



Harwood Environmental Consultants
Gunners Barracks
Suite F, 38 Suakin Drive
George Heights, Mosman 2088

rod@harwoodenviro.com.au

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Mr Adam Thomas
Johnstaff Projects (NSW) Pty Ltd
by email

INTERIM ADVICE 02: REVIEW OF REVISED DETAILED SITE INVESTIGATION AND 'FRAMEWORK' REMEDIAL ACTION PLAN FOR 28-32 BOURKE ROAD, ALEXANDRIA, NSW

Dear Adam,

1. INTRODUCTION

1.1. Background

Johnstaff Projects (NSW) Pty Ltd engaged Rod Harwood, a NSW EPA accredited Contaminated Land Auditor (accreditation no. 03-04) who is employed by Harwood Environmental Consultants (HEC), to conduct a Site Audit resulting in a Site Audit Statement (SAS) and Site Audit Report (SAR) for the Site located at 28-32 Bourke Road, Alexandria, NSW.

It is understood the existing site contains a single level warehouse, which is [proposed to be demolished for the redevelopment of an approx. 11,305m² mixed use development. The development will also include a 1m excavation to form part of a basement.

The Secretary's Environmental Assessment Requirements (SEARs) have been received, and the requirement relating to contamination issues for the Stage 1 State Significant Development Application (SSDA) are as follows:

SEAR	Deliverable
15. Contamination and Remediation <ul style="list-style-type: none"><i>In accordance with SEPP 55, assess and quantify any soil and groundwater contamination and demonstrate that the site is suitable (or will be suitable, after remediation) for the concept development.</i><i>Identify whether the development disturbs, exposes or drains acid sulfate soils that may result in environmental damage, including providing an Acid Sulfate Soils Management Plan, where there may be any harm to the environment from the development.</i>	Preliminary Site Investigations If required: Detailed Site Investigations Remedial Action Plan (RAP) , including interim audit advice from an EPA accredited site auditor certifying the RAP is appropriate Preliminary Long-term Environmental management Plan Acid Sulfate Soils Management Plan

The Audit is therefore considered to be statutory.

The Site Audit Statement will be issued to the client, and the NSW EPA simultaneously.

This *Interim Audit Advice* is provided to assist in the assessment and management of contamination issues at the site, the *Interim Audit Advice* should not be regarded as 'approval' of any proposed investigations or remedial activities, as any such approval is beyond the scope of an independent review.

1.2. Site Audit Process

EPA (2017) Contaminated Land Management: Guidelines for the NSW Site Auditor Scheme (3rd Edition), describes the site assessment and Audit process:

The **‘first tier’ is the work of a contaminated site consultant**, generally engaged by the site owner or developer. The contaminated site consultant designs and conducts a site assessment and any necessary remediation and validation, documents the processes and information in reports.

The **‘second tier’ is the site audit**, which involves a site auditor independently and at arm’s length reviewing, for one of the audit purposes stated in the CLM Act, the consultant’s assessment, remediation, validation and management plans or reports. The material outcomes of a site audit are a site audit report and a site audit statement.

It is important to note that with respect to waste management on contaminated sites, the EPA Contaminated Land Management: Guidelines for the NSW Site Auditor Scheme (3rd Edition) state:

- *‘When reviewing information relating to the management of waste, site auditors must have regard to the provisions of the NSW Government’s framework for managing wastes. In New South Wales, it is an offence to transport waste to a place that cannot lawfully receive it or use a site to receive waste that cannot lawfully be used as a waste facility. To ensure that waste generators (or their representatives) do not trigger such offences:*
 - *in relation to disposal, they must ensure their waste is carefully classified in accordance with the Waste Classification Guidelines – Part 1: Classifying Waste (EPA 2014) as in force from time to time (the ‘Waste Guidelines’, available from [Waste classification guidelines: www.epa.nsw.gov.au/your-environment/waste/classifying-waste/waste-classification-guidelines](http://www.epa.nsw.gov.au/your-environment/waste/classifying-waste/waste-classification-guidelines)), and the waste is taken to a facility that is lawfully able to receive that waste; and*
 - *in relation to re-use for land application purposes, they must ensure their waste meets the requirements of the resource recovery order and resource recovery exemption framework.*

For consultants who have been engaged to classify waste, or to assist their client in complying with the order and exemption framework, they must ensure their work complies with all of the requirements of the Waste Guidelines, and the relevant order and exemption. It is an offence to supply information about waste that is false or misleading.’

Part 4 Section 53B of the CLM Act describes that Site Audits conducted by EPA Accredited Site Auditors must take the following matters into account:

- the provisions of the CLM Act and the CLM Regulations;
- the provisions of any environmental planning instruments applying to the site; and
- the guidelines made or approved by the EPA.

Therefore, the contaminated land consultant and other relevant parties should be satisfied that the work to be conducted conforms to all appropriate regulations, standards and guidelines and is suitable based on the site history and the proposed land use.

At the completion of the Site Audit process, the Site Auditor must complete a Site Audit Statement (form provided by EPA which only accredited site Auditors may sign under the Contaminated Land Management Act 1997) supported by a Site Audit Report (comprehensive critical review of all contamination assessment and remediation conducted at the site). However, the Auditor may provide written interim advice on the work plans or reports in the lead-up to issuing the final Site Audit Statement at the end of the entire Audit.

When this Interim Advice is provided, the Site Auditor must:

- specify that the Interim Advice does not constitute a Site Audit Report or Statement;

- ensure the Interim Advice is consistent with NSW EPA guidelines and policy;
- not pre-empt the conclusion to be drawn at the end of the Site Audit process;
- clarify that a Site Audit Statement will be issued at the end of the Audit process; and
- document in the Site Audit Report all Interim Advice that was given.

Section 3.1 of the Auditor Guidelines states that the site auditor must meet the following particular requirements regardless of whether the audit is statutory or non-statutory:

- a. comply with applicable provisions of the CLM Act, regulations, environmental planning instruments, and any guidelines made or approved by the EPA under the CLM Act.
- b. not have a conflict of interest in relation to the audit as defined by the CLM Act.
- c. where these guidelines allow an auditor to adopt or endorse an approach that differs from policies made or approved by the EPA, exercise independent professional judgement in doing so and provide in the site audit report adequate and explicit justification for taking this course.
- d. finalise the site audit report before signing the site audit statement.
- e. provide in the site audit report a clear, logical discussion of issues covered in the site audit and clearly substantiate the rationale for the auditor's conclusions. Therefore, the contaminated land consultant and other relevant parties should be satisfied that the work to be conducted conforms to all appropriate regulations, standards and guidelines and is suitable based on the site history and the proposed land use.
- f. discuss in the site audit report all issues pertinent to the actual or potential contamination of the site and all issues required by these guidelines to be raised during a site audit.
- g. state clearly why any human health and environmental issues that would normally be of concern are not of concern in the case of this audit.
- h. make every reasonable effort to identify and review all relevant data, reports and other information held by the person who commissioned the site audit, or which is readily available from other sources, that provides evidence about conditions at the site which is relevant to the audit
- i. obtain advice from the appropriate expert support team members on issues that are outside the auditor's professional education, training or experience, and document in the site audit report where and from whom advice has been obtained.
- j. exercise independent and professional judgement in deciding whether or not they have sufficient information to make a decision about the suitability of a site or a plan or to draw any other conclusion in relation to actual or potential contamination of a site in the course of a site audit, with justification for conclusions to be given in the site audit report.
- k. make reasonable endeavours to find out whether any other audits have been commissioned in relation to the site and, if so, whether any of them were prematurely ceased and why
- l. state in the audit report the scope and findings of any previous audits.
- m. in cases where the audit involves a review of site assessment, remediation or management work, visit the site to observe and verify, as far as is practicable, the completion of this work.

2. INTERIM ADVICE

Interim Advice 01 was issued on the 8th of June 2020 and comprised a review of the following documents:

- **Detailed Site Investigation**, 28-32 Bourke Road, Alexandria, NSW, 2015 (ref: EP2515.001). EP Risk (10 March 2022).

- **Framework Remediation Action Plan**, 28-32 Bourke Road, Alexandria, NSW, 2015 (ref: EP2515.002). EP Risk (27 May 2022).

EP Risk issued a revised DSI and also a revised Framework RAP based on the comments provided by the Auditor in Interim Advice 01. The table below provides the initial comments from Interim Advice 01, the responses from EP Risk and any further Auditor comments:

Auditor Comments (IA01)	DSI v02 (EP Risk June 2022)	Auditor Comment
DSI		
The EP Risk (December 2021) report should be provided to the Auditor for review.	-	Report needs to be provided to the Auditor
The figures should identify the areas of concern listed in the report (e.g., triple interceptor, spray booth, chemical store, sewer/stormwater)	Figure 1 has been updated to show the spray booth, sewer and interceptor trap.	No further comment
The sampling plan (Section 5.9) should include a discussion of the rationale for the sampling locations – it is stated in the scope that the shallow bores were designed to delineate the hotspots from the 2021 investigation. If this is the case, then the hotspots and delineation borings should be presented in a table or discussion. Similarly, the sampling locations that target areas of concern should be identified.	Table 11 added which provides a brief discussion of the rationale	No further comment
Groundwater flow direction is not provided on the figures – the wells should be surveyed to the top of casing and groundwater flow direction contoured and discussed in the report.	An arrow indicating the inferred groundwater flow direction is provided on Figure 3.	The Auditor notes the wells have not been surveyed. This should be done in the next round of sampling. No further comment.
Depth to groundwater is not discussed in the report, the bore logs indicate the presence of water at depths between 1.7m and 3.4m below ground. It is noted that some logs that extend to 6m did not record the presence of water.	Section 8.3 includes a discussion of the depth to water.	No further comment
The bore log for BH05/MW03 describes a “fuel odour” at the surface. This be more specific – i.e., hydrocarbon, diesel etc.	Bore log revised to ‘hydrocarbon odour’.	No further comment
BH12 extended to 1.5m through concrete and was terminated in concrete – it is assumed that further vertical drilling could not be achieved.	Log revised to say soil not reached	No further comment
BH13 was drilled to 2.0m below ground, however the observations state “water at 3.0mbgl” – it is assumed this is a typo? Similarly, the soil description at 0.8m is described as “Silty clayey SAND, low plasticity, medium grained, black to brown, very moist, very soft	Typo revised to state water at 2mbgl. Reference to clay has been removed	No further comment

Auditor Comments (IA01)	DSI v02 (EP Risk June 2022)	Auditor Comment
clay". It is unclear if the profile is clay or sand dominant at this location.		
The well construction logs indicate that there the wells have open casing underneath the screened section – is this the case or were the bores backfilled to the base of the screened interval?	Confirmed the wells are cased under the screened interval	No further comment
RAP		
The remedial strategy for Area 1 refers to isolation of the natural soil. It is not clear what the term "isolation" means.	Clarified meaning of 'Isolation' as defined in Table 9 (s8.4.1)	No further comment
Area 2 is described as restricted and solid waste, however the remedial strategy only talks of general solid waste.	Added section specifying requirements for RSW (s8.4.2)	No further comment
A potential groundwater remedial strategy is described as monitored natural attenuation. However, MNA is generally a remedial strategy for hydrocarbon impact. This has not been identified at the site. Given the main CoPC at the site is lead in soil, remedial strategies for metal impacted groundwater would be more useful.	A remedial strategy will be discussed once additional groundwater data is collected in area 2. MNA is not only the process of biological degradation but also dilution as a result of dispersion and diffusion. A HHERA could be undertaken for the contaminated groundwater (if any) in combination with ongoing groundwater monitoring events with the aim to achieve favourable trends in concentrations. (s8.4.4)	No further comment
Area 1, Area 2 and ASBINS should be marked on the figures.	Changed names of layers in figure 2	No further comment
There are two Figure 2s	Labelled wrongly, fixed	No further comment
The Proposed Sample Locations figure would benefit from including the previous sampling locations as well as the location of exceedances to criteria.	Noted, Added to figure	No further comment
The remedial extent only refers to the vertical extent. The design drawings indicate the basement excavation does not take up all of the site area.	Added a sentence stating the extent is dependent on the final design concept. Areas outside the basement footprint such as deep soil planting areas will have to meet City of Sydney requirements as well as health and ecological criteria as the NEPM. (s8.2)	No further comment
The data gap investigation is limited in detail. Further information around the number and depth of borings in previously inaccessible areas and where CoPC concentrations exceeded the criteria by over 250% should be provided.	Added a section covering requirements to fill the data gaps in section 10.3	No further comment
The locations of the additional three wells should be shown on figure 3. All wells should be surveyed after installation. It would be	Thank you for the tip. Added wells to the figure. Added sentence in section 9.4.4 saying a Survey	No further comment

Auditor Comments (IA01)	DSI v02 (EP Risk June 2022)	Auditor Comment
worth surveying the existing wells prior to installation of the new wells so that the groundwater flow direction can be estimated to ensure the new wells are located in the right spots.	will be conducted before installation of the new wells and a GME once the additional wells are installed.	
There are no details provided on the lead immobilisation – further discussion around what strategies are likely to be employed to immobilise the lead will be required. The NSW EPA will need to approve the immobilisation strategy prior to the material being disposed off-site.	We don't know the lead immobilisation strategy until we do the soil treatment trials. I've added a sentence clarifying this. We are aware that a SIA is required and that is included in our additional data gap investigative scope (s9.4.6)	No further comment

3. CONCLUSIONS

The revised DSI and revised framework RAP adequately addresses the Auditor comments raised in Interim Advice 01.

An SAQP should be prepared for the data gap investigation and provided to the Auditor for review prior to works commencing.

Yours Sincerely

A handwritten signature in dark ink, appearing to read 'Rod Harwood', is written over a light blue rectangular background.

Rod Harwood

NSW EPA Accredited Contaminated Sites Auditor (Accreditation No. 03-04.)

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