



# GreenSPOT Hunter Valley Nutrient Recycling Facility

Bettergrow Pty Ltd

## Preliminary Environmental Assessment

IA172600\_03 | 01 Final

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## **1. Introduction**

### **1.1 Background**

Bettergrow Pty Ltd (Bettergrow) currently operate the GreenSPOT Hunter Valley Recycling Facility (the composting facility) under Development Approval DA140/2016 as modified on 16 April 2018 and EPA Licence No 7654 on the filled and capped Void 3 of the former Ravensworth No. 2 mine owned by AGL Macquarie Pty Ltd (the site). DA140/2016 authorises the receipt of up to 76,000 tonnes of organic materials such as biosolids and garden organics to be composted and used in remediation on the site or transferred for use in rehabilitation of AGL Macquarie lands.

The Applicant for DA140/2016 was Bettergrow Pty Ltd (Bettergrow). Bettergrow are contracted by AGL Macquarie (the land owner) to supply manufactured soil ameliorant and rehabilitation products to be used as part of the approved rehabilitation works at Ravensworth No. 2 mine and Ravensworth South mine.

Bettergrow now propose to expand an existing composting facility to authorise the receipt of up to 200,000 tonnes per annum of organic materials including new feed sources of food waste to facilitate the proposed sale of the composted material to third parties.

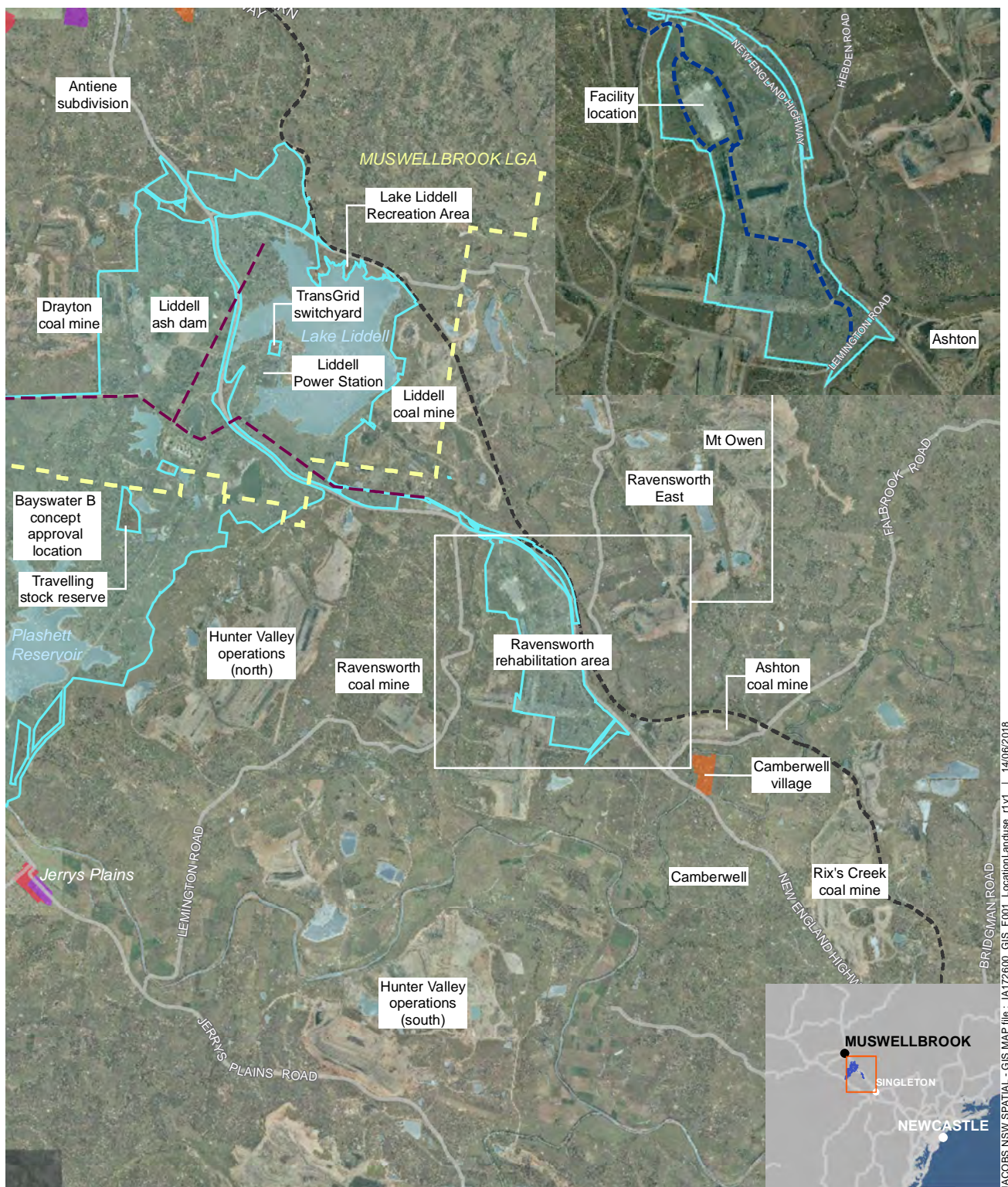
### **1.2 Site and surrounds**

The site is located at Ravensworth No. 2 mine and is approximately 20 kilometres north of Singleton. The site is formally described as Lot 10 DP1204457 at 74 Lemington Road, Ravensworth in the Singleton local government area (LGA). The site is cleared of native vegetation and is located on part of a capped open cut mining void which has been filled with ash from the AGL Bayswater Power Station. Access to the facility is provided via an internal access road off Lemington Road which connects to the New England Highway. The site location is shown in Figure 1.1.

The existing composting facility is located on a graded hardstand area, surrounded by perimeter bunding. A sediment barrier is located on the eastern corner of the facility and a clean water catch drain is located along the western side of the facility. A detention basin and spillway are located towards the southern end of the facility. A diversion wall and channel direct stormwater runoff from the eastern corner of the facility into the spillway. A spillway channel connects the spillway to the lower basin. Access to the facility is off Lemington Road and along an access road. .

The following land uses surround the existing composting facility:

- Liddell and Bayswater Power Station including Lake Liddell to the north west;
- Liddell Coal operations to the north east;
- New England Highway to the east;
- Ravensworth North Open Cut to the west; and
- Integra Coal Mine to the south east.



JACOBS NSW SPATIAL - GIS MAP file : IAT72600\_GIS\_F001\_LocationLandscape\_r1v1 | 14/06/2018

### Legend

- AGL owned land
- LGA
- Coal supply conveyor
- Residential zoned land
- Railway
- Large lot residential zoned land
- Road
- Access

0 2.5 5 km  
1:150,000 © A4



### Data sources

Imagery © Department of Finance, Services & Innovation 2017  
NSW Dep. of Planning and Environment

**Figure 1.1** | Location and surrounding land use

### 1.3 Site History

Peabody Resources Ltd (Peabody) was responsible for the operation the Ravensworth No. 2 mine until it was decommissioned in 1993 following the completion of coal mining. AGL Macquarie now owns the decommissioned mine and is therefore responsible for its rehabilitation, including five existing mine voids (referred to as voids 1, 2, 3, 4 and 5). Rehabilitation works involve the disposal of fly ash from the nearby Bayswater Power Station.

Voids 1 and 2 on the site have previously been filled with fly ash, capped and rehabilitated. Void 3 was filled with fly ash and capped in 2014. Void 4 is used as a water storage dam and provides additional capacity for surface water runoff during significant rainfall events. The placement of Bayswater Power Station fly ash into void 5 commenced in 2014 and is expected to be completed by 2032.

Rehabilitation works at voids 1 to 5 are carried out in accordance with the following development consents:

- DA No. 86/51 for the Ravensworth South mine granted by the NSW Department of Planning and Environment on 16 December 1986;
- DA No. 144/93 granted by Singleton Shire Council on 8 December 1993 (as modified); and
- DA No. 138/93 granted by Muswellbrook Shire Council on 13 December 1993 (as modified).

The above listed existing development consents issued for the site in the 1980s and 1990s allow the use of composting material as part of the mine rehabilitation process. However, these development consents do not explicitly allow for the on-site processing of composting material.

AECOM Australia Pty Ltd prepared a Statement of Environmental Effects (SoEE) dated July 2016 to support a development application (referred to as DA140/2016) for the establishment and operation of on-site composting to facilitate the rehabilitation of Ravensworth No. 2 mine and Ravensworth South mine.

The application was assessed as integrated development (and not designated development) on the basis that the project was entirely ancillary to the existing rehabilitation works approved as part of the Bayswater Power Station and Ravensworth mine. On 25 November 2016, Council granted consent to DA140/2016, pursuant to Section 80 of the EP&A Act and subject to conditions. DA140/2016 was subsequently modified on 16 April 2018 to facilitate the increase in volume of organic material received on site to 76,000 tonnes per annum. A copy of the approval is provided as Appendix A with the approved plans provided as Appendix B.

### 1.4 Current Site Operations

The facility currently operates in accordance with DA 140/2016 as Amodified and the New South Wales Environment Protection License No 7654 (refer to Appendix C).

The hours of operation at the site are from 6am to 6pm Monday to Saturday. Vehicle access to the site is via an entry gate at Lemington Road located to the south.

Organic materials for composting are transported to the site and are unloaded to the existing hardstand area for storage and processing (an area covering approximately 25 hectares in total). The material currently authorised to be accepted comprises a mix of general solid waste (non-putrescible) and liquid waste limited to:

- Urban wood residues Composting (as defined in 'The compost order 2016');
- Paper Crumble for Composting (defined as General or Specific Exempted Waste);
- Wastewater from Bayswater mine void 4;
- Natural organic fibrous Composting material (as defined in Schedule 1 of the POEO Act);

- Coal ash which meets the conditions of 'The coal ash order 2014';
- Biosolids (as defined in Schedule 1 of the POEO Act); and
- Garden Waste (as defined in Schedule 1 of the POEO Act).

The composting process takes approximately eight weeks, after which maturation occurs. The finished compost material is then stored and may be screened and blended with other ingredients to create the final product. The final compost material is then loaded on to trucks and transported to the relevant areas for rehabilitation including mining voids and areas of previously rehabilitated land that require further soil improvements.

Surface water is currently managed on site through the diversion of clean surface water around the composting operation area and the containment of leachate for reuse in the composting activities. Currently, only half of the approved area is used in the composting operation (referred to as stage 1) and water management devices have been constructed to cater for runoff from stage 1 only. Stage 2 has also been approved but not been prepared or used and in order to commence use of Stage 2, additional approved water management infrastructure is required to be installed in accordance with DA140/2016.

## **1.5 Proposal Need**

The soil at the site and surrounding AGL Macquarie owned lands has poor structure, low levels of nutrients, organic matter and high sodicity and salinity and as a result, rehabilitation has not always been successful. The existing composting facility provides biologically active organic material that is added to the topsoil to facilitate successful rehabilitation. The proposed expansion of the existing composting facility is required to facilitate the continued supply of composted material to rehabilitate AGL Macquarie owned lands as well as supplying other customers in the Upper Hunter Valley.

Bettergrow has further identified increased volumes of organic material requiring management and are seeking the approval to allow commercial agreements to be entered to receive and process these organic waste streams. Further, demand for soil amelioration products has been identified due to the significant rehabilitation works in the Hunter Valley associated with mining and farming operations where compost products would be beneficial.

The proposed expansion would facilitate the increased composting of available organic material and the proposed sale of the material to third parties.

## **1.6 Applicant**

Bettergrow specialises in creating innovative organic resource recovery solutions and is currently contracted by AGL Macquarie to supply purpose manufactured soil ameliorant and rehabilitation products suitable for use in the rehabilitation of their landholdings which include the Bayswater and Liddell power stations and associated ash dams and former mining areas.

## **1.7 Purpose of the report**

The purpose of the report is to provide a preliminary environmental assessment (PEA) to support an application for Secretary's Environmental Assessment Requirements (SEARs) for an Environmental Impact Statement (EIS) assessing the expansion of the existing Ravensworth composting facility (the proposal).

## 2. The Proposal

Bettergrow proposes to expand the composting facility in Ravensworth No. 2 to 200,000 tonnes per annum and sell compost that exceeds the rehabilitation needs of AGL (the proposal). The proposal responds to the availability organic material and the demonstrated suitability of the site to host a compost facility. The proposal includes the following components as generally illustrated in Figure 2.1:

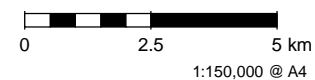
- The continued operation of the existing facility in accordance with DA140/2016 as modified;
- Receive a total of up to 200,00 tonnes of organics per annum;
- Transfer of the composted material to other AGL Macquarie sites such as the Liddell Ash Dam, Liddell Power Station and Bayswater Power Station for use in rehabilitation as per existing approval;
- Sale of a portion of the finished 'compost' to third parties;
- Upgrading of a proportion of the hardstand area and installation of an aerated composting system such as the Mobile Aerated Floor (MAF) (or equivalent) suitable for the management and composting of other organics including a combined Food and Garden Organics (FOGO) resource stream;
- Completion of the capping of the hardstand area and expansion of leachate dam as approved as part of the Stage 2 development application to facilitate the management and storage of the increase in organic inputs;
- Installation of a single lane weigh bridge approximately 27.5m long;
- Installation of covered hard stand areas for the receipt and blending of incoming organics including FOGO
- Installation of a dedicated trailer wash bay; and
- Installation of a machinery shelter that will allow storage of tools and machinery for servicing.

The proposal constitutes state significant development as it involves composting 200,000 tonnes of organics.

### 2.1 Construction

Construction of the proposal is expected to be completed over a 6 month period with a commencement date in 2019. Construction activities involve:

- Complete the capping of the balance of the already approved platform;
- Installation of additional water management works including clean water diversion bunding and expanded stormwater and leachate management basins in accordance with the existing development approval;
- Installation of aerated organics processing area;
- Installation of a single lane weigh bridge approximately 27.5m long;
- Installation of a dedicated trailer wash bay;
- Installation of covered hard stand areas for the receipt and blending of incoming organics including FOGO; and
- Installation of a machinery shelter that will allow storage of tools and machinery for servicing.



**Figure 2.1** | Proposal layout

## 2.2 Operation

The composting process would remain principally the same. Operational improvements will be created associated with delivery where some selected incoming organics can be received, assessed and thoroughly blended in undercover areas on suitable hardstand prior to being transferred to their respective composting pad locations.

A proportion of the incoming feedstock once assessed and blended may be placed onto an area where forced aerated composting can occur.

The quantities of organic materials received and composted material produced would increase. As a result, there would be an increase in deliveries to and from the facility. However, not all finished compost will be exported from the Ravensworth site as a proportion will be used in the Ravensworth annual rehabilitation program. The projected outgoing traffic volumes below assume all finished compost will leave the site via Lemington road hence these figures are regarded as worst case scenario.

Based on the existing approvals the following traffic volumes are anticipated:

- Organic deliveries are expected to increase from the currently approved 12 deliveries to 26 deliveries to site per day;
- Compost transfer to other AGL Macquarie sites are expected to be up to a maximum of 15 loads per day on a campaign basis as per the exiting approval; and
- Compost sales would be limited to bulk volumes and result in anticipated potential for 10 to 15 loads per day when not supplying product to AGL sites.

On the basis that all deliveries and compost transfers will require in-bound and out-bound movements the total traffic movements generated from the overall composting facility could be a maximum of 112 movements per day (56 in-bound and 56 out-bound). The actual traffic movements will be less than this due to the use of as many inbound trucks as possible to also take out finished product for delivery to sites.

The single lane weigh bridge, dedicated wash bay and machinery shelter would be used in the operation of the facility.

## 3. Planning Framework

### 3.1 Commonwealth Legislation

#### 3.1.1 Environment Protection and Biodiversity Conservation Act 1999

The Commonwealth *Environment Protection and Biodiversity Conservation Act 1999* (EPBC Act) requires the approval of the Commonwealth Minister for the Environment for any actions that may have a significant impact on matter of National Environmental Significance (NES) in addition to any approvals issued under NSW legislation. The EPBC Act also outlines protections of the environment where activities are located on Commonwealth land.

The SoEE prepared for DA140/2016 established that the original project would not impact on any NES matters. This was determined on the basis of the site being cleared of any native vegetation and there being no listed threatened species, ecological communities or habitat for listed migratory species. The Hunter Estuary Wetland which is a wetland of international importance is located over 50 kilometres from the site and would not be impacted by the proposal.

The proposal would be wholly contained within previously disturbed areas and as such is not expected to impact on any NES matters or areas of Commonwealth land.

### 3.2 NSW State Legislation

#### 3.2.1 Environmental Planning and Assessment Act 1979

The EP&A Act establishes the planning and approvals process in NSW. The EP&A Act provides for the making of Environmental Planning Instruments (EPIs) including Local Environmental Plans (LEPs) and State Environmental Planning Policies (SEPPs), which set out requirements for particular localities and/or particular types of development. The applicable EPIs and the Regulations made under the EP&A Act determine the relevant planning approval pathway and the associated environmental assessment requirements for proposed development activities.

The SoEE for DA140/2016 determined the project to be integrated development under section 91 of the EP&A Act as it involved the alteration or erection of improvements within a mine subsidence district (the Patrick Plains Mine Subsidence District) and is a scheduled activity under the Protection of the Environment Operations Act 1997. The project was not considered designated development on the basis that it was wholly ancillary to approved rehabilitation works within the AGL landholdings.

An application to modify DA140/2016 was approved on 16 April 2018 authorising the expansion of the operation to 76,000 tonnes under Section 96(2) of the EP&A Act. This section allows the development consent to be modified if the consent authority is satisfied that the development, as proposed to be modified, is substantially the same development as originally approved. The proposed modification was considered substantially the same development as originally approved as it would result in the expansion of an approved activity (composting operations) that is currently being carried out on the site and would not result in additional activities being carried out, beyond those approved under DA140/2016. Further, this proposed modification would result in a negligible impact to the existing environment.

The proposal that is the subject of this application introduces new activities including the sale of compost products and exceeds the 100,000 tonne threshold for resource recovery activities to be considered State significant development. It is the intent of this application that, if approved, the other approvals related to the operation would be surrendered. Section 4.12(8) of the EP&A Act requires that "A development application for State significant development or designated development is to be accompanied by an environmental impact statement prepared by or on behalf of the applicant in the form prescribed by the regulations". This PEA

supports an application for Secretaries Environmental Assessment Requirements (SEARs) that would establish the key and other issues requiring assessment within the Environmental Impact Statement (EIS).

Under Section 4.41 of the EP&A Act, the following authorisations that may be relevant to the proposal are not required for State significant development that is authorised by a development consent and accordingly the provisions of any Act that prohibit an activity without such an authority do not apply:

- An approval under Part 4, or an excavation permit under section 139, of the *Heritage Act 1977*;
- An Aboriginal heritage impact permit under section 90 of the *National Parks and Wildlife Act 1974*;
- A bush fire safety authority under section 100B of the *Rural Fires Act 1997*; and
- A water use approval under section 89, a water management work approval under section 90 or an activity approval (other than an aquifer interference approval) under section 91 of the *Water Management Act 2000*.

Division 8 of Part 6 of the *Heritage Act 1977* does not apply to prevent or interfere with the carrying out of State significant development that is authorised by a development consent granted after the commencement of this Division

Under Section 4.42 of the EP&A Act an authorisation of the following kind cannot be refused if it is necessary for carrying out State significant development that is authorised by a development consent and is to be substantially consistent with the consent:

- An approval under section 15 of the *Mine Subsidence Compensation Act 1961*;
- An environment protection licence under Chapter 3 of the *Protection of the Environment Operations Act 1997* (for any of the purposes referred to in section 43 of that Act); and
- A consent under section 138 of the *Roads Act 1993*.

Relevant secondary approvals that may be required are described below.

### 3.2.2 Environmental Planning and Assessment Regulation 2000

The *Environmental Planning and Assessment Regulation 2000* (EP&A Regulation) contains key operational provisions for the NSW planning system. This includes procedures relating to development applications, requirements for environmental assessments, environmental impact assessments, building regulations and other miscellaneous matters.

Schedule 2, Part 2 of the EP&A Regulation outlines the process for preparing and EIS.

Clause 13 of Schedule 3 of the EP&A Regulation identifies composting facilities or works that process more than 5,000 tonnes per year of organic materials to be designated development. Clause 37A of Schedule 3 provides an exemption for development that is wholly ancillary to other development and that is not proposed to be carried out independently of that other development. The SoEE for DA140/2016 determined the project did not comprise designated development as it was exempt under clause 37A of the EP&A Regulation. This was determined on the basis that:

- The project would operate only to serve existing rehabilitation activities; and
- The project would be considered a 'minor use' considering the size and scale of rehabilitation activities.

The proposal involves the sale of compost meaning the facility would no longer be wholly ancillary to the rehabilitation. However, Section 4.10 of the EP&A Act identifies that while, designated development is development that is declared to be designated development by an environmental planning instrument or the

regulations, designated development does not include State significant development despite any such declaration.

### 3.2.3 Protection of the Environment Operations Act 1997

The *Protection of the Environment Operations Act 1997* (POEO Act) aims to protect, restore and enhance the quality of the environment in New South Wales, having regard to the need to maintain ecologically sustainable development. The POEO Act prohibits any person from causing pollution of waters or air and applies penalties for pollution offences.

Schedule 1 of the POEO Act identifies scheduled activities that require a license for the premises at which the activity is carried out. In accordance with clause 12 of Schedule 1, the composting activities carried out on the site require an environmental protection license (EPL) as it receives more than 5,000 tonnes per year of non-putrescible organics from an off-site source.

Bettergrow (operating under the name Bio-Recycle (Aust) Pty Ltd) hold EPL No. 7654 for the premises covering composting and waste activities on the site. The expansion of composting operations proposed would require a variation to EPL No. 7654 issued by the Environmental Protection Authority (EPA) in order for the site receive up to 200,000 tonnes of organic waste per year. Variation of the EPL will be sought in consultation with the EPA, subject to the approval of the State significant development.

### 3.2.4 Mine Subsidence Compensation Act 1961

The *Mine Subsidence Compensation Act 1961* (MSC Act) provides for the regulation of development on land potentially affected by mine subsidence. The erection or alteration of an improvement or subdivision of land within a mine subsidence district requires approval of the mine subsidence board under Section 15 of the Mine Subsidence Compensation Act 1961.

The SoEE for DA140/2016 identified the project as being located within the Patrick Plains Mine Subsidence District and that the extent of works would be classified as an improvement under the MSC Act. The approval cannot be refused following approval of the proposal as State significant development. The mine subsidence board would be consulted during the assessment process and the proposal would need to be designed to be structurally safe if mine subsidence is possible in the specific proposal area.

### 3.2.5 Roads Act 1993

Under Section 138 of the *Roads Act 1993* a person must not:

- Erect a structure or carry out a work in, on or over a public road, or
- Dig up or disturb the surface of a public road, or
- Remove or interfere with a structure, work or tree on a public road, or
- Pump water into a public road from any land adjoining the road, or
- Connect a road (whether public or private) to a classified road,

Otherwise than with the consent of the appropriate roads authority.

The construction and operation may require upgrades to provide safe access to the site. Approval under Section 138 of the *Roads Act 1993* cannot be refused once the development is approved as State significant development, but any road upgrades will need to be to the satisfaction of the relevant Road Authority. Consultation with Roads and Maritime Services and Singleton Council would be undertaken during the preparation of the EIS.

### 3.3 Environmental Planning Instruments

#### 3.3.1 State Environmental Planning Policy (Infrastructure) 2007

Under Clause 121 of the *State Environmental Planning Policy (Infrastructure) 2007*, development for the purpose of waste or resource management facilities, other than development referred to in subclause (2), may be carried out by any person with consent on land in a prescribed zone. Resource management facilities are defined as including composting activities and the Prescribed Zones include the RU1 zone. Composting facilities are not referred to in subclause (2) and as such the existing composting activity and proposal are permissible with development consent under *State Environmental Planning Policy (Infrastructure) 2007*.

#### 3.3.2 State Environmental Planning Policy (State and Regional Development) 2011

Under clause 23(3) of *State Environmental Planning Policy (State and Regional Development) 2011*, development for the purpose of resource recovery or recycling facilities that handle more than 100,000 tonnes per year of waste is considered State significant development. As the proposal would exceed 100,000 tonnes per annum the proposal is considered State significant development.

#### 3.3.3 State Environmental Planning Policy No 33 – Hazardous and Offensive Development

*State Environmental Planning Policy No 33 – Hazardous and Offensive Development* (SEPP 33) aims to ensure that measures are employed to reduce the impact of a development that is a hazardous or offensive industry. Under SEPP 33 a consent authority must not consent to the carrying out of any development on land without considering:

- Current circulars or guidelines published by the Department of Planning relating to hazardous or offensive development;
- Whether any public authority should be consulted concerning any environmental and land use safety requirements with which the development should comply;
- In the case of development for the purpose of a potentially hazardous industry—a preliminary hazard analysis prepared by or on behalf of the applicant;
- Any feasible alternatives to the carrying out of the development and the reasons for choosing the development the subject of the application (including any feasible alternatives for the location of the development and the reasons for choosing the location the subject of the application), and
- Any likely future use of the land surrounding the development.

The proposal involves the expansion of existing composting operations on a site that is appropriately zoned and isolated from sensitive receptors. The proposal does not involve the use of hazardous chemicals above screening levels that would trigger consideration as potentially hazardous development. While the proposal requires an EPL, and in the absence of appropriate separation to receptors could be considered offensive, the extensive buffer lands are owned by AGL Macquarie and are appropriately zoned to prevent encroachment of development incompatible with the ongoing operations of the composting facility.

#### 3.3.4 State Environmental Planning Policy No 44 – Koala Habitat Protection

*State Environmental Planning Policy No 44 – Koala Habitat Protection* (SEPP 44) applies to the Singleton LGA. The aim of SEPP 44 is to encourage the proper conservation and management of areas of natural vegetation that provide habitat for koalas to ensure a permanent free-living population over their present range and reverse the current trend of koala population decline.

The SoEE for the DA140/2016 determined the project site to be cleared of any suitable koala habitat. Further, the project would not involve the interaction with, or potential impact on any habitat trees that may be located in the vicinity of the site.

The proposal would be limited to the highly disturbed areas only and would not result in any impacts to core koala habitat.

### 3.3.5 State Environmental Planning Policy No 55 – Remediation of Land

*State Environmental Planning Policy No 55 – Remediation of Land* (SEPP 55) aims to promote the remediation of contaminated land for the purpose of reducing the risk of harm to human health or any other aspect of the environment. Clause 7 of SEPP 55 requires a consent authority to consider whether the land is contaminated and whether it is suitable (or can be made suitable) for the proposed development.

The SoEE for DA140/2016 determined the development to be located on a previously developed site where there is no known contamination. The site is underlain by capped ash deposited in association with the operation of the Bayswater power station. Interaction with ash is not expected to be required in association with the proposal.

### 3.3.6 Singleton Local Environmental Plan 2013

#### Zoning and Permissibility

The site is zoned RU1 Primary Production under the *Singleton Local Environmental Plan 2013* (Singleton LEP). The objectives of the RU1 zone are:

- To encourage sustainable primary industry production by maintaining and enhancing the natural resource base;
- To encourage diversity in primary industry enterprises and systems appropriate for the area;
- To minimise the fragmentation and alienation of resource lands; and
- To minimise conflict between land uses within this zone and land uses within adjoining zones.

Composting operations are neither permissible with or without consent within the RU1 zone and as such are considered a prohibited land-use under the Singleton LEP. However, resource recovery including composting is permissible with consent within the RU1 zone under *State Environmental Planning Policy (Infrastructure) 2007*. Section 1.9 of the Singleton LEP identifies that it is subject to the provisions of any State environmental planning policy that prevails as provided by section 36 (now Section 3.28) of the EP&A Act. Under Section 3.28 of the EP&A Act, in the event of an inconsistency between environmental planning instruments and unless otherwise provided, there is a general presumption that a State environmental planning policy prevails over a local environmental plan or other instrument made before or after that State environmental planning policy. As such the proposed development for the purpose of composting and resource recovery is permissible within the RU1 zone with consent.

Section 7.1 of the Singleton LEP requires earthworks for which development consent is required to not have a detrimental impact on environmental functions and processes, neighbouring uses, cultural or heritage items or features of the surrounding land.

## **4. Stakeholder Engagement**

### **4.1 Consultation undertaken to date**

Bettergrow has consulted with Singleton Council regarding options for expanding the facility. Council has confirmed that they are able to consider an expansion of the facility below 100,000 tonnes per annum as a modification to the existing development approval where it can be demonstrated that the development as modified would remain substantially the same development as originally approved. Council has indicated that any expansion should consider the following environmental, social and economic impacts:

- Air quality, including odour;
- Surface water and groundwater protection;
- Transport and traffic issues;
- Social impact including community consultation;
- Visual impact;
- Noise;
- Any proposed landscaping and bunding to minimize visual impact;
- Measures to deal with incidents;
- Economic impacts, including but not limited to additional employment generation; and
- Any environmental protection measures.

Preliminary consideration of these impacts is provided below and would be further addressed in the EIS.

### **4.2 Proposed consultation**

Bettergrow will engage with all relevant key stakeholders during preparation of the EIS. Stakeholder groups, with an interest in the proposal are expected to include:

- NSW Department of Planning and Environment (DP&E);
- NSW Department of Industry – Division of Resources and Energy (DRE);
- NSW Roads and Maritime Services (RMS);
- NSW Office of Environment and Heritage (OEH);
- NSW Environment Protection Authority (EPA);
- Singleton Council;
- Mine Subsidence Board;
- Local land owners, farm managers and nearby residents; and
- Aboriginal stakeholders.

Bettergrow will develop a consultation plan for the EIS once SEARs are received and the outcomes of consultation will be included in the EIS and any relevant technical studies. The purpose of the consultation plan is to ensure ongoing and effective communication with key stakeholders and the community.

## 5. Preliminary Environmental Assessment

### 5.1 Issues identification

An initial review of environmental constraints and potential impacts of the proposed expansion of the composting facility has been undertaken to identify the issues likely to require detailed consideration as part of the EIS process. The preliminary environmental assessment has been completed by a desktop review and review of the Statement of Environmental Effects (SEE) – Composting Facility, Ravensworth No.2 Mine (AECOM, 2016).

The environmental factors relevant to the proposal are summarised in Table 5.1. A preliminary assessment of the following key issues is provided below:

- Traffic;
- Noise and vibration;
- Air quality;
- Visual amenity; and
- Surface water and groundwater.

Table 5.1 : Applicable Environmental Factors

Environmental factor	Assessment	Further discussion in the PEA	Reference
Traffic	The proposal would generate additional traffic volumes during construction and operation.	Yes	Section 6.2
Noise and Vibration	Minor increases in noise and vibration impacts would occur during construction. Traffic noise would be generated during construction and operation.	Yes	Section 6.3
Air quality	The proposal would result in increased dust and odour generation potential during construction and operation.	Yes	Section 6.4
Visual amenity	The facility is not readily visible to sensitive receivers due to the surrounding vegetation and topography. Potential visual impacts from the erection of structures on site would be considered.	Yes	Section 6.5
Surface water and groundwater	The proposal would generate leachate and as such has the potential to impact on nearby waterways and groundwater during construction and operation if unmanaged.	Yes	Section 6.6
Landforms, geology and soils	Minor ground disturbance may be required during construction to allow for the installation of the weigh bridge, wash bay and machinery shelter. The disturbance footprint is limited to the cleared and disturbed ash dam and impacts would be managed in accordance with the existing facility's Erosion and Sediment Control Plan.	No	-
Biodiversity	Biodiversity is not likely to be a constraint for the proposal as the facility is located on a cleared hardstand area. Biodiversity would be assessed in accordance with the Biodiversity	No	-

Environmental factor	Assessment	Further discussion in the PEA	Reference
	Assessment Methods under the <i>Biodiversity Conservation Act 2016</i> .		
Non-Aboriginal and Aboriginal Heritage	<p>There are no listed Non-Aboriginal heritage items in the vicinity of the proposal.</p> <p>A search of the Aboriginal Heritage Information Management System (AHIMS) was undertaken in December 2017 and provided in Appendix D.</p> <p>The search identified one Aboriginal site in the search area. This site is likely to be the same site identified in the SoEE and is located 500 metres north east of the facility on the eastern side of New England Highway.</p> <p>Due to the historical use of the facility for mining and ash disposal, it is unlikely there is any unidentified items of heritage significance in the proposal disturbance area.</p>	No	-
Bushfire	<p>According to the Singleton Council's Bushfire Prone Land Map, New England Highway, Lemington Road and the surrounding access roads are located in bush fire prone land. The facility itself is not mapped as being located on bushfire prone land.</p> <p>The proposal is unlikely to increase the bush fire risk of the facility and would be managed by existing bush fire protection measures.</p>	No	-
Waste Management	During construction, waste generated would be limited to minor quantities of spoil and general construction waste.	No	-
Contaminated land and hazardous materials	<p>A search of the NSW EPA Contaminated land records of notices and the List of NSW Contaminated Sites Notified to the EPA in December 2017 did not identify any contaminated sites within the vicinity of the proposal.</p> <p>AGL has confirmed that the facility is not known to be contaminated.</p>	No	-
Socio-economic effects	The proposal is unlikely to impact on surrounding businesses during construction and operation.	No	-
Demand on resources	The proposal would use standard construction resources. The works are not anticipated to result in an increased demand on resources.	No	-
Cumulative environmental effects	<p>The proposal is located within the Ravensworth mining complex and is located in an area that is surrounded by mining and power operations.</p> <p>The proposal would be minor in nature and is unlikely to have a significant cumulative impact in the area. In facilitating rehabilitation, the proposal would have a positive contribution to local air quality, land use productivity and habitat potential in the longer term.</p>	No	-

## 5.2 Traffic

Construction traffic generated by the proposal would be limited to the delivery of building and weighbridge components and any additional plant and equipment required for the operational stage. During operation, there would be an increase in deliveries to and from the facility. The estimated maximum total traffic movements associated with the expanded facility would be 112 movements per day (56 in-bound and 56 outbound) on Lemington Road. Deliveries from the site would also include deliveries to other AGL sites such as the Liddell Ash Dam, Liddell Power Station and Bayswater Power Station and to other third parties for sale.

Deliveries to and from the facility would use the New England Highway. The New England Highway is a state classified road and has the potential to absorb the additional construction and operational traffic volumes. However further consideration of traffic impacts on the road network would be required as part of the EIS focusing on the intersection of Lemington Road and the New England Highway, Lemington Road and the site access.

## 5.3 Noise and Vibration

The nearest sensitive receivers are located over 7.5km southeast from the facility in the village of Camberwell. Noise and vibration impacts from construction of the facility would be minor and are not anticipated to impact on sensitive receivers.

Increases in operational noise may result should additional plant and equipment be required to manage the increased volume of compost. The distance to receivers means it is unlikely that operational noise impacts would exceed levels specified in the Industrial Noise Policy.

During operation, there would be an increase in deliveries to and from the facility. Deliveries would also be made to other AGL sites and third parties for sale. Traffic noise generated from deliveries has the potential to impact on sensitive receivers located in proximity to these routes. Further consideration of noise and vibration, including traffic noise, would be provided as part of the EIS.

## 5.4 Air quality

The nearest sensitive receiver was identified approximately 7.5 km to the south-east, in the village of Camberwell. AECOM (2016) assessed impacts of the 50,000 tonnes per annum composting facility on dust and odour generation.

Meteorological conditions were considered to play a fundamental role in the transportation and dispersion of air pollution sources that includes dust and odour. Data was sourced from the Bureau of Meteorology as part of the air quality assessment which determined there to be a greater potential for dust impacts during periods of strong dry winds (typically from July to September) while there is a greater potential for odour impacts during the morning in months of still, cool, dry conditions (typically from April to May).

AECOM (2016) considered the projects potential to contribute to local air quality impacts associated with dust and odour finding:

- Existing dust monitoring data indicates that ambient dust levels at the Project site are below regulatory assessment criteria;
- With the implementation of mitigation measures, it is unlikely that the Project would result in cumulative dust impacts to nearby receivers; and
- The distance to existing receivers was likely to be sufficient for minimising odour impacts.

AECOM (2016) considered dust generation potential resulting from:

- Materials handling;
- A windrow turner;
- A front end loader and tractor;
- Up to eight truck movements per day along an all-weather road to and from the receiving area; and
- A gravel vehicle turnaround bay at the receiving area.

Additional traffic movements associated with deliveries and the offsite transfer of compost materials has the potential to increase dust generation in the absence of appropriate management. Under EPL7654, the premises is required to be maintained in a condition which minimises or prevents the emission of dust. The proposed expansion will be required to continue to comply with this condition.

As a scheduled activity, the site is not permitted to cause or permit the emission of any offensive odour from the premises and is required by EPL7654 Condition O7.6 to implement an Odour Management Plan. BetterGrow has confirmed that monitoring to date has not identified odour releases past the premises boundary attributable to on site product management.

Further assessment of air quality would be provided as part of the EIS with particular reference to new organic waste streams and their intended management.

## 5.5 Visual amenity

The facility is not visible from the New England Highway or nearby sensitive receivers due to the surrounding vegetation and the topography. The erection of structures on site may be visible and further assessment of visual amenity would be included as part of the EIS.

## 5.6 Surface water and groundwater

### 5.6.1 Surface Water

The existing surface water drainage environment at the site is highly modified due to historic land use activities including mining, power generation and agriculture. Surface water currently drains to both Bowmans Creek and Bayswater Creek located east and west of the site, respectively. Both creeks converge with the Hunter River approximately seven kilometres south of Ravensworth void 3.

AECOM (2016) described Bayswater Creek as being highly modified with high salinity levels. The flow regime is influenced by the presence of Lake Liddell to the north and discharge from Bayswater Power Station. Bowmans Creek was also described as being highly modified with indications of high salinity levels and generally low flows to the creek.

AECOM (2016) further described the risk of leachate entering the surface water drainage environment as a result of on-site composting activities. Leachate generated from composting activities would likely comprise putrescible organic material that would contain insufficient moisture to produce leachate unless water is added, such as during a significant rainfall event. Should this occur, surface water quality may be reduced due to oxygen demanding wastes. Bunding has been located around the hardstand area as an appropriate prevention method. Other surface water quality impacts that may occur from operation of the project, as identified by AECOM (2016), include:

- Reduced aesthetic values of receiving waters due to increased turbidity and odour effects from ongoing anaerobic decomposition of organic material;
- Health impacts to livestock or persons extracting water from the receiving waters; and

- Reduced health (species richness and biodiversity) of the receiving ecosystems.

The proposal would result in increased on-site composting operations that may increase the risk of leachate generation and resulting surface water impacts.

Condition 1.5 of the development consent and O7 of EPL7654 required the establishment and verification of leachate containment infrastructure in accordance with the EPA's "Environmental Guidelines for Composting and Related Organics Processing Facilities" 2004. A certified Quality Assurance Report has been prepared for this infrastructure. The proposal will introduce an increased catchment area and the leachate containment infrastructure would be appropriately resized to accommodate the increased volume of leachate in accordance with the existing approval.

#### **5.6.2 Groundwater**

The composting activity presents the risk of leachate (produced during on-site composting operations) to discharge to groundwater aquifers beneath the site. AECOM (2016) proposed design measures to ensure leachate is collected and appropriately stored, including the establishment of a low permeability base for the compost processing area and the diversion of runoff from the windrows to a lined leachate pond. The windrows are shaped to maximise runoff and reduce infiltration. AECOM (2016) considered the existing groundwater conditions would not be compromised by the project given the site is located in a region where extensive and long-term open cut and underground mining activities have been carried out, with the subsequent filling of mine voids with power station ash forming the composting facility landform.

The expansion of composting operations would implement similar leachate management measures to reduce groundwater infiltration.

Further assessment of impacts on surface water and ground water would be required as part of the EIS.

## **6. Conclusion**

Bettergrow propose to expand the existing composting facility in Ravensworth No.2 mine in the Singleton LGA. The Proposal would be evaluated under Section 4.40 and 4.15, and be determined under Section 4.38 of the EP&A Act as State significant development.

This document provides a preliminary description of the proposed composting operation, existing information on environmental context and likely key issues. This preliminary environmental assessment supports an application for the SEARs. Once obtained, Bettergrow will prepare an Environmental Impact Statement to address the SEARs to support a formal application for development consent.

## References

AECOM (2016), *Statement of Environmental Effects – Composting Facility Ravensworth No.2 Mine*.

## **Appendix A. Development Consent**

**Our Ref:** DA140/2016.2

16/04/2018

Bettergrow  
PO Box 945  
WINDSOR NSW 2756

## NOTICE OF DETERMINATION

### S4.55 (2) APPLICATION

This approval has been modified pursuant to *Section 4.55 (2) of the Environmental Planning and Assessment Act, 1979*. Notice is hereby given that the application has been determined by granting of consent, subject to conditions (as modified).

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**Development Application No.** DA140/2016.1

**Modification Application No.** DA140/2016.2

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#### Development Application

**Applicant name** Bettergrow

**Applicant address** PO Box 945 WINDSOR NSW 2756

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#### Land to be Developed:

**Address** 74 Lemington Road RAVENSWORTH  
Lot: 10 DP: 1204457

<b>Description of development</b>	<b>4.55(2) Modification to Increase materials from 50,000 tonnes per annum to 76,000 tonnes per annum</b>
<b>Description of modification tonnes per annum</b>	<b>4.55(2) Modification to Increase materials from 50,000 tonnes per annum to 76,000 tonnes per annum</b>
<b>Date of determination</b>	<b>25/11/2016</b>
<b>Date of determination - modification</b>	<b>19/04/2018</b>
<b>Consent to lapse on</b>	<b>25/11/2021</b>

#### **MODIFICATIONS APPROVED:**

- **Condition 1.1 to reflect new Statement of Environmental Effects**
- **Condition 1.6 to be added to reflect general terms of approval**
- **Condition 1.7 to be added to reflect general terms of approval**
- **Condition 4.5 to be added to reflect general terms of approval**

#### **General Conditions**

##### ***Condition 1.1 is amended and shall read as follows:***

##### **1.1 Approved Plans and Supporting Documents**

The development shall be carried out substantially in accordance with the approved stamped and signed plans and/or documentation listed below except where modified by any following condition. Where the plans relate to alteration or additions only those works shown in colour or highlighted are approved.

Reference/Drawing No.	Title/Description	Prepared By	Date/s
Sheet 1 of 6	General Arrangement	Tony Mexon & Associates	23 February 2016
Sheet 3 of 6	Stage 1 Works	Tony Mexon & Associates	23 February 2016
Sheet 4 of 6	Stage 2 Works	Tony Mexon & Associates	23 February 2016
Sheet 5 of 6	Cross Section A-A	Tony Mexon & Associates	23 February 2016
Sheet 6 of 6	Cross Section C-C	Tony Mexon & Associates	23 February 2016

Surface and Groundwater Management Plan Version 7		Bio-Recycle Australia Pty Ltd	3/08/2016
Statement of Environmental Effects		AECOM	15/07/2016
<b>Statement of Environmental Effects</b>	<b>Section 96 Application – Ravensworth Composting Facility</b>	<b>JACOBS</b>	<b>6 February 2018</b>

Note 1: Modifications to the approved plans will require the lodgement and consideration by Council of a modification pursuant to Section 4.55 of the Environmental Planning and Assessment Act, 1979.

Note 2: The approved plans and supporting documentation may be subject to conditions imposed under section 4.17(1)(g) of the Act modifying or amending the development (refer to conditions of consent which must be satisfied prior to the issue of any Construction Certificate).

## 1.2 Damage on Council Assets

Any existing infrastructure damaged due to the proposed works including, but not limited to, (roads, services, drainage, pipes, guardrails, etc.) is to be repaired or replaced at the applicant's expense. The Applicant must notify Singleton Council Infrastructure or Development Engineering immediately when the structure is damaged.

## 1.3 Road Act Approval

In case of any asset damage along Lemington Road (from the New England Highway to the entrance of the mining site) the applicant is to submit a Section 138 application in order to obtain a permit with conditions prior to starting works on Council Road Reserve, and at the end, a Certificate of Compliance from Singleton Council Infrastructure Department is to be obtained. All works are to be carried out in accordance with the Singleton Council Development Construction Specifications and details are to be submitted at the time of the application.

## 1.4 Legal Drainage Point of Discharge

All stormwater from the working area must be directed to a lawful point of discharge such that it does not adversely affect surrounding or downstream properties.

## 1.5 Leachate Dam Design

Singleton Council request a Compliance Certificate from a qualified practicing

Geotechnical/Dams Engineer stating structural adequacy of the dam and that earthworks have been carried out in accordance with the AS 3798-2007 – Guidelines on Earthworks for Commercial and Residential Developments.

The Compliance Certificate along with any correspondence from the Environmental Protection Authority EPA must be submitted to Council prior to filling of the dam

***Condition 1.6 is amended and shall read as follows:***

**1.6 Leachate Management Dam Capacity**

**Singleton Council request a Compliance Certificate from a qualified practicing Hydraulic Engineering Consultancy Company stating that the capacity of the existing dam is adequate to cope with the increment of leachate.**

**The Compliance Certificate along with any correspondence from the Environmental Protection Authority EPA must be submitted to Council prior to increasing the amount of composting material**

***Condition 1.7 is amended and shall read as follows:***

**1.7 Road Impact Assessment**

**Prior to the commencement of the on-site composting increment, the applicant/contractor is to prepare a Road Condition Report of Lemington Road (from the New England Highway to the entrance of the mining site), identifying all existing problems with this section of the roadway. On completion, a joint inspection between the applicant and Council Officers to identify any further damage is to be carried out. If any additional damage has occurred, all rectification works shall be at the applicant's expense, to the satisfaction of the Council Infrastructure Department. The report is to contain (but not limited to): location of existing deficiencies of the roadway and site photos, especially at areas where turning movements will occur.**

**Condition during the ongoing use of the development**

**2.1 Waterways Contamination**

**All reasonable and practicable measures must be taken to prevent pollution of any existing waterways as a result of silt or untreated leachate run-off, and oil or grease spills from any machinery. Wastewater for cleaning equipment must not be discharged or in-directly to any watercourses or stormwater systems.**

**Integrated Development Terms of Approval**

**3.1 Integrated Development General Terms of Approval**

**The following approval bodies have given general terms of approval in relation to the development, as referred to in Section 7.4 of the Environmental Planning and Assessment**

Act 1979:

1. NSW Environment Protection Authority

The applicant is to comply with all general terms of approval provided by the NSW Environment Protection Authority Notice No: 1544342. All records and reports required under the General Terms of Approval must be made available to Council within 48 hours of any request by Council.

A copy of the General Terms of Approval is attached and forms part of the development consent.

## Advices

### 4.1 Lapsing of Consent

In accordance with Section 4.53 of the Environmental Planning and Assessment Act 1979 (as amended), this Development Consent lapses five (5) years after the date from which it operates unless building, engineering or construction work has substantially physically commenced. The building must be completed, in accordance with the approved plans and specifications, within five (5) years from the date when the building was substantially physically commenced.

### 4.2 Process for Modification

The plans and/or conditions of this Consent are binding and may only be modified upon written request to Council under Section 4.55 of the Environmental Planning and Assessment Act, 1979 (as amended). The request shall be accompanied by the appropriate fee and application form. You are not to commence any action, works, contractual negotiations, or the like, on the requested modification unless and until the written authorisation of Council is received by way of an amended consent.

### 4.3 Review of Determination

In accordance with the provisions of Section 8.2 of the Environmental Planning and Assessment Act 1979 (as amended) the applicant can request Council to review this determination. The request must be made within a period of 6 months from the date shown on this determination. A fee, as prescribed under Council's current Management Plan - Fees and Charges, is payable for such a review.

### 4.4 88b Instrument

An 88B Instrument made pursuant to the Conveyancing Act 1919 applies to the subject land and it is the owners/applicants responsibility to check the compliance of the works with the instrument.

### 4.5 Other Permits and Approvals

Approval shall be sought from the New South Wales Environment Protection Authority for the amendment of Environment Protection License number 7654, to allow for the composting of up to 76,000 tonnes per annum. An amended Environment Protection License must be granted by the New South Wales Environment Protection Authority prior to the increase of composting above 50,000 tonnes per annum.

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#### Other Approvals

Local Government Act 1993  
approvals granted under s  
4.12 (5)

N/A

General terms of other  
approvals integrated as part  
of the consent (list  
approvals)

- Mine Subsidence Compensation Act 1961
- Protection of the Environment Operations Act 1997

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#### Right of Appeal

The applicant has the right to appeal this determination in accordance with the provisions of Section 8.9 of the *Environmental Planning and Assessment Act, 1979* within six (6) months of the date of this notice.

#### Right of Review

The applicant has the right to request a review of the determination of this Section 4.55 Application in accordance with the provisions of Section 8.2 of the *Environmental Planning and Assessment Act, 1979*.

---

#### Signed

on behalf of the consent authority

Signature



Title

Development Planner

Name

Mr R Gounder

Date

23/04/2018

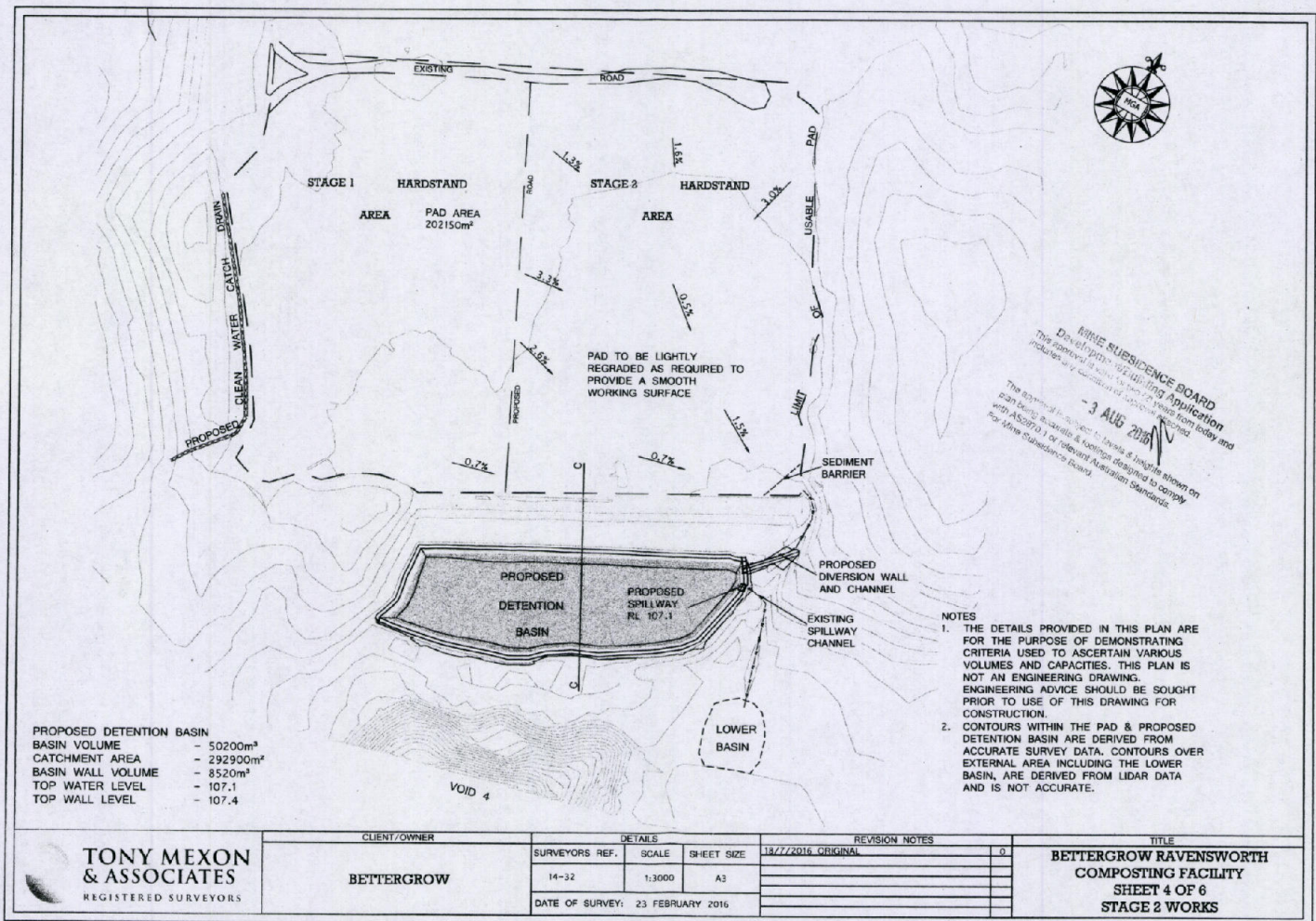
If you have any inquiries regarding the consent, please contact Mr R Gounder of Council's Planning & Regulated Services, on (02) 6578 7290.

#### Note 1

The approval of this Application does not amend the timeframe of the validity of Development Consent, which will lapse on the specified date. Sections 4.53(4) and 4.53(5) of the *Environmental Planning and Assessment Act, 1979* provides that a development consent for the erection of a building does not lapse if the building, engineering or construction work relating to the building is commenced on the land to which the consent applies before the date on which consent would otherwise lapse.

## **Appendix B. Approved Plans**



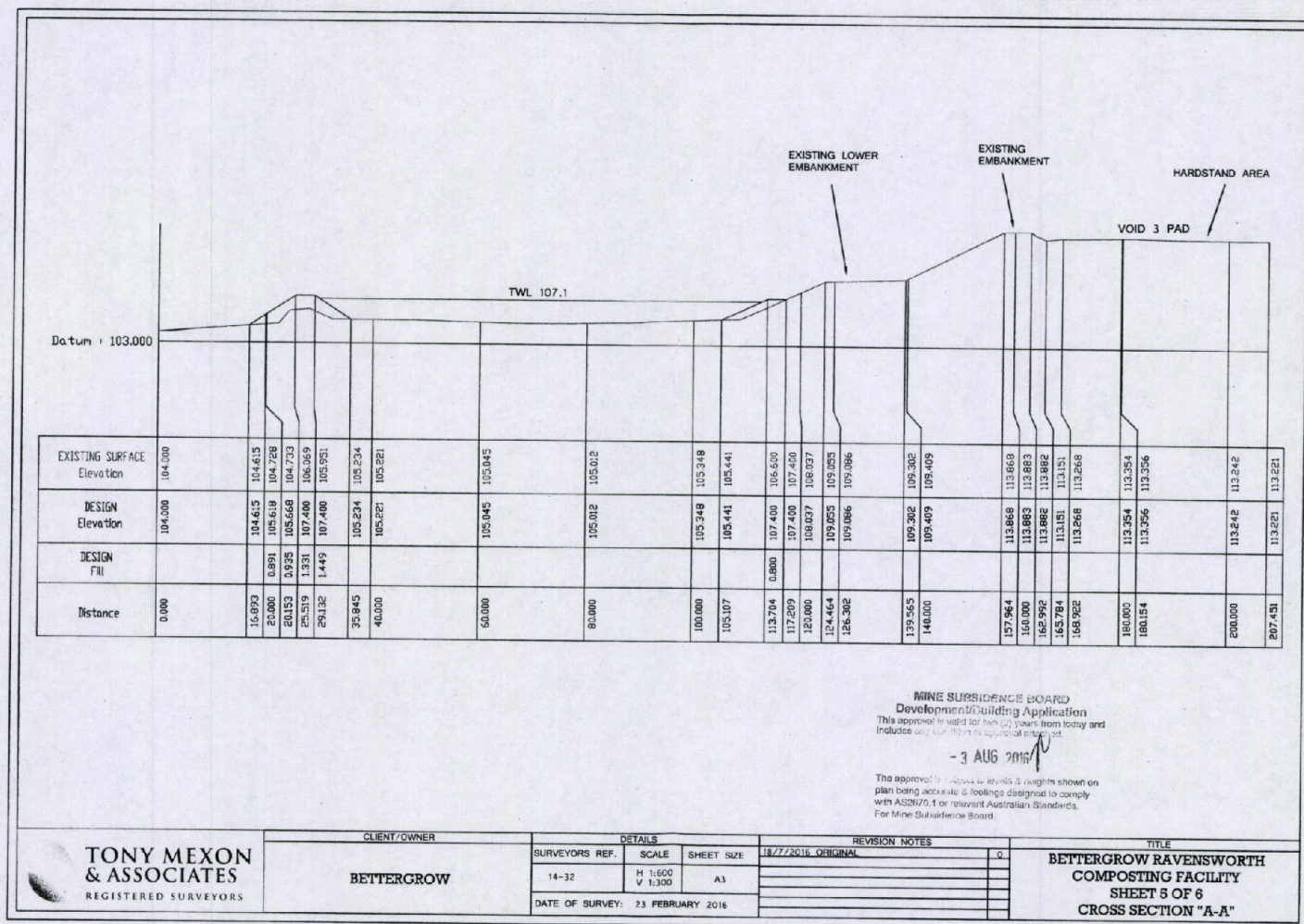


**SINGLETON COUNCIL**

**Approved Plans for Development  
Consent No: DA140/2016**

**Date of Approval: 25/11/2016**

**Assessment Officer: Joshua Real  
Title: Development Planner**

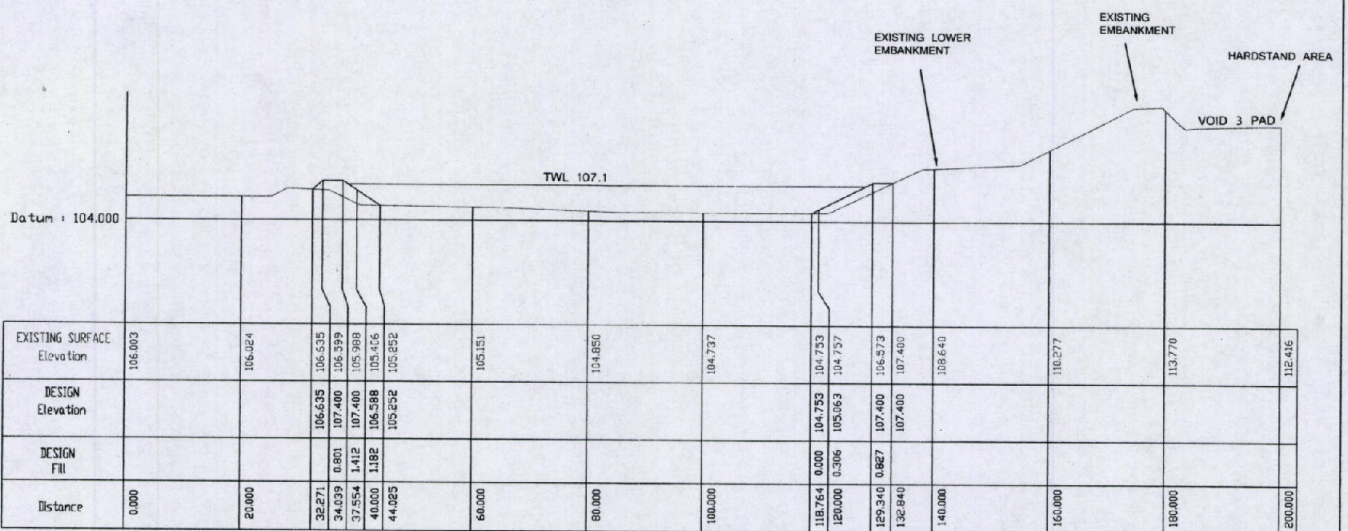


**SINGLETON COUNCIL**

**Approved Plans for Development  
Consent No: DA140/2016**

**Date of Approval: 25/11/2016**


**Assessment Officer: Joshua Real  
Title: Development Planner**



MINE SUBSIDENCE BOARD  
Development/Building Application  
This approval is valid for two (2) years from today and  
includes any work that is approved on this plan.

- 3 AUG 2016

This approval is limited to levels & heights shown on  
this plan, as applicable & footings designed to comply  
with AS2870.1 or relevant Australian Standards.  
For Mine Subsidence Board.

 <b>TONY MEXON &amp; ASSOCIATES</b> REGISTERED SURVEYORS	CLIENT/OWNER	DETAILS			REVISION NOTES		TITLE
	BETTERGROW	SURVEYORS REF.	SCALE	SHEET SIZE	18/7/2016 ORIGINAL	0	BETTERGROW RAVENSWORTH COMPOSTING FACILITY SHEET 6 OF 6 CROSS SECTION "C-C"
		14-32	H 1:600 V 1:300	A3			
	DATE OF SURVEY: 23 FEBRUARY 2016						

**SINGLETON COUNCIL**

**Approved Plans for Development  
Consent No: DA140/2016**

**Date of Approval: 25/11/2016**

**Assessment Officer: Joshua Real  
Title: Development Planner**

## **Appendix C. EPL 7654**



# Environment Protection Licence

Licence - 7654

Licence Details	
Number:	7654
Anniversary Date:	22-June

Licensee
BIO-RECYCLE AUSTRALIA PROPRIETARY LIMITED
PO BOX 945
WINDSOR NSW 2756

Premises
"RAVENSWORTH"
74 LEMINGTON ROAD
RAVENSWORTH NSW 2330

Scheduled Activity
Composting

Fee Based Activity	Scale
Composting	> 50000 T annual capacity to receive organics

Region
Waste & Resource Recovery
59-61 Goulburn Street
SYDNEY NSW 2000
Phone: (02) 9995 5000
Fax: (02) 9995 5999
PO Box A290
SYDNEY SOUTH NSW 1232

# Environment Protection Licence

Licence - 7654



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# Environment Protection Licence

Licence - 7654



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# Environment Protection Licence

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Licence - 7654



## Information about this licence

### Dictionary

A definition of terms used in the licence can be found in the dictionary at the end of this licence.

### Responsibilities of licensee

Separate to the requirements of this licence, general obligations of licensees are set out in the Protection of the Environment Operations Act 1997 ("the Act") and the Regulations made under the Act. These include obligations to:

- ensure persons associated with you comply with this licence, as set out in section 64 of the Act;
- control the pollution of waters and the pollution of air (see for example sections 120 - 132 of the Act);
- report incidents causing or threatening material environmental harm to the environment, as set out in Part 5.7 of the Act.

### Variation of licence conditions

The licence holder can apply to vary the conditions of this licence. An application form for this purpose is available from the EPA.

The EPA may also vary the conditions of the licence at any time by written notice without an application being made.

Where a licence has been granted in relation to development which was assessed under the Environmental Planning and Assessment Act 1979 in accordance with the procedures applying to integrated development, the EPA may not impose conditions which are inconsistent with the development consent conditions until the licence is first reviewed under Part 3.6 of the Act.

### Duration of licence

This licence will remain in force until the licence is surrendered by the licence holder or until it is suspended or revoked by the EPA or the Minister. A licence may only be surrendered with the written approval of the EPA.

### Licence review

The Act requires that the EPA review your licence at least every 5 years after the issue of the licence, as set out in Part 3.6 and Schedule 5 of the Act. You will receive advance notice of the licence review.

### Fees and annual return to be sent to the EPA

For each licence fee period you must pay:

- an administrative fee; and
- a load-based fee (if applicable).

# Environment Protection Licence

Licence - 7654



The EPA publication “A Guide to Licensing” contains information about how to calculate your licence fees. The licence requires that an Annual Return, comprising a Statement of Compliance and a summary of any monitoring required by the licence (including the recording of complaints), be submitted to the EPA. The Annual Return must be submitted within 60 days after the end of each reporting period. See condition R1 regarding the Annual Return reporting requirements.

Usually the licence fee period is the same as the reporting period.

### Transfer of licence

The licence holder can apply to transfer the licence to another person. An application form for this purpose is available from the EPA.

### Public register and access to monitoring data

Part 9.5 of the Act requires the EPA to keep a public register of details and decisions of the EPA in relation to, for example:

- licence applications;
- licence conditions and variations;
- statements of compliance;
- load based licensing information; and
- load reduction agreements.

Under s320 of the Act application can be made to the EPA for access to monitoring data which has been submitted to the EPA by licensees.

### This licence is issued to:

BIO-RECYCLE AUSTRALIA PROPRIETARY LIMITED
PO BOX 945
WINDSOR NSW 2756

subject to the conditions which follow.

# Environment Protection Licence

Licence - 7654



## 1 Administrative Conditions

### A1 What the licence authorises and regulates

A1.1 This licence authorises the carrying out of the scheduled activities listed below at the premises specified in A2. The activities are listed according to their scheduled activity classification, fee-based activity classification and the scale of the operation.

Unless otherwise further restricted by a condition of this licence, the scale at which the activity is carried out must not exceed the maximum scale specified in this condition.

Scheduled Activity	Fee Based Activity	Scale
Composting	Composting	> 50000 T annual capacity to receive organics

### A2 Premises or plant to which this licence applies

A2.1 The licence applies to the following premises:

Premises Details
"RAVENSWORTH"
74 LEMINGTON ROAD
RAVENSWORTH
NSW 2330
PART LOT 10 DP 1204457
PART LOT 10 DP 1204457 AS HIGHLIGHTED IN YELLOW ON TONY MEXON & ASSOCIATES REGISTERED SURVEYORS MAP FOR BETTERGROW PTY LTD TITLED "CONCEPT PLAN SHOWING PROPOSED LEASE OF PART OF LOT 3 DP1193186 BEING MACQUARIE GENERATION'S RAVENSWORTH VOID 3. SHEET 2" SURVEYORS REF 14-32, REVISION DATE 6/2/2017. NOTE: ACCESS ROADS ARE EXCLUDED.

### A3 Information supplied to the EPA

A3.1 Works and activities must be carried out in accordance with the proposal contained in the licence application, except as expressly provided by a condition of this licence.

In this condition the reference to "the licence application" includes a reference to:

- a) the applications for any licences (including former pollution control approvals) which this licence replaces under the Protection of the Environment Operations (Savings and Transitional) Regulation 1998; and
- b) the licence information form provided by the licensee to the EPA to assist the EPA in connection with the issuing of this licence.

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## 2 Discharges to Air and Water and Applications to Land

### P1 Location of monitoring/discharge points and areas

P1.1 The following points referred to in the table are identified in this licence for the purposes of the monitoring and/or the setting of limits for discharges of pollutants to water from the point.

#### *Water and land*

EPA Identification no.	Type of Monitoring Point	Type of Discharge Point	Location Description
1	Leachate dam characterisation		South of site
2	Leachate dam emergency spillway	Leachate dam emergency spillway	Northeast corner of leachate dam
3	Process water tank		Eastern edge of premises
4	Sediment Basin	Sediment Basin	Sediment Basin outlet - TBC

## 3 Limit Conditions

### L1 Pollution of waters

L1.1 Except as may be expressly provided in any other condition of this licence, the licensee must comply with section 120 of the Protection of the Environment Operations Act 1997.

### L2 Concentration limits

L2.1 For each monitoring/discharge point or utilisation area specified in the table below (by a point number), the concentration of a pollutant discharged at that point, or applied to that area, must not exceed the concentration limits specified for that pollutant in the table.

L2.2 Where a pH quality limit is specified in the table, the specified percentage of samples must be within the specified ranges.

L2.3 To avoid any doubt, this condition does not authorise the pollution of waters by any pollutant other than those specified in the table.

L2.4 Water and/or Land Concentration Limits

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## POINT 2

Pollutant	Units of Measure	50 percentile concentration limit	90 percentile concentration limit	within range of	100 percentile concentration limit
Ammonia	milligrams per litre				0.9
pH	pH			6.5 - 8.5	
Total suspended solids	milligrams per litre				50

## POINT 4

Pollutant	Units of Measure	50 percentile concentration limit	90 percentile concentration limit	within range of	100 percentile concentration limit
pH	pH			6.5 - 8.5	
Total suspended solids	milligrams per litre				50

## L3 Waste

- L3.1 The licensee must not cause, permit or allow any waste to be received at the premises, except the wastes expressly referred to in the column titled “Waste” and meeting the definition, if any, in the column titled “Description” in the table below.
- Any waste received at the premises must only be used for the activities referred to in relation to that waste in the column titled “Activity” in the table below.
- Any waste received at the premises is subject to those limits or conditions, if any, referred to in relation to that waste contained in the column titled “Other Limits” in the table below.
- This condition does not limit any other conditions in this licence.

Code	Waste	Description	Activity	Other Limits
NA	General or Specific exempted waste	Paper Crumble	Composting	
NA	General solid waste (non-putrescible)	Urban wood residues (as defined in 'The compost order 2016')	Composting	
NA	Liquid Waste	Wastewater from Bayswater mine void 4	Composting	
NA	General solid waste (non-putrescible)	Natural organic fibrous material (as defined in	Composting	

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		Schedule 1 of the POEO Act)		
NA	Power Station Bottom Ash	Coal ash which meets the conditions of 'The coal ash order 2014' .	Composting	
NA	General solid waste (non-putrescible)	Biosolids (as defined in Schedule 1 of the POEO Act)	Composting	
NA	General solid waste (non-putrescible)	Garden Waste (as defined in Schedule 1 of the POEO Act)	Composting	NA

L3.2 The total amount of waste referred to in the table above, must not exceed 76,000 tonnes received from offsite per year

## L4 Hours of operation

L4.1 Activities at the premises may only be carried out between 6am to 6pm Monday to Saturday.

## L5 Potentially offensive odour

L5.1 No condition of this licence identifies a potentially offensive odour for the purposes of section 129 of the Protection of the Environment Operations Act 1997.

Note: Section 129 of the Protection of the Environment Operations Act 1997, provides that the licensee must not cause or permit the emission of any offensive odour from the premises but provides a defence if the emission is identified in the relevant environment protection licence as a potentially offensive odour and the odour was emitted in accordance with the conditions of a licence directed at minimising odour.

## 4 Operating Conditions

### O1 Activities must be carried out in a competent manner

O1.1 Licensed activities must be carried out in a competent manner.

This includes:

- a) the processing, handling, movement and storage of materials and substances used to carry out the activity; and
- b) the treatment, storage, processing, reprocessing, transport and disposal of waste generated by the activity.

O1.2 No alteration or modification in approved design or method of operation must be made without written approval from the EPA.

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## O2 Maintenance of plant and equipment

- O2.1 All plant and equipment installed at the premises or used in connection with the licensed activity:
- a) must be maintained in a proper and efficient condition; and
  - b) must be operated in a proper and efficient manner.

## O3 Dust

- O3.1 The premises must be maintained in a condition which minimises or prevents the emission of dust from the premises.
- O3.2 Trucks entering and leaving the premises that are carrying loads must be covered at all times except during loading and unloading.
- O3.3 Leachate is not to be used for dust suppression on haul roads.
- O3.4 The licensee must ensure that no material, including sediment or oil, is tracked from the premises.

## O4 Emergency response

- O4.1 The licensee must maintain, and implement as necessary, a current Pollution Incident Response Management Plan (PIRMP) for the premises. The PIRMP must be developed in accordance with the requirements in Part 5.7A of the *Protection of the Environment Operations* (POEO) Act 1997 and POEO regulations. The licensee must keep the incident response plan on the premises at all times. The incident response plan must document systems and procedures to deal with all types of incidents (e.g. spills, explosions or fire) that may occur at the premises or that may be associated with activities that occur at the premises and which are likely to cause harm to the environment. The PIRMP must be tested at least annually or following a pollution incident

Note: The licensee must develop their PIRMP in accordance with the requirements in Part 5.7A of the Protection of the Environment Operations Act 1997 and the Protection of the Environment Operations (General) Regulation 2009.

## O5 Processes and management

- O5.1 Clean stormwater must be diverted around waste and leachate catchments at the premises.
- O5.2 There must be no burning or incineration of waste at the premises.

## O6 Waste management

- O6.1 Waste is only permitted to be received, stored and processed in areas at the premises where leachate barrier has been installed and the barrier is to EPA satisfaction.

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## Leachate Management

- O6.2 Leachate collection and storage facilities must be maintained so as to collect and impound all leachate generated by a storm events of less than 1 in 25 year recurrence interval of one day duration.
- O6.3 Leachate must not be permitted to mix with stormwater or any stormwater infrastructure at the premises.
- O6.4 The licensee must not cause or permit any leachate to pool at the premises (except within designated leachate dams/sumps).
- O6.5 Leachate may be irrigated over active compost windrows only, within the premises.
- O6.6 No leachate is permitted to be discharged from the operating area of the premises
- O6.7 The Licensee shall install a level marker in the leachate dam/s to indicate the volume of leachate in each dam.

## O7 Other operating conditions

- O7.1 The licensee must prepare and implement an Odour Management Plan (OMP) for the premises before any waste is accepted in Stage 1 at the premises. For all odour emissions at the premises the OMP must include but is not limited to:
  - 1. Key performance indicators;
  - 2. Monitoring method(s);
  - 3. Location, frequency and duration of monitoring;
  - 4. Record keeping;
  - 5. Response mechanisms;
  - 6. Compliance reporting; and
  - 7. Complaints management and reporting.
- O7.2 Spray from leachate irrigation, must not drift beyond active compost rows.

## 5 Monitoring and Recording Conditions

### M1 Monitoring records

- M1.1 The results of any monitoring required to be conducted by this licence or a load calculation protocol must be recorded and retained as set out in this condition.
- M1.2 All records required to be kept by this licence must be:
  - a) in a legible form, or in a form that can readily be reduced to a legible form;

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- b) kept for at least 4 years after the monitoring or event to which they relate took place; and
- c) produced in a legible form to any authorised officer of the EPA who asks to see them.

M1.3 The following records must be kept in respect of any samples required to be collected for the purposes of this licence:

- a) the date(s) on which the sample was taken;
- b) the time(s) at which the sample was collected;
- c) the point at which the sample was taken; and
- d) the name of the person who collected the sample.

## M2 Requirement to monitor concentration of pollutants discharged

M2.1 For each monitoring/discharge point or utilisation area specified below (by a point number), the licensee must monitor (by sampling and obtaining results by analysis) the concentration of each pollutant specified in Column 1. The licensee must use the sampling method, units of measure, and sample at the frequency, specified opposite in the other columns:

M2.2 Water and/ or Land Monitoring Requirements

### POINT 1

Pollutant	Units of measure	Frequency	Sampling Method
Alkalinity (as calcium carbonate)	milligrams per litre	Quarterly	Grab sample
Ammonia	milligrams per litre	Quarterly	Grab sample
Calcium	milligrams per litre	Quarterly	Grab sample
Chloride	milligrams per litre	Quarterly	Grab sample
Electrical conductivity	microsiemens per centimetre	Quarterly	Grab sample
Fluoride	milligrams per litre	Quarterly	Grab sample
Iron	milligrams per litre	Quarterly	Grab sample
Magnesium	milligrams per litre	Quarterly	Grab sample
Manganese	milligrams per litre	Quarterly	Grab sample
Nitrogen (total)	milligrams per litre	Quarterly	Grab sample
pH	pH	Quarterly	Grab sample
Phosphorus	milligrams per litre	Quarterly	Grab sample
Polycyclic aromatic hydrocarbons	milligrams per litre	Quarterly	Grab sample
Potassium	milligrams per litre	Quarterly	Grab sample
Sodium	milligrams per litre	Quarterly	Grab sample
Sulfate	milligrams per litre	Quarterly	Grab sample
Total organic carbon	milligrams per litre	Quarterly	Grab sample
Total petroleum hydrocarbons	milligrams per litre	Quarterly	Grab sample
Total Phenolics	milligrams per litre	Quarterly	Grab sample

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Total suspended solids	milligrams per litre	Quarterly	Grab sample
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## POINT 2

Pollutant	Units of measure	Frequency	Sampling Method
Alkalinity (as calcium carbonate)	milligrams per litre	Daily during any discharge	Grab sample
Ammonia	milligrams per litre	Daily during any discharge	Grab sample
Calcium	milligrams per litre	Daily during any discharge	Grab sample
Chloride	milligrams per litre	Daily during any discharge	Grab sample
Electrical conductivity	microsiemens per centimetre	Daily during any discharge	Grab sample
Fluoride	milligrams per litre	Daily during any discharge	Grab sample
Iron	milligrams per litre	Daily during any discharge	Grab sample
Magnesium	milligrams per litre	Daily during any discharge	Grab sample
Manganese	milligrams per litre	Daily during any discharge	Grab sample
Nitrogen (total)	milligrams per litre	Daily during any discharge	Grab sample
pH	pH	Daily during any discharge	Grab sample
Phosphorus	milligrams per litre	Daily during any discharge	Grab sample
Polycyclic aromatic hydrocarbons	milligrams per litre	Daily during any discharge	Grab sample
Potassium	milligrams per litre	Daily during any discharge	Grab sample
Sodium	milligrams per litre	Daily during any discharge	Grab sample
Sulfate	milligrams per litre	Daily during any discharge	Grab sample
Total organic carbon	milligrams per litre	Daily during any discharge	Grab sample
Total petroleum hydrocarbons	milligrams per litre	Daily during any discharge	Grab sample
Total Phenolics	milligrams per litre	Daily during any discharge	Grab sample
Total suspended solids	milligrams per litre	Daily during any discharge	Grab sample

## POINT 3

Pollutant	Units of measure	Frequency	Sampling Method
Boron	milligrams per litre	Quarterly	Grab sample

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Cadmium	milligrams per litre	Quarterly	Grab sample
Copper	milligrams per kilogram	Quarterly	Grab sample
Electrical conductivity	microsiemens per centimetre	Quarterly	Grab sample
Iron	milligrams per litre	Quarterly	Grab sample
Molybdenum	milligrams per litre	Quarterly	Grab sample
Nickel	milligrams per litre	Quarterly	Grab sample
pH	pH	Quarterly	Grab sample
Silver	milligrams per litre	Quarterly	Grab sample
Total suspended solids	milligrams per litre	Quarterly	Grab sample

## POINT 4

Pollutant	Units of measure	Frequency	Sampling Method
Ammonia	milligrams per litre	Daily during any discharge	Grab sample
Electrical conductivity	microsiemens per centimetre	Daily during any discharge	Grab sample
Nitrogen (total)	milligrams per litre	Daily during any discharge	Grab sample
pH	pH	Daily during any discharge	Grab sample
Total organic carbon	milligrams per litre	Daily during any discharge	Grab sample
Total petroleum hydrocarbons	milligrams per litre	Daily during any discharge	Grab sample
Total suspended solids	milligrams per litre	Daily during any discharge	Grab sample

## M3 Testing methods - concentration limits

- M3.1 Subject to any express provision to the contrary in this licence, monitoring for the concentration of a pollutant discharged to waters or applied to a utilisation area must be done in accordance with the Approved Methods Publication unless another method has been approved by the EPA in writing before any tests are conducted.

## M4 Recording of pollution complaints

- M4.1 The licensee must keep a legible record of all complaints made to the licensee or any employee or agent of the licensee in relation to pollution arising from any activity to which this licence applies.
- M4.2 The record must include details of the following:
- the date and time of the complaint;
  - the method by which the complaint was made;
  - any personal details of the complainant which were provided by the complainant or, if no such details

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- were provided, a note to that effect;
- d) the nature of the complaint;
- e) the action taken by the licensee in relation to the complaint, including any follow-up contact with the complainant; and
- f) if no action was taken by the licensee, the reasons why no action was taken.

M4.3 The record of a complaint must be kept for at least 4 years after the complaint was made.

M4.4 The record must be produced to any authorised officer of the EPA who asks to see them.

## M5 Telephone complaints line

- M5.1 The licensee must operate during its operating hours a telephone complaints line for the purpose of receiving any complaints from members of the public in relation to activities conducted at the premises or by the vehicle or mobile plant, unless otherwise specified in the licence.
- M5.2 The licensee must notify the public of the complaints line telephone number and the fact that it is a complaints line so that the impacted community knows how to make a complaint.
- M5.3 The preceding two conditions do not apply until 3 months after: the date of the issue of this licence.

## M6 Other monitoring and recording conditions

- M6.1 The licensee must record the following information for each load of waste(s) received at the premises:
  - (a) the registration number of the vehicle;
  - (b) the time and date of receipt of the waste;
  - (c) the source of the waste;
  - (d) the type(s) of waste; and
  - (e) the quantity of each type of waste (in tonnes).

## 6 Reporting Conditions

### R1 Annual return documents

- R1.1 The licensee must complete and supply to the EPA an Annual Return in the approved form comprising:
  - 1. a Statement of Compliance,
  - 2. a Monitoring and Complaints Summary,
  - 3. a Statement of Compliance - Licence Conditions,
  - 4. a Statement of Compliance - Load based Fee,
  - 5. a Statement of Compliance - Requirement to Prepare Pollution Incident Response Management Plan,
  - 6. a Statement of Compliance - Requirement to Publish Pollution Monitoring Data; and
  - 7. a Statement of Compliance - Environmental Management Systems and Practices.

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At the end of each reporting period, the EPA will provide to the licensee a copy of the form that must be completed and returned to the EPA.

- R1.2 An Annual Return must be prepared in respect of each reporting period, except as provided below.
- R1.3 Where this licence is transferred from the licensee to a new licensee:
- a) the transferring licensee must prepare an Annual Return for the period commencing on the first day of the reporting period and ending on the date the application for the transfer of the licence to the new licensee is granted; and
  - b) the new licensee must prepare an Annual Return for the period commencing on the date the application for the transfer of the licence is granted and ending on the last day of the reporting period.
- R1.4 Where this licence is surrendered by the licensee or revoked by the EPA or Minister, the licensee must prepare an Annual Return in respect of the period commencing on the first day of the reporting period and ending on:
- a) in relation to the surrender of a licence - the date when notice in writing of approval of the surrender is given; or
  - b) in relation to the revocation of the licence - the date from which notice revoking the licence operates.
- R1.5 The Annual Return for the reporting period must be supplied to the EPA via eConnect *EPA* or by registered post not later than 60 days after the end of each reporting period or in the case of a transferring licence not later than 60 days after the date the transfer was granted (the 'due date').
- R1.6 The licensee must retain a copy of the Annual Return supplied to the EPA for a period of at least 4 years after the Annual Return was due to be supplied to the EPA.
- R1.7 Within the Annual Return, the Statements of Compliance must be certified and the Monitoring and Complaints Summary must be signed by:
- a) the licence holder; or
  - b) by a person approved in writing by the EPA to sign on behalf of the licence holder.

Note: The term "reporting period" is defined in the dictionary at the end of this licence. Do not complete the Annual Return until after the end of the reporting period.

Note: An application to transfer a licence must be made in the approved form for this purpose.

## R2 Notification of environmental harm

- R2.1 Notifications must be made by telephoning the Environment Line service on 131 555.
- R2.2 The licensee must provide written details of the notification to the EPA within 7 days of the date on which the incident occurred.

Note: The licensee or its employees must notify all relevant authorities of incidents causing or threatening material harm to the environment immediately after the person becomes aware of the incident in accordance with the requirements of Part 5.7 of the Act.

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## R3 Written report

- R3.1 Where an authorised officer of the EPA suspects on reasonable grounds that:
- a) where this licence applies to premises, an event has occurred at the premises; or
  - b) where this licence applies to vehicles or mobile plant, an event has occurred in connection with the carrying out of the activities authorised by this licence,
- and the event has caused, is causing or is likely to cause material harm to the environment (whether the harm occurs on or off premises to which the licence applies), the authorised officer may request a written report of the event.
- R3.2 The licensee must make all reasonable inquiries in relation to the event and supply the report to the EPA within such time as may be specified in the request.
- R3.3 The request may require a report which includes any or all of the following information:
- a) the cause, time and duration of the event;
  - b) the type, volume and concentration of every pollutant discharged as a result of the event;
  - c) the name, address and business hours telephone number of employees or agents of the licensee, or a specified class of them, who witnessed the event;
  - d) the name, address and business hours telephone number of every other person (of whom the licensee is aware) who witnessed the event, unless the licensee has been unable to obtain that information after making reasonable effort;
  - e) action taken by the licensee in relation to the event, including any follow-up contact with any complainants;
  - f) details of any measure taken or proposed to be taken to prevent or mitigate against a recurrence of such an event; and
  - g) any other relevant matters.
- R3.4 The EPA may make a written request for further details in relation to any of the above matters if it is not satisfied with the report provided by the licensee. The licensee must provide such further details to the EPA within the time specified in the request.

## R4 Other reporting conditions

- R4.1 The licensee must maintain a daily log and record the following data of fires at the site:
- a) Time and date when the fire was observed, started or reported.
  - b) Whether the fire was authorised by the licensee, and, if not, the circumstances which ignited the fire.
  - c) The time and date that the fire ceased and whether it burnt out or was extinguished.
  - d) The location of fire (eg. clean timber stockpile, putrescible garbage cell, etc).
  - e) Prevailing weather conditions.
  - f) Observations made in regard to smoke direction and dispersion.
  - g) The amount of waste that was combusted by the fire.
  - h) Action taken to extinguish the fire.
- R4.2 The licensee or its employees or agents must notify the EPA in accordance with conditions R2.1 and R2.2 of all fires at the premises as soon as practical after becoming aware of the incident.

## Annual Waste Summary Reporting

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- R4.3 The licensee must complete and submit to the EPA an Annual Waste Summary Report each financial year.
- R4.4 The Annual Waste Summary Report must be submitted to the EPA via the Waste and Resource Reporting Portal (WARRP) within 60 days of the end of the financial year.

## 7 General Conditions

### G1 Copy of licence kept at the premises or plant

- G1.1 A copy of this licence must be kept at the premises to which the licence applies.
- G1.2 The licence must be produced to any authorised officer of the EPA who asks to see it.
- G1.3 The licence must be available for inspection by any employee or agent of the licensee working at the premises.

## 8 Special Conditions

### E1 Requirement to Provide a Financial Assurance

- E1.1 A financial assurance in the form of an unconditional and irrevocable and on demand guarantee from a bank, building society or credit union operating in Australia as “Authorised Deposit-taking Institutions” under the banking Act 1959 of the Commonwealth of Australia and supervised by the Australian Prudential regulatory Authority (APRA) must be provided to the EPA.
- E1.2 The financial assurance must be in favour of the Environment Protection Authority in the amount of one hundred thousand dollars (\$100,000.) and provided to the EPA by 5pm on 31 August 2017. The financial assurance is required to secure or guarantee funding for works or programs required by or under this licence. The financial assurance must contain a term that provides that any monies claimed can be paid to the EPA or, at the written direction of the EPA, to any other person. The licensee must provide to the EPA, along with the original counterpart guarantees, confirmation in writing that the financial institution providing the guarantees is subject to supervision by APRA.
- E1.3 The financial assurance must be in favour of the Environment Protection Authority in the amount of two hundred dollars (\$200,000) and provided to the EPA by 5pm on 31 August 2018. The financial assurance is required to secure or guarantee funding for works or programmes required by or under this licence. The financial assurance must contain a term that provides that any monies claimed can be paid to the EPA or, at the written direction of the EPA, to any other person. The licensee must provide to the EPA, along with the original counterpart guarantees, confirmation in writing that the financial institution providing the guarantees is subject to supervision by APRA.
- E1.4 The financial assurance must be in favour of the Environment Protection Authority in the amount of three hundred thousand dollars (\$300,000) and provided to the EPA by 5pm on 31 August 2019. The financial assurance is required to secure or guarantee funding for works or programmes required by or under this

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licence. The financial assurance must contain a term that provides that any monies claimed can be paid to the EPA or, at the written direction of the EPA, to any other person. The licensee must provide to the EPA, along with the original counterpart guarantees, confirmation in writing that the financial institution providing the guarantees is subject to supervision by APRA.

- E1.5 The financial assurance must be maintained during the operation of the facility and thereafter until such time as the EPA is satisfied the premises is environmentally secure.
- E1.6 The EPA may require an increase in the amount of the financial assurance at any time as a result of reassessment of the total likely costs and expenses of rehabilitation of the premises.
- E1.7 The EPA may claim on a financial assurance under s303 of the POEO Act if a licensee fails to carry out any work or program required to comply with the conditions of this licence.
- E1.8 The financial assurance must be replenished by the full amount claimed or realised if the EPA has claimed on or realised the financial assurance or any part of it to undertake a work or program required to be carried out by the licence which has not been undertaken by the licence holder.

## E2 Environmental obligations of licensee

- E2.1 While the licensee's premises are being used for the purpose to which the licence relates, the licensee must:
  - a) Clean up any spill, leak or other discharge of any waste(s) or other material(s) as soon as practicable after it becomes known to the licensee or to one of the licensee's employees or agents.
  - b) In the event(s) that any liquid and non-liquid waste(s) is unlawfully deposited on the premises, such waste(s) must be removed and lawfully disposed of as soon as practicable or in accordance with any direction given by the EPA.
  - c) Provide all monitoring data as required by the conditions of this licence or as directed by the EPA.
- E2.2 In the event of an earthquake, storm, fire, flood or any other event where it is reasonable to suspect that a pollution incident has occurred, is occurring or is likely to occur, the licensee must:
  - a) Make all efforts to contain all fire water on the premises;
  - b) Make all efforts to control air pollution from the premises;
  - c) Make all efforts to contain any discharge, spill or run-off from the premises;
  - d) Make all efforts to prevent flood water entering the premises;
  - e) Remediate and rehabilitate any exposed areas of soil and/or waste;
  - f) Lawfully dispose of all liquid and solid waste(s) stored on the premises that is not already securely disposed of;
  - g) At the request of the EPA, monitor groundwater beneath the premises and its potential to migrate from the premises;
  - h) At the request of the EPA, monitor surface water leaving the premises; and
  - i) Ensure the premises is secure.
- E2.3 After the licensee's premises cease to be used for the purposes to which the licence relates or in the event that the licensee ceases to carry out the activity that is the subject of this licence, that licensee must:
  - a) Remove and lawfully dispose of all liquid and non-liquid waste stored on the licensee's premises; and
  - b) Rehabilitate the premises, including conducting an assessment of the site and if required remediation of any site contamination.

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## Dictionary

### General Dictionary

<b>3DGM [in relation to a concentration limit]</b>	Means the three day geometric mean, which is calculated by multiplying the results of the analysis of three samples collected on consecutive days and then taking the cubed root of that amount. Where one or more of the samples is zero or below the detection limit for the analysis, then 1 or the detection limit respectively should be used in place of those samples
<b>Act</b>	Means the Protection of the Environment Operations Act 1997
<b>activity</b>	Means a scheduled or non-scheduled activity within the meaning of the Protection of the Environment Operations Act 1997
<b>actual load</b>	Has the same meaning as in the Protection of the Environment Operations (General) Regulation 2009
<b>AM</b>	Together with a number, means an ambient air monitoring method of that number prescribed by the <i>Approved Methods for the Sampling and Analysis of Air Pollutants in New South Wales</i> .
<b>AMG</b>	Australian Map Grid
<b>anniversary date</b>	The anniversary date is the anniversary each year of the date of issue of the licence. In the case of a licence continued in force by the Protection of the Environment Operations Act 1997, the date of issue of the licence is the first anniversary of the date of issue or last renewal of the licence following the commencement of the Act.
<b>annual return</b>	Is defined in R1.1
<b>Approved Methods Publication</b>	Has the same meaning as in the Protection of the Environment Operations (General) Regulation 2009
<b>assessable pollutants</b>	Has the same meaning as in the Protection of the Environment Operations (General) Regulation 2009
<b>BOD</b>	Means biochemical oxygen demand
<b>CEM</b>	Together with a number, means a continuous emission monitoring method of that number prescribed by the <i>Approved Methods for the Sampling and Analysis of Air Pollutants in New South Wales</i> .
<b>COD</b>	Means chemical oxygen demand
<b>composite sample</b>	Unless otherwise specifically approved in writing by the EPA, a sample consisting of 24 individual samples collected at hourly intervals and each having an equivalent volume.
<b>cond.</b>	Means conductivity
<b>environment</b>	Has the same meaning as in the Protection of the Environment Operations Act 1997
<b>environment protection legislation</b>	Has the same meaning as in the Protection of the Environment Administration Act 1991
<b>EPA</b>	Means Environment Protection Authority of New South Wales.
<b>fee-based activity classification</b>	Means the numbered short descriptions in Schedule 1 of the Protection of the Environment Operations (General) Regulation 2009.
<b>general solid waste (non-putrescible)</b>	Has the same meaning as in Part 3 of Schedule 1 of the Protection of the Environment Operations Act 1997

# Environment Protection Licence

Licence - 7654

<b>flow weighted composite sample</b>	Means a sample whose composites are sized in proportion to the flow at each composites time of collection.
<b>general solid waste (putrescible)</b>	Has the same meaning as in Part 3 of Schedule 1 of the Protection of the Environment Operations Act 1997
<b>grab sample</b>	Means a single sample taken at a point at a single time
<b>hazardous waste</b>	Has the same meaning as in Part 3 of Schedule 1 of the Protection of the Environment Operations Act 1997
<b>licensee</b>	Means the licence holder described at the front of this licence
<b>load calculation protocol</b>	Has the same meaning as in the Protection of the Environment Operations (General) Regulation 2009
<b>local authority</b>	Has the same meaning as in the Protection of the Environment Operations Act 1997
<b>material harm</b>	Has the same meaning as in section 147 Protection of the Environment Operations Act 1997
<b>MBAS</b>	Means methylene blue active substances
<b>Minister</b>	Means the Minister administering the Protection of the Environment Operations Act 1997
<b>mobile plant</b>	Has the same meaning as in Part 3 of Schedule 1 of the Protection of the Environment Operations Act 1997
<b>motor vehicle</b>	Has the same meaning as in the Protection of the Environment Operations Act 1997
<b>O&amp;G</b>	Means oil and grease
<b>percentile [in relation to a concentration limit of a sample]</b>	Means that percentage [eg.50%] of the number of samples taken that must meet the concentration limit specified in the licence for that pollutant over a specified period of time. In this licence, the specified period of time is the Reporting Period unless otherwise stated in this licence.
<b>plant</b>	Includes all plant within the meaning of the Protection of the Environment Operations Act 1997 as well as motor vehicles.
<b>pollution of waters [or water pollution]</b>	Has the same meaning as in the Protection of the Environment Operations Act 1997
<b>premises</b>	Means the premises described in condition A2.1
<b>public authority</b>	Has the same meaning as in the Protection of the Environment Operations Act 1997
<b>regional office</b>	Means the relevant EPA office referred to in the Contacting the EPA document accompanying this licence
<b>reporting period</b>	For the purposes of this licence, the reporting period means the period of 12 months after the issue of the licence, and each subsequent period of 12 months. In the case of a licence continued in force by the Protection of the Environment Operations Act 1997, the date of issue of the licence is the first anniversary of the date of issue or last renewal of the licence following the commencement of the Act.
<b>restricted solid waste</b>	Has the same meaning as in Part 3 of Schedule 1 of the Protection of the Environment Operations Act 1997
<b>scheduled activity</b>	Means an activity listed in Schedule 1 of the Protection of the Environment Operations Act 1997
<b>special waste</b>	Has the same meaning as in Part 3 of Schedule 1 of the Protection of the Environment Operations Act 1997
<b>TM</b>	Together with a number, means a test method of that number prescribed by the <i>Approved Methods for the Sampling and Analysis of Air Pollutants in New South Wales</i> .

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<b>TSP</b>	Means total suspended particles
<b>TSS</b>	Means total suspended solids
<b>Type 1 substance</b>	Means the elements antimony, arsenic, cadmium, lead or mercury or any compound containing one or more of those elements
<b>Type 2 substance</b>	Means the elements beryllium, chromium, cobalt, manganese, nickel, selenium, tin or vanadium or any compound containing one or more of those elements
<b>utilisation area</b>	Means any area shown as a utilisation area on a map submitted with the application for this licence
<b>waste</b>	Has the same meaning as in the Protection of the Environment Operations Act 1997
<b>waste type</b>	Means liquid, restricted solid waste, general solid waste (putrescible), general solid waste (non - putrescible), special waste or hazardous waste

Ms Cathryn Ferguson

Environment Protection Authority

(By Delegation)

Date of this edition: 25-September-2000

## End Notes

- 1 Licence varied by notice 1011936, issued on 15-Oct-2001, which came into effect on 09-Nov-2001.
- 2 Condition A1.3 Not applicable varied by notice issued on <issue date> which came into effect on <effective date>
- 3 Licence varied by notice 1097525, issued on 20-Feb-2009, which came into effect on 20-Feb-2009.
- 4 Licence varied by a change to the DECCW region, issued on 01-Sep-2010, which came into effect on 01-Sep-2010.
- 5 Licence varied by notice 1517796 issued on 03-Oct-2014
- 6 Licence varied by notice 1543233 issued on 12-May-2017
- 7 Licence varied by notice 1565003 issued on 14-Jun-2018

## **Appendix D. AHIMS search results**

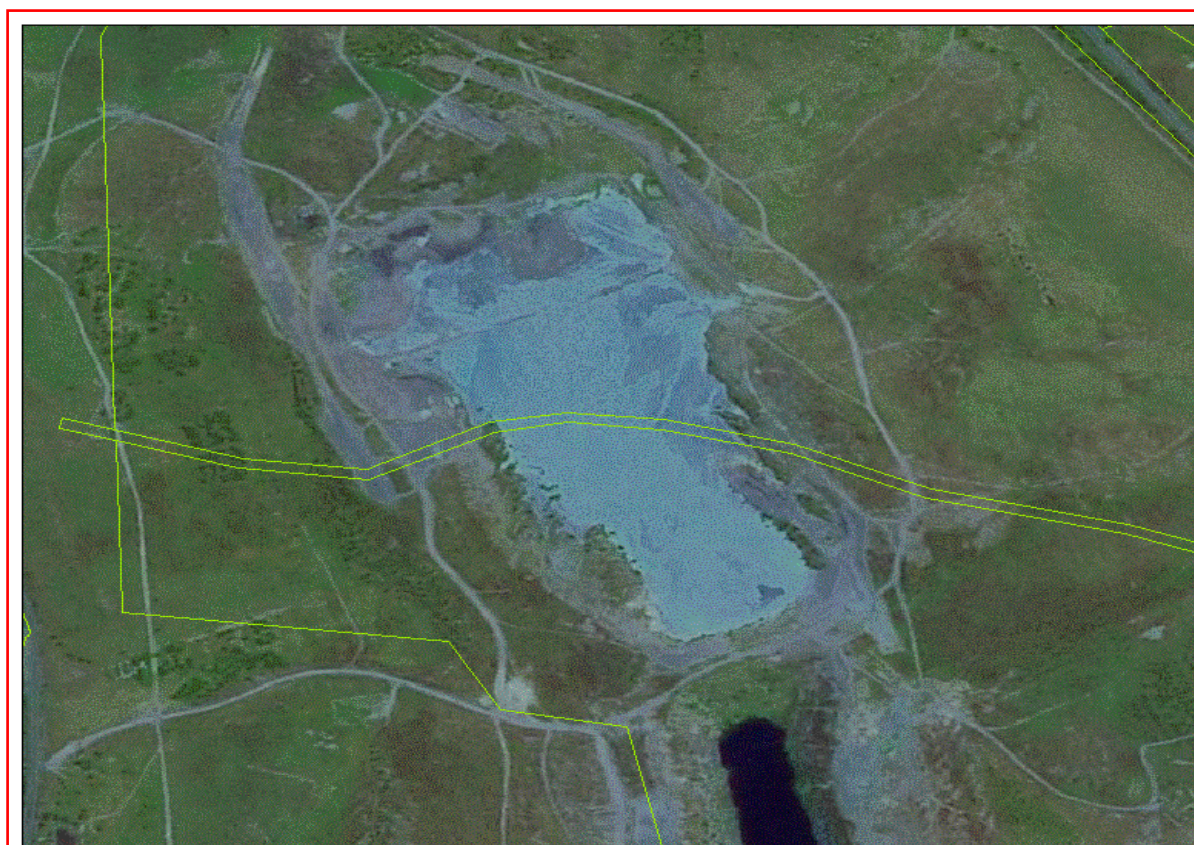
Minoshi Weerasinghe  
100 Christie Street  
St Leonards New South Wales 2065  
Attention: Minoshi Weerasinghe  
Email: minoshi.weerasinghe@jacobs.com

Date: 05 December 2017

Dear Sir or Madam:

**AHIMS Web Service search for the following area at Lat, Long From : -32.4356, 151.0302 - Lat, Long To : -32.4246, 151.0476 with a Buffer of 50 meters, conducted by Minoshi Weerasinghe on 05 December 2017.**

The context area of your search is shown in the map below. Please note that the map does not accurately display the exact boundaries of the search as defined in the paragraph above. The map is to be used for general reference purposes only.



A search of the Office of the Environment and Heritage AHIMS Web Services (Aboriginal Heritage Information Management System) has shown that:

<b>1</b>	<b>Aboriginal sites are recorded in or near the above location.</b>
<b>0</b>	<b>Aboriginal places have been declared in or near the above location. *</b>

**If your search shows Aboriginal sites or places what should you do?**

- You must do an extensive search if AHIMS has shown that there are Aboriginal sites or places recorded in the search area.
- If you are checking AHIMS as a part of your due diligence, refer to the next steps of the Due Diligence Code of practice.
- You can get further information about Aboriginal places by looking at the gazettal notice that declared it. Aboriginal places gazetted after 2001 are available on the [NSW Government Gazette \(http://www.nsw.gov.au/gazette\)](http://www.nsw.gov.au/gazette) website. Gazettal notices published prior to 2001 can be obtained from Office of Environment and Heritage's Aboriginal Heritage Information Unit upon request

**Important information about your AHIMS search**

- The information derived from the AHIMS search is only to be used for the purpose for which it was requested. It is not be made available to the public.
- AHIMS records information about Aboriginal sites that have been provided to Office of Environment and Heritage and Aboriginal places that have been declared by the Minister;
- Information recorded on AHIMS may vary in its accuracy and may not be up to date .Location details are recorded as grid references and it is important to note that there may be errors or omissions in these recordings,
- Some parts of New South Wales have not been investigated in detail and there may be fewer records of Aboriginal sites in those areas. These areas may contain Aboriginal sites which are not recorded on AHIMS.
- Aboriginal objects are protected under the National Parks and Wildlife Act 1974 even if they are not recorded as a site on AHIMS.
- This search can form part of your due diligence and remains valid for 12 months.