<5	<5	<5	<5	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4
MW1	19-Feb-19	ES1905103	<0.02	<0.01	0.04	<0.01	<1	<0.1	<1	<1	<1	<0.1	<1	<5	<20	270	860	<50	1130	<20	<20	500	500	620	<100	1120	<1	<2	<2	<2	<2	<2	<1	<5	<5	<5	<5	<5	<5	<5	<5	<5	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4
MW2	19-Feb-19	ES1905103	<0.02	<0.01	0.07	<0.01	<1	<0.1	1	<1	<1	<0.1	<1	6	<20	<50	<100	<50	<50	<20	<20	<100	<100	<100	<100	<100	1	<2	<2	<2	<2	<2	1	<5	<5	<5	<5	<5	<5	<5	<5	<5	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4
MW3	19-Feb-19	ES1905103	<0.02	0.02	0.11	0.03	<1	<0.1	1	1	2	<0.1	2	10	<20	<50	140	<50	140	<20	<20	<100	<100	110	<100	110	<1	<2	<2	<2	<2	<2	<1	<5	<5	<5	<5	<5	<5	<5	<5	<5	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4
MW4	19-Feb-19	ES1905103	<0.02	0.08	0.15	0.15	4	<0.1	3	<1	<1	<0.1	2	<5	60	<50	<100	<50	<50	60	60	<100	<100	<100	<100	<100	<1	<2	<2	<2	<2	<2	<1	<5	<5	10	<5	<5	<5	<5	<5	<5	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4

10026439
Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020

| | | |

10026439
Qantas Flight Training Centre and Carpark
297 King St, Mascot NSW 2020

	Organochlorine Pesticides															Organophosphorous Pesticides										Pesticides		Herbicides	Halogenated Hydrocarbons								Halogenated Benzenes									Explosives			
	Dieldrin	Aldrin + Dieldrin	b-BHC	d-BHC	DDD	4,4-DDE	DDT	DDT+DDE+DDD	Endosulfan I	Endosulfan II	Endosulfan sulphate	Endrin	g-BHC (Lindane)	Heptachlor	Heptachlor epoxide	Chlorfenvinphos	Chlorpyrifos	Chlorpyrifos-methyl	Diazinon	Dichlorvos	Dimethoate	Ethion	Fenthion	Malathion	Pirimphos-ethyl	Prothiofos	Chlorobenzilate	Carbazole	Pronamide	1,2-dibromoethane	cis-1,4-Dichloro-2-butene	trans-1,4-Dichloro-2-butene	Pentachloroethane	Bromomethane	Dichlorodifluoromethane	Iodomethane	Trichlorofluoromethane	1,2,3-trichlorobenzene	1,2,4-trichlorobenzene	1,2-dichlorobenzene	1,3-dichlorobenzene	1,4-dichlorobenzene	2-chlorotoluene	4-chlorotoluene	Bromobenzene	Chlorobenzene	Hexachlorobenzene	Pentachlorobenzene	1,3,5-Trinitrobenzene	2,4-Dinitrotoluene	2,6-dinitrotoluene	Nitrobenzene
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	ug/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	mg/L	µg/L	µg/L	µg/L
EQL	2	4	2	2	2	2	4	4	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	5	5	5	5	50	50	5	50	5	2	2	2	2	5	5	5	5	4	2	0.002	4	4	2
ANZG (2018) Marine water 95% toxicant DGVs												0.008					0.009																						80													
PFAS NEMP 2018 Table 5 Interim marine 95%												0.008					0.009																						80													
NEPM 2013 Table 1A(4) Comm/Ind HSL D GW for Vapour Ir																																																		
2-4m																																																			
4-8m																																																		
>8m																																																		
NEPM 2013 Table 1C GILs, Marine Waters												0.004					0.009																						20													

| Field_ID | Sampled_Date_Time | Lab_Report_Number | | | | | | | | | | | | | | | | | | |

	Phthalates						Amino Aliphatics				Amino Aromatics		Anilines						Nitroaromatics			Solvents						
	Bis(2-ethylhexyl) phthalate	Butyl benzyl phthalate	Diethylphthalate	Dimethyl phthalate	Di-n-butyl phthalate	Di-n-octyl phthalate	N-nitrosodiethylamine	N-nitrosodi-n-butylamine	N-nitrosodi-n-propylamine	N-Nitrosomethylethylamine	1-naphthylamine	N-Nitrosodiphenyl & Diphenylamine	2-nitroaniline	3-nitroaniline	4-chloroaniline	4-nitroaniline	2-methyl-5-nitroaniline	Aniline	2-Picoline	4-aminobiphenyl	Pentachloronitrobenzene	Methyl Ethyl Ketone	2-hexanone (MBK)	4-Methyl-2-pentanone	Carbon disulfide	Isophorone	Vinyl acetate
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
EQL	10	2	2	2	2	2	2	2	2	2	2	4	4	4	2	2	2	2	2	2	2	50	50	50	5	2	50
ANZG (2018) Marine water 95% toxicant DGVs																											
PFAS NEMP 2018 Table 5 Interim marine 95%																											
NEPM 2013 Table 1A(4) Comm/Ind HSL D GW for Vapour Ir																											
2-4m																											
4-8m																											
>8m																											
NEPM 2013 Table 1C GILs, Marine Waters																											

Field_ID	Sampled_Date_Time	Lab_Report_Number																										
MW01	08-Jan-19	ES1900690	<10	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4	<4	<4	<2	<2	<2	<2	<2	<2	<2	<50	<50	<50	<5	<2	<50
MW02	08-Jan-19	ES1900690	<10	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4	<4	<4	<2	<2	<2	<2	<2	<2	<2	<50	<50	<50	<5	<2	<50
MW03	08-Jan-19	ES1900690	<10	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4	<4	<4	<2	<2	<2	<2	<2	<2	<2	<50	<50	<50	<5	<2	<50
MW04	08-Jan-19	ES1900690	<10	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4	<4	<4	<2	<2	<2	<2	<2	<2	<2	<50	<50	<50	<5	<2	<50
MW05	08-Jan-19	ES1900690	<10	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4	<4	<4	<2	<2	<2	<2	<2	<2	<2	<50	<50	<50	<5	<2	<50
MW06	08-Jan-19	ES1900690	<10	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4	<4	<4	<2	<2	<2	<2	<2	<2	<2	<50	<50	<50	<5	<2	<50
MW07	08-Jan-19	ES1900690	<10	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4	<4	<4	<2	<2	<2	<2	<2	<2	<2	<50	<50	<50	<5	<2	<50
MW1	19-Feb-19	ES1905103	<10	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4	<4	<4	<2	<2	<2	<2	<2	<2	<2	<50	<50	<50	<5	<2	<50
MW2	19-Feb-19	ES1905103	<10	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4	<4	<4	<2	<2	<2	<2	<2	<2	<2	<50	<50	<50	<5	<2	<50
MW3	19-Feb-19	ES1905103	<10	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4	<4	<4	<2	<2	<2	<2	<2	<2	<2	<50	<50	<50	<5	<2	<50
MW4	19-Feb-19	ES1905103	<10	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<4	<4	<4	<2	<2	<2	<2	<2	<2	<2	<50	<50	<50	<5	<2	<50

Field Duplicates (water)
Filter: SDG in('ALSE-Sydney 10-Jan-19')

SDG	ALSE-Sydney 10-Jan-19	ALSE-Sydney 10-Jan-19	
Field ID	MW03	DUP	RPD
Sampled Date/Time	08-01-19 15:00	08-01-19 15:00	

Method_Type	ChemName	Units	EQL			
Semivolatile Organic Compounds	2-(acetylamino) fluorene	µg/L	2	<2	<2	0
	3,3-Dichlorobenzidine	µg/L	2	<2	<2	0
	4-(dimethylamino) azobenzene	µg/L	2 : 5 (Interlab)	<2	<2	0
	4-bromophenyl phenyl ether	µg/L	2 : 5 (Interlab)	<2	<2	0
	4-chlorophenyl phenyl ether	µg/L	2 : 5 (Interlab)	<2	<2	0
	4-Nitroquinoline-N-oxide	µg/L	2	<2	<2	0
	Acetophenone	µg/L	2 : 5 (Interlab)	<2	<2	0
	Azobenzene	µg/L	2 : 5 (Interlab)	<2	<2	0
	Bis(2-chloroethoxy) methane	µg/L	2 : 5 (Interlab)	<2	<2	0
	Bis(2-chloroethyl)ether	µg/L	2 : 5 (Interlab)	<2	<2	0
	Dibenzofuran	µg/L	2 : 5 (Interlab)	<2	<2	0
	Hexachloropropene	µg/L	2	<2	<2	0
	Methapyrilene	µg/L	2 : 10 (Interlab)	<2	<2	0
	N-nitrosomorpholine	µg/L	2 : 5 (Interlab)	<2	<2	0
	N-nitrosopiperidine	µg/L	2 : 5 (Interlab)	<2	<2	0
	N-nitrosopyrrolidine	µg/L	4	<4	<4	0
	Phenacetin	µg/L	2 : 5 (Interlab)	<2	<2	0
Ammonia as N by Discrete analyser	Ammonia as N	mg/l	0.01	3.27	3.18	3
Per- and Polyfluoroalkyl Substances (PFAS) by LCMS	4:2 Fluorotelomer sulfonic acid (4:2 FTS)	µg/L	0.05	<0.05	<0.05	0
	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	µg/L	0.05 : 0.01 (Interlab)	<0.05	<0.05	0
	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	µg/L	0.05 : 0.01 (Interlab)	<0.05	<0.05	0
	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	µg/L	0.05	<0.05	<0.05	0
	N-Methyl perfluorooctane sulfonamide (NMeFOSA)	µg/L	0.05	<0.05	<0.05	0
	N-Methylperfluorooctanesulfonamidoethanol (N-MeFOSE)	µg/L	0.05	<0.05	<0.05	0
	N-methylperfluorooctane sulfonamidoacetic acid (NMeFOSAA)	µg/L	0.02	<0.02	<0.02	0
	N-Ethyl perfluorooctane sulfonamide (NEtFOSA)	µg/L	0.05	<0.05	<0.05	0
	N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	µg/L	0.05	<0.05	<0.05	0
	N-ethyl-perfluorooctanesulfonamidoacetic acid (NEtFOSAA)	µg/L	0.02	<0.02	<0.02	0
	Perfluorodecanesulfonic acid (PFDS)	µg/L	0.02	<0.02	<0.02	0
	Perfluorooctanesulfonic acid (PFOS)	µg/L	0.01	<0.01	<0.01	0
	Perfluorooctanoic acid (PFOA)	µg/L	0.01	<0.01	<0.01	0
	Perfluorohexane sulfonic acid (PFHxS)	µg/L	0.02 : 0.01 (Interlab)	<0.02	<0.02	0
	Perfluoropentane sulfonic acid (PFPeS)	µg/L	0.02	<0.02	<0.02	0
	Perfluoropentanoic acid (PFPeA)	µg/L	0.02	<0.02	<0.02	0
	Perfluoroheptane sulfonic acid (PFHpS)	µg/L	0.02	<0.02	<0.02	0
	Perfluorobutanoic acid (PFBA)	µg/L	0.1	<0.1	<0.1	0
	Perfluorodecanoic acid (PFDA)	µg/L	0.02	<0.02	<0.02	0
	Perfluorobutane sulfonic acid (PFBS)	µg/L	0.02	<0.02	<0.02	0
	Perfluorododecanoic acid (PFDoDA)	µg/L	0.02	<0.02	<0.02	0
	Perfluoroheptanoic acid (PFHpA)	µg/L	0.02	<0.02	<0.02	0
	Perfluorononanoic acid (PFNA)	µg/L	0.02	<0.02	<0.02	0
	Perfluorohexanoic acid (PFHxA)	µg/L	0.02	<0.02	<0.02	0
	Perfluorooctane sulfonamide (PFOSA)	µg/L	0.02	<0.02	<0.02	0
	Perfluorotetradecanoic acid (PFTeDA)	µg/L	0.05	<0.05	<0.05	0
	Perfluorotridecanoic acid (PFTrDA)	µg/L	0.02	<0.02	<0.02	0
	Perfluoroundecanoic acid (PFUnDA)	µg/L	0.02	<0.02	<0.02	0
	Sum of PFHxS and PFOS	µg/L	0.01	<0.01	<0.01	0
	Sum of PFAS	µg/L	0.01	<0.01	<0.01	0
	Sum of PFAS (WA DER List)	µg/L	0.01	<0.01	<0.01	0
Dissolved Mercury by FIMS	Mercury (Filtered)	µg/l	0.1 : 0.05 (Interlab)	<0.1	<0.1	0
Dissolved Metals by ICP-MS - Suite A	Arsenic (Filtered)	µg/l	1	1	<1	0
	Cadmium (Filtered)	µg/l	0.1	<0.1	<0.1	0
	Chromium (III+VI) (Filtered)	µg/l	1	<1	<1	0
	Copper (Filtered)	µg/l	1	<1	<1	0
	Lead (Filtered)	µg/l	1	<1	<1	0
	Nickel (Filtered)	µg/l	1	2	<1	67
	Zinc (Filtered)	µg/l	5 : 1 (Interlab)	<5	<5	0
TRH - Semivolatile Fraction	C10-C14	µg/L	50	<50	<50	0
	C15-C28	µg/L	100	<100	<100	0
	C29-C36	µg/L	50 : 100 (Interlab)	<50	<50	0
	C10-C36 (Sum of total)	µg/L	50	<50	<50	0
TRH Volatiles/BTEX	C6-C9	µg/L	20 : 10 (Interlab)	<20	<20	0
TRH - Semivolatile Fraction	C10-C16	µg/L	100 : 50 (Interlab)	<100	<100	0
	>C10-C16 less Naphthalene (F2)	µg/L	100	<100	<100	0
	C16-C34	µg/L	100	<100	<100	0
	C34-C40	µg/L	100	<100	<100	0
	>C10 - C40 (Sum of total)	µg/L	100	<100	<100	0
TRH Volatiles/BTEX	C6-C10	µg/L	20 : 10 (Interlab)	<20	<20	0
	>C6-C10 less BTEX (F1)	µg/L	20	<20	<20	0
	Xylene Total	µg/L	2	<2	<2	0
	Total BTEX	µg/L	1	<1	<1	0
Volatile Organic Compounds	Benzene	µg/L	1	<1	<1	0
	Toluene	µg/L	2 : 1 (Interlab)	<2	<2	0
	Ethylbenzene	µg/L	2 : 1 (Interlab)	<2	<2	0
	Xylene (m & p)	µg/L	2	<2	<2	0
	Xylene (o)	µg/L	2 : 1 (Interlab)	<2	<2	0
	1,2,4-trimethylbenzene	µg/L	5 : 1 (Interlab)	<5	<5	0
	1,3,5-trimethylbenzene	µg/L	5 : 1 (Interlab)	<5	<5	0
	Isopropylbenzene	µg/L	5 : 1 (Interlab)	<5	<5	0
	n-butylbenzene	µg/L	5 : 1 (Interlab)	<5	<5	0
	n-propylbenzene	µg/L	5 : 1 (Interlab)	<5	<5	0
	p-isopropyltoluene	µg/L	5 : 1 (Interlab)	<5	<5	0
	sec-butylbenzene	µg/L	5 : 1 (Interlab)	<5	<5	0
	Styrene	µg/L	5 : 1 (Interlab)	<5	<5	0
	tert-butylbenzene	µg/L	5 : 1 (Interlab)	<5	<5	0
Semivolatile Organic Compounds	2-chloronaphthalene	µg/L	2	<2	<2	0
	2-methylnaphthalene	µg/L	2	<2	<2	0
	3-methylcholanthrene	µg/L	2	<2	<2	0
	7,12-dimethylbenz(a)anthracene	µg/L	2	<2	<2	0
	Acenaphthene	µg/L	2	<2	<2	0
	Acenaphthylene	µg/L	2	<2	<2	0
	Anthracene	µg/L	2	<2	<2	0
	Benz(a)anthracene	µg/L	2	<2	<2	0
	Benzo(a) pyrene	µg/L	2	<2	<2	0
	Benzo(a)pyrene TEQ calc (Zero)	µg/L	2	<2	<2	0

Field Duplicates (water)
Filter: SDG in('ALSE-Sydney 10-Jan-19')

				SDG	ALSE-Sydney 10-Jan-19	ALSE-Sydney 10-Jan-19	
				Field ID	MW03	DUP	RPD
				Sampled Date/Time	08-01-19 15:00	08-01-19 15:00	
	Benzo(g,h,i)perylene	µg/L	2		<2	<2	0
	Benzo(b+j+k)fluoranthene	µg/L	4		<4	<4	0
	Chrysene	µg/L	2		<2	<2	0
	Dibenz(a,h)anthracene	µg/L	2		<2	<2	0
	Fluoranthene	µg/L	2		<2	<2	0
	Fluorene	µg/L	2		<2	<2	0
	Indeno(1,2,3-c,d)pyrene	µg/L	2		<2	<2	0
	Naphthalene	µg/L	2		<2	<2	0
	Phenanthrene	µg/L	2		<2	<2	0
	Pyrene	µg/L	2		<2	<2	0
	PAHs (Sum of total)	µg/L	2		<2	<2	0
TRH Volatiles/BTEX	Naphthalene	µg/L	5 : 2 (Interlab)		<5	<5	0
Semivolatile Organic Compounds	2,4,5-trichlorophenol	µg/L	2		<2	<2	0
	2,4,6-trichlorophenol	µg/L	2		<2	<2	0
	2,4-dichlorophenol	µg/L	2		<2	<2	0
	2,4-dimethylphenol	µg/L	2		<2	<2	0
	2,6-dichlorophenol	µg/L	2		<2	<2	0
	2-chlorophenol	µg/L	2		<2	<2	0
	2-nitrophenol	µg/L	2		<2	<2	0
	2-methylphenol	µg/L	2		<2	<2	0
	3&4-Methylphenol (m&p-cresol)	µg/L	4		<4	<4	0
	4-chloro-3-methylphenol	µg/L	2 : 10 (Interlab)		<2	<2	0
	Pentachlorophenol	µg/L	4 : 10 (Interlab)		<4	<4	0
	Phenol	µg/L	2		<2	<2	0
	Hexachlorocyclopentadiene	µg/L	10 : 5 (Interlab)		<10	<10	0
	Hexachloroethane	µg/L	2		<2	<2	0
	Hexachlorobutadiene	µg/L	2 : 1 (Interlab)		<2	<2	0
Volatile Organic Compounds	1,1,2,2-tetrachloroethane	µg/L	5 : 1 (Interlab)		<5	<5	0
	1,1,1,2-tetrachloroethane	µg/L	5 : 1 (Interlab)		<5	<5	0
	1,1,2-trichloroethane	µg/L	5 : 1 (Interlab)		<5	<5	0
	1,1,1-trichloroethane	µg/L	5 : 1 (Interlab)		<5	<5	0
	1,1-dichloroethane	µg/L	5 : 1 (Interlab)		<5	<5	0
	1,1-dichloroethene	µg/L	5 : 1 (Interlab)		<5	<5	0
	1,1-dichloropropene	µg/L	5 : 1 (Interlab)		<5	<5	0
	1,2,3-trichloropropane	µg/L	5 : 1 (Interlab)		<5	<5	0
	1,2-dibromo-3-chloropropane	µg/L	5 : 1 (Interlab)		<5	<5	0
	1,2-dichloroethane	µg/L	5 : 1 (Interlab)		<5	<5	0
	1,2-dichloropropane	µg/L	5 : 1 (Interlab)		<5	<5	0
	1,3-dichloropropane	µg/L	5 : 1 (Interlab)		<5	<5	0
	2,2-dichloropropane	µg/L	5 : 1 (Interlab)		<5	<5	0
	Bromodichloromethane	µg/L	5 : 1 (Interlab)		<5	<5	0
	Bromoform	µg/L	5 : 1 (Interlab)		<5	<5	0
	Carbon tetrachloride	µg/L	5 : 1 (Interlab)		<5	<5	0
	Chlorodibromomethane	µg/L	5 : 1 (Interlab)		<5	<5	0
	Chloroethane	µg/L	50 : 10 (Interlab)		<50	<50	0
	Chloroform	µg/L	5 : 1 (Interlab)		<5	<5	0
	Chloromethane	µg/L	50 : 10 (Interlab)		<50	<50	0
	cis-1,2-dichloroethene	µg/L	5 : 1 (Interlab)		18	19	5
	cis-1,3-dichloropropene	µg/L	5 : 1 (Interlab)		<5	<5	0
	Dibromomethane	µg/L	5 : 1 (Interlab)		<5	<5	0
	Trichloroethene	µg/L	5 : 1 (Interlab)		<5	<5	0
	Tetrachloroethene	µg/L	5 : 1 (Interlab)		<5	<5	0
	trans-1,2-dichloroethene	µg/L	5 : 1 (Interlab)		<5	<5	0
	trans-1,3-dichloropropene	µg/L	5 : 1 (Interlab)		<5	<5	0
	Vinyl chloride	µg/L	50 : 10 (Interlab)		<50	<50	0
Semivolatile Organic Compounds	a-BHC	µg/L	2		<2	<2	0
	Aldrin	µg/L	2		<2	<2	0
	Dieldrin	µg/L	2		<2	<2	0
	Aldrin + Dieldrin	µg/L	4		<4	<4	0
	b-BHC	µg/L	2		<2	<2	0
	d-BHC	µg/L	2		<2	<2	0
	DDD	µg/L	2		<2	<2	0
	4,4-DDE	µg/L	2		<2	<2	0
	DDT	µg/L	4 : 2 (Interlab)		<4	<4	0
	DDT+DDE+DDD	µg/L	4		<4	<4	0
	Endosulfan I	µg/L	2		<2	<2	0
	Endosulfan II	µg/L	2		<2	<2	0
	Endosulfan sulphate	µg/L	2		<2	<2	0
	Endrin	µg/L	2		<2	<2	0
	g-BHC (Lindane)	µg/L	2		<2	<2	0
	Heptachlor	µg/L	2		<2	<2	0
	Heptachlor epoxide	µg/L	2		<2	<2	0
	Chlorfenvinphos	µg/L	2		<2	<2	0
	Chlorpyrifos	µg/L	2		<2	<2	0
	Chlorpyrifos-methyl	µg/L	2		<2	<2	0
	Diazinon	µg/L	2		<2	<2	0
	Dichlorvos	µg/L	2		<2	<2	0
	Dimethoate	µg/L	2		<2	<2	0
	Ethion	µg/L	2		<2	<2	0
	Fenthion	µg/L	2		<2	<2	0
	Malathion	µg/L	2		<2	<2	0
	Pirimphos-ethyl	µg/L	2		<2	<2	0
	Prothiofos	µg/L	2		<2	<2	0
	Chlorobenzilate	µg/L	2		<2	<2	0
	Carbazole	µg/L	2 : 5 (Interlab)		<2	<2	0
	Pronamide	µg/L	2		<2	<2	0
Volatile Organic Compounds	1,2-dibromoethane	µg/L	5 : 1 (Interlab)		<5	<5	0
	cis-1,4-Dichloro-2-butene	µg/L	5		<5	<5	0
	trans-1,4-Dichloro-2-butene	µg/L	5		<5	<5	0
	Pentachloroethane	µg/L	5 : 2 (Interlab)		<5	<5	0
	Bromomethane	µg/L	50 : 10 (Interlab)		<50	<50	0
	Dichlorodifluoromethane	µg/L	50 : 10 (Interlab)		<50	<50	0
	Iodomethane	µg/L	5		<5	<5	0
	Trichlorofluoromethane	µg/L	50 : 10 (Interlab)		<50	<50	0
Semivolatile Organic Compounds	1,2,4-trichlorobenzene	µg/L	2 : 1 (Interlab)		<2	<2	0
	1,2-dichlorobenzene	µg/L	2 : 1 (Interlab)		<2	<2	0
	1,3-dichlorobenzene	µg/L	2 : 1 (Interlab)		<2	<2	0
	1,4-dichlorobenzene	µg/L	2 : 1 (Interlab)		<2	<2	0
	Hexachlorobenzene	µg/L	4 : 2 (Interlab)		<4	<4	0
	Pentachlorobenzene	µg/L	2		<2	<2	0

Field Duplicates (water)
Filter: SDG in('ALSE-Sydney 10-Jan-19')

				SDG	ALSE-Sydney 10-Jan-19	ALSE-Sydney 10-Jan-19	
				Field ID	MW03	DUP	RPD
				Sampled Date/Time	08-01-19 15:00	08-01-19 15:00	
Volatile Organic Compounds	1,2,3-trichlorobenzene	µg/L	5 : 1 (Interlab)	<5	<5	0
	2-chlorotoluene	µg/L	5 : 1 (Interlab)	<5	<5	0
	4-chlorotoluene	µg/L	5 : 1 (Interlab)	<5	<5	0
	Bromobenzene	µg/L	5 : 1 (Interlab)	<5	<5	0
	Chlorobenzene	µg/L	5 : 1 (Interlab)	<5	<5	0
Semivolatile Organic Compounds	1,3,5-Trinitrobenzene	mg/l	0.002	<0.002	<0.002	0
	2,4-Dinitrotoluene	µg/L	4	<4	<4	0
	2,6-dinitrotoluene	µg/L	4 : 5 (Interlab)	<4	<4	0
	Nitrobenzene	µg/L	2 : 5 (Interlab)	<2	<2	0
	Bis(2-ethylhexyl) phthalate	µg/L	10	<10	<10	0
	Butyl benzyl phthalate	µg/L	2 : 10 (Interlab)	<2	<2	0
	Diethylphthalate	µg/L	2 : 10 (Interlab)	<2	<2	0
	Dimethyl phthalate	µg/L	2 : 10 (Interlab)	<2	<2	0
	Di-n-butyl phthalate	µg/L	2 : 10 (Interlab)	<2	<2	0
	Di-n-octyl phthalate	µg/L	2 : 10 (Interlab)	<2	<2	0
	N-nitrosodiethylamine	µg/L	2	<2	<2	0
	N-nitrosodi-n-butylamine	µg/L	2 : 5 (Interlab)	<2	<2	0
	N-nitrosodi-n-propylamine	µg/L	2 : 5 (Interlab)	<2	<2	0
	N-Nitrosomethylethylamine	µg/L	2	<2	<2	0
	1-naphthylamine	µg/L	2 : 5 (Interlab)	<2	<2	0
	N-Nitrosodiphenyl & Diphenylamine	µg/L	4	<4	<4	0
	2-nitroaniline	µg/L	4 : 5 (Interlab)	<4	<4	0
	3-nitroaniline	µg/L	4 : 5 (Interlab)	<4	<4	0
	4-chloroaniline	µg/L	2 : 5 (Interlab)	<2	<2	0
	4-nitroaniline	µg/L	2 : 5 (Interlab)	<2	<2	0
	2-methyl-5-nitroaniline	µg/L	2 : 5 (Interlab)	<2	<2	0
	Aniline	µg/L	2 : 5 (Interlab)	<2	<2	0
	2-Picoline	µg/L	2	<2	<2	0
	4-aminobiphenyl	µg/L	2	<2	<2	0
	Pentachloronitrobenzene	µg/L	2 : 5 (Interlab)	<2	<2	0
	Isophorone	µg/L	2 : 5 (Interlab)	<2	<2	0
Volatile Organic Compounds	Methyl Ethyl Ketone	µg/L	50	<50	<50	0
	2-hexanone (MBK)	µg/L	50	<50	<50	0
	4-Methyl-2-pentanone	µg/L	50	<50	<50	0
	Carbon disulfide	µg/L	5	<5	<5	0
	Vinyl acetate	µg/L	50	<50	<50	0

*RPDs have only been considered where a concentration is greater than 1 times the EQL.
**High RPDs are in bold (Acceptable RPDs for each EQL multiplier range are: 80 (1-10 x EQL); 50 (10-30 x EQL); 30 (> 30 x EQL))
***Interlab Duplicates are matched on a per compound basis as methods vary between laboratories. Any methods in the row header relate to those used in the primary laboratory

Field Duplicates (water)
Filter: SDG in('ALSE-Sydney 10-Jan-19')

SDG	ALSE-Sydney 10-Jan-19	ENVIROLAB 2019-01-11T00:00:00	
Field ID	MW03	TRIP	RPD
Sampled Date/Time	08-01-19 15:00	08-01-19 15:00	

Method_Type	ChemName	Units	EQL			
Semivolatile Organic Compounds	2-(acetylamino) fluorene	µg/L	2	<2	<2	0
	3,3-Dichlorobenzidine	µg/L	2	<2		
	4-(dimethylamino) azobenzene	µg/L	2 : 5 (Interlab)	<2	<5	0
	4-bromophenyl phenyl ether	µg/L	2 : 5 (Interlab)	<2	<5	0
	4-chlorophenyl phenyl ether	µg/L	2 : 5 (Interlab)	<2	<5	0
	4-Nitroquinoline-N-oxide	µg/L	2	<2		
	Acetophenone	µg/L	2 : 5 (Interlab)	<2	<5	0
	Azobenzene	µg/L	2 : 5 (Interlab)	<2	<5	0
	Bis(2-chloroethoxy) methane	µg/L	2 : 5 (Interlab)	<2	<5	0
	Bis(2-chloroethyl)ether	µg/L	2 : 5 (Interlab)	<2	<5	0
	Dibenzofuran	µg/L	2 : 5 (Interlab)	<2	<5	0
	Hexachloropropene	µg/L	2	<2	<2	0
	Methapyrilene	µg/L	2 : 10 (Interlab)	<2	<10	0
	N-nitrosomorpholine	µg/L	2 : 5 (Interlab)	<2	<5	0
	N-nitrosopiperidine	µg/L	2 : 5 (Interlab)	<2	<5	0
	N-nitrosopyrrolidine	µg/L	4	<4		
	Phenacetin	µg/L	2 : 5 (Interlab)	<2	<5	0
Ammonia as N by Discrete analyser	Ammonia as N	mg/l	0.01	3.27		
Per- and Polyfluoroalkyl Substances (PFAS) by LCMS	4:2 Fluorotelomer sulfonic acid (4:2 FTS)	µg/L	0.05	<0.05		
	6:2 Fluorotelomer sulfonic acid (6:2 FTS)	µg/L	0.05 : 0.01 (Interlab)	<0.05	<0.01	0
	8:2 Fluorotelomer sulfonic acid (8:2 FTS)	µg/L	0.05 : 0.01 (Interlab)	<0.05	<0.01	0
	10:2 Fluorotelomer sulfonic acid (10:2 FTS)	µg/L	0.05	<0.05		
	N-Methyl perfluorooctane sulfonamide (NMeFOSA)	µg/L	0.05	<0.05		
	N-Methylperfluorooctanesulfonamidoethanol (N-MeFOSE)	µg/L	0.05	<0.05		
	N-methylperfluorooctane sulfonamidoacetic acid (NMeFOSAA)	µg/L	0.02	<0.02		
	N-Ethyl perfluorooctane sulfonamide (NEtFOSA)	µg/L	0.05	<0.05		
	N-ethylperfluorooctanesulfonamidoethanol (NEtFOSE)	µg/L	0.05	<0.05		
	N-ethyl-perfluorooctanesulfonamidoacetic acid (NEtFOSAA)	µg/L	0.02	<0.02		
	Perfluorodecanesulfonic acid (PFDS)	µg/L	0.02	<0.02		
	Perfluorooctanesulfonic acid (PFOS)	µg/L	0.01	<0.01	<0.01	0
	Perfluorooctanoic acid (PFOA)	µg/L	0.01	<0.01	<0.01	0
	Perfluorohexane sulfonic acid (PFHxS)	µg/L	0.02 : 0.01 (Interlab)	<0.02	<0.01	0
	Perfluoropentane sulfonic acid (PFPeS)	µg/L	0.02	<0.02		
	Perfluoropentanoic acid (PFPeA)	µg/L	0.02	<0.02		
	Perfluoroheptane sulfonic acid (PFHpS)	µg/L	0.02	<0.02		
	Perfluorobutanoic acid (PFBA)	µg/L	0.1	<0.1		
	Perfluorodecanoic acid (PFDA)	µg/L	0.02	<0.02		
	Perfluorobutane sulfonic acid (PFBS)	µg/L	0.02	<0.02		
	Perfluorododecanoic acid (PFDoDA)	µg/L	0.02	<0.02		
	Perfluoroheptanoic acid (PFHpA)	µg/L	0.02	<0.02		
	Perfluorononanoic acid (PFNA)	µg/L	0.02	<0.02		
	Perfluorohexanoic acid (PFHxA)	µg/L	0.02	<0.02		
	Perfluorooctane sulfonamide (PFOSA)	µg/L	0.02	<0.02		
	Perfluorotetradecanoic acid (PFTeDA)	µg/L	0.05	<0.05		
	Perfluorotridecanoic acid (PFTrDA)	µg/L	0.02	<0.02		
	Perfluoroundecanoic acid (PFUnDA)	µg/L	0.02	<0.02		
	Sum of PFHxS and PFOS	µg/L	0.01	<0.01	<0.01	0
	Sum of PFAS	µg/L	0.01	<0.01	<0.01	0
	Sum of PFAS (WA DER List)	µg/L	0.01	<0.01		
Dissolved Mercury by FIMS	Mercury (Filtered)	µg/l	0.1 : 0.05 (Interlab)	<0.1	<0.05	0
Dissolved Metals by ICP-MS - Suite A	Arsenic (Filtered)	µg/l	1	1	<1	0
	Cadmium (Filtered)	µg/l	0.1	<0.1	<0.1	0
	Chromium (III+VI) (Filtered)	µg/l	1	<1	<1	0
	Copper (Filtered)	µg/l	1	<1	<1	0
	Lead (Filtered)	µg/l	1	<1	<1	0
	Nickel (Filtered)	µg/l	1	2	1	67
	Zinc (Filtered)	µg/l	5 : 1 (Interlab)	<5	3	0
TRH - Semivolatile Fraction	C10-C14	µg/L	50	<50	<50	0
	C15-C28	µg/L	100	<100	<100	0
	C29-C36	µg/L	50 : 100 (Interlab)	<50	<100	0
	C10-C36 (Sum of total)	µg/L	50	<50		
TRH Volatiles/BTEX	C6-C9	µg/L	20 : 10 (Interlab)	<20	14	0
TRH - Semivolatile Fraction	C10-C16	µg/L	100 : 50 (Interlab)	<100	<50	0
	>C10-C16 less Naphthalene (F2)	µg/L	100	<100		
	C16-C34	µg/L	100	<100	<100	0
	C34-C40	µg/L	100	<100	<100	0
	>C10 - C40 (Sum of total)	µg/L	100	<100		
TRH Volatiles/BTEX	C6-C10	µg/L	20 : 10 (Interlab)	<20	14	0
	>C6-C10 less BTEX (F1)	µg/L	20	<20		
	Xylene Total	µg/L	2	<2		
	Total BTEX	µg/L	1	<1		
Volatile Organic Compounds	Benzene	µg/L	1	<1	<1	0
	Toluene	µg/L	2 : 1 (Interlab)	<2	<1	0
	Ethylbenzene	µg/L	2 : 1 (Interlab)	<2	<1	0
	Xylene (m & p)	µg/L	2	<2	<2	0
	Xylene (o)	µg/L	2 : 1 (Interlab)	<2	<1	0
	1,2,4-trimethylbenzene	µg/L	5 : 1 (Interlab)	<5	<1	0
	1,3,5-trimethylbenzene	µg/L	5 : 1 (Interlab)	<5	<1	0
	Isopropylbenzene	µg/L	5 : 1 (Interlab)	<5	<1	0
	n-butylbenzene	µg/L	5 : 1 (Interlab)	<5	<1	0
	n-propylbenzene	µg/L	5 : 1 (Interlab)	<5	<1	0
	p-isopropyltoluene	µg/L	5 : 1 (Interlab)	<5	<1	0
	sec-butylbenzene	µg/L	5 : 1 (Interlab)	<5	<1	0
	Styrene	µg/L	5 : 1 (Interlab)	<5	<1	0
	tert-butylbenzene	µg/L	5 : 1 (Interlab)	<5	<1	0
Semivolatile Organic Compounds	2-chloronaphthalene	µg/L	2	<2	<2	0
	2-methylnaphthalene	µg/L	2	<2	<2	0
	3-methylcholanthrene	µg/L	2	<2	<2	0
	7,12-dimethylbenz(a)anthracene	µg/L	2	<2	<2	0
	Acenaphthene	µg/L	2	<2	<2	0
	Acenaphthylene	µg/L	2	<2	<2	0
	Anthracene	µg/L	2	<2	<2	0
	Benz(a)anthracene	µg/L	2	<2	<2	0
	Benzo(a) pyrene	µg/L	2	<2	<2	0
	Benzo(a)pyrene TEQ calc (Zero)	µg/L	2	<2		

Field Duplicates (water)
Filter: SDG in('ALSE-Sydney 10-Jan-19')

SDG	ALSE-Sydney 10-Jan-19	ENVIROLAB 2019-01-11T00:00:00	
Field ID	MW03	TRIP	RPD
Sampled Date/Time	08-01-19 15:00	08-01-19 15:00	

	Benzo(g,h,i)perylene	µg/L	2	<2	<2	0
	Benzo(b+j+k)fluoranthene	µg/L	4	<4	<4	0
	Chrysene	µg/L	2	<2	<2	0
	Dibenz(a,h)anthracene	µg/L	2	<2	<2	0
	Fluoranthene	µg/L	2	<2	<2	0
	Fluorene	µg/L	2	<2	<2	0
	Indeno(1,2,3-c,d)pyrene	µg/L	2	<2	<2	0
	Naphthalene	µg/L	2	<2	<2	0
	Phenanthrene	µg/L	2	<2	<2	0
	Pyrene	µg/L	2	<2	<2	0
	PAHs (Sum of total)	µg/L	2	<2		
TRH Volatiles/BTEX	Naphthalene	µg/L	5 : 2 (Interlab)	<5	<2	0
Semivolatile Organic Compounds	2,4,5-trichlorophenol	µg/L	2	<2	<2	0
	2,4,6-trichlorophenol	µg/L	2	<2	<2	0
	2,4-dichlorophenol	µg/L	2	<2	<2	0
	2,4-dimethylphenol	µg/L	2	<2	<2	0
	2,6-dichlorophenol	µg/L	2	<2	<2	0
	2-chlorophenol	µg/L	2	<2	<2	0
	2-nitrophenol	µg/L	2	<2	<2	0
	2-methylphenol	µg/L	2	<2	<2	0
	3&4-Methylphenol (m&p-cresol)	µg/L	4	<4	<4	0
	4-chloro-3-methylphenol	µg/L	2 : 10 (Interlab)	<2	<10	0
	Pentachlorophenol	µg/L	4 : 10 (Interlab)	<4	<10	0
	Phenol	µg/L	2	<2	<2	0
	Hexachlorocyclopentadiene	µg/L	10 : 5 (Interlab)	<10	<5	0
	Hexachloroethane	µg/L	2	<2	<2	0
	Hexachlorobutadiene	µg/L	2 : 1 (Interlab)	<2	<1	0
Volatile Organic Compounds	1,1,2,2-tetrachloroethane	µg/L	5 : 1 (Interlab)	<5	<1	0
	1,1,1,2-tetrachloroethane	µg/L	5 : 1 (Interlab)	<5	<1	0
	1,1,2-trichloroethane	µg/L	5 : 1 (Interlab)	<5	<1	0
	1,1,1-trichloroethane	µg/L	5 : 1 (Interlab)	<5	<1	0
	1,1-dichloroethane	µg/L	5 : 1 (Interlab)	<5	<1	0
	1,1-dichloroethene	µg/L	5 : 1 (Interlab)	<5	<1	0
	1,1-dichloropropene	µg/L	5 : 1 (Interlab)	<5	<1	0
	1,2,3-trichloropropane	µg/L	5 : 1 (Interlab)	<5	<1	0
	1,2-dibromo-3-chloropropane	µg/L	5 : 1 (Interlab)	<5	<1	0
	1,2-dichloroethane	µg/L	5 : 1 (Interlab)	<5	<1	0
	1,2-dichloropropane	µg/L	5 : 1 (Interlab)	<5	<1	0
	1,3-dichloropropane	µg/L	5 : 1 (Interlab)	<5	<1	0
	2,2-dichloropropane	µg/L	5 : 1 (Interlab)	<5	<1	0
	Bromodichloromethane	µg/L	5 : 1 (Interlab)	<5	<1	0
	Bromoform	µg/L	5 : 1 (Interlab)	<5	<1	0
	Carbon tetrachloride	µg/L	5 : 1 (Interlab)	<5	<1	0
	Chlorodibromomethane	µg/L	5 : 1 (Interlab)	<5	<1	0
	Chloroethane	µg/L	50 : 10 (Interlab)	<50	<10	0
	Chloroform	µg/L	5 : 1 (Interlab)	<5	<1	0
	Chloromethane	µg/L	50 : 10 (Interlab)	<50	<10	0
	cis-1,2-dichloroethene	µg/L	5 : 1 (Interlab)	18	19	5
	cis-1,3-dichloropropene	µg/L	5 : 1 (Interlab)	<5	<1	0
	Dibromomethane	µg/L	5 : 1 (Interlab)	<5	<1	0
	Trichloroethene	µg/L	5 : 1 (Interlab)	<5	<1	0
	Tetrachloroethene	µg/L	5 : 1 (Interlab)	<5	<1	0
	trans-1,2-dichloroethene	µg/L	5 : 1 (Interlab)	<5	<1	0
	trans-1,3-dichloropropene	µg/L	5 : 1 (Interlab)	<5	<1	0
	Vinyl chloride	µg/L	50 : 10 (Interlab)	<50	<10	0
Semivolatile Organic Compounds	a-BHC	µg/L	2	<2	<2	0
	Aldrin	µg/L	2	<2	<2	0
	Dieldrin	µg/L	2	<2	<2	0
	Aldrin + Dieldrin	µg/L	4	<4		
	b-BHC	µg/L	2	<2	<2	0
	d-BHC	µg/L	2	<2	<2	0
	DDD	µg/L	2	<2	<2	0
	4,4-DDE	µg/L	2	<2	<2	0
	DDT	µg/L	4 : 2 (Interlab)	<4	<2	0
	DDT+DDE+DDD	µg/L	4	<4		
	Endosulfan I	µg/L	2	<2	<2	0
	Endosulfan II	µg/L	2	<2	<2	0
	Endosulfan sulphate	µg/L	2	<2	<2	0
	Endrin	µg/L	2	<2	<2	0
	g-BHC (Lindane)	µg/L	2	<2	<2	0
	Heptachlor	µg/L	2	<2	<2	0
	Heptachlor epoxide	µg/L	2	<2	<2	0
	Chlorfenvinphos	µg/L	2	<2		
	Chlorpyrifos	µg/L	2	<2		
	Chlorpyrifos-methyl	µg/L	2	<2		
	Diazinon	µg/L	2	<2		
	Dichlorvos	µg/L	2	<2		
	Dimethoate	µg/L	2	<2		
	Ethion	µg/L	2	<2		
	Fenthion	µg/L	2	<2		
	Malathion	µg/L	2	<2		
	Pirimphos-ethyl	µg/L	2	<2		
	Prothiofos	µg/L	2	<2		
	Chlorobenzilate	µg/L	2	<2		
	Carbazole	µg/L	2 : 5 (Interlab)	<2	<5	0
	Pronamide	µg/L	2	<2		
Volatile Organic Compounds	1,2-dibromoethane	µg/L	5 : 1 (Interlab)	<5	<1	0
	cis-1,4-Dichloro-2-butene	µg/L	5	<5		
	trans-1,4-Dichloro-2-butene	µg/L	5	<5		
	Pentachloroethane	µg/L	5 : 2 (Interlab)	<5	<2	0
	Bromomethane	µg/L	50 : 10 (Interlab)	<50	<10	0
	Dichlorodifluoromethane	µg/L	50 : 10 (Interlab)	<50	<10	0
	Iodomethane	µg/L	5	<5		
	Trichlorofluoromethane	µg/L	50 : 10 (Interlab)	<50	<10	0
Semivolatile Organic Compounds	1,2,4-trichlorobenzene	µg/L	2 : 1 (Interlab)	<2	<1	0
	1,2-dichlorobenzene	µg/L	2 : 1 (Interlab)	<2	<1	0
	1,3-dichlorobenzene	µg/L	2 : 1 (Interlab)	<2	<1	0
	1,4-dichlorobenzene	µg/L	2 : 1 (Interlab)	<2	<1	0
	Hexachlorobenzene	µg/L	4 : 2 (Interlab)	<4	<2	0
	Pentachlorobenzene	µg/L	2	<2	<2	0

Field Duplicates (water)
Filter: SDG in('ALSE-Sydney 10-Jan-19')

	SDG		ALSE-Sydney 10-Jan-19	ENVIROLAB 2019-01-11T00:00:00		
	Field ID		MW03	TRIP		**RPD**
	Sampled Date/Time		08-01-19 15:00	08-01-19 15:00		
Volatile Organic Compounds	1,2,3-trichlorobenzene	µg/L	5 : 1 (Interlab)	<5	<1	0
	2-chlorotoluene	µg/L	5 : 1 (Interlab)	<5	<1	0
	4-chlorotoluene	µg/L	5 : 1 (Interlab)	<5	<1	0
	Bromobenzene	µg/L	5 : 1 (Interlab)	<5	<1	0
	Chlorobenzene	µg/L	5 : 1 (Interlab)	<5	<1	0
Semivolatile Organic Compounds	1,3,5-Trinitrobenzene	mg/l	0.002	<0.002		
	2,4-Dinitrotoluene	µg/L	4	<4		
	2,6-dinitrotoluene	µg/L	4 : 5 (Interlab)	<4	<5	0
	Nitrobenzene	µg/L	2 : 5 (Interlab)	<2	<5	0
	Bis(2-ethylhexyl) phthalate	µg/L	10	<10	<10	0
	Butyl benzyl phthalate	µg/L	2 : 10 (Interlab)	<2	<10	0
	Diethylphthalate	µg/L	2 : 10 (Interlab)	<2	<10	0
	Dimethyl phthalate	µg/L	2 : 10 (Interlab)	<2	<10	0
	Di-n-butyl phthalate	µg/L	2 : 10 (Interlab)	<2	<10	0
	Di-n-octyl phthalate	µg/L	2 : 10 (Interlab)	<2	<10	0
	N-nitrosodiethylamine	µg/L	2	<2		
	N-nitrosodi-n-butylamine	µg/L	2 : 5 (Interlab)	<2	<5	0
	N-nitrosodi-n-propylamine	µg/L	2 : 5 (Interlab)	<2	<5	0
	N-Nitrosomethylethylamine	µg/L	2	<2		
	1-naphthylamine	µg/L	2 : 5 (Interlab)	<2	<5	0
	N-Nitrosodiphenyl & Diphenylamine	µg/L	4	<4		
	2-nitroaniline	µg/L	4 : 5 (Interlab)	<4	<5	0
	3-nitroaniline	µg/L	4 : 5 (Interlab)	<4	<5	0
	4-chloroaniline	µg/L	2 : 5 (Interlab)	<2	<5	0
	4-nitroaniline	µg/L	2 : 5 (Interlab)	<2	<5	0
	2-methyl-5-nitroaniline	µg/L	2 : 5 (Interlab)	<2	<5	0
	Aniline	µg/L	2 : 5 (Interlab)	<2	<5	0
	2-Picoline	µg/L	2	<2		
	4-aminobiphenyl	µg/L	2	<2		
	Pentachloronitrobenzene	µg/L	2 : 5 (Interlab)	<2	<5	0
	Isophorone	µg/L	2 : 5 (Interlab)	<2	<5	0
Volatile Organic Compounds	Methyl Ethyl Ketone	µg/L	50	<50		
	2-hexanone (MBK)	µg/L	50	<50		
	4-Methyl-2-pentanone	µg/L	50	<50		
	Carbon disulfide	µg/L	5	<5		
	Vinyl acetate	µg/L	50	<50		

*RPDs have only been considered where a concentration is greater than 1 times the EQL.
**High RPDs are in bold (Acceptable RPDs for each EQL multiplier range are: 80 (1-10 x EQL); 50 (10-30 x EQL); 30 (> 30 x EQL))
***Interlab Duplicates are matched on a per compound basis as methods vary between laboratories. Any methods in the row header relate to those used