

Preliminary Environmental Assessment

Widemere Recycling Facility

Prepared for Boral Recycling Pty Ltd | 8 May 2014





Preliminary Environmental Assessment

Widemere Recycling Facility

Prepared for Boral Recycling Pty Ltd | 8 May 2014

Ground Floor, Suite 01, 20 Chandos Street St Leonards, NSW, 2065

> T +61 2 9493 9500 F +61 2 9493 9599 E info@emgamm.com

Preliminary Environmental Assessment

Final

Report J13127RP1 | Prepared for Boral Recycling Pty Ltd | 8 May 2014

Prepared by	Jarred Kramer	Approved by	Brett McLennan
Position	Environmental Engineer	Position	Director
Signature	Jan -	Signature	18m yennam
Date	8 May 2014	Date	8 May 2014

This report has been prepared in accordance with the brief provided by the client and has relied upon the information collected at or under the times and conditions specified in the report. All findings, conclusions or recommendations contained in the report are based on the aforementioned circumstances. The report is for the use of the client and no responsibility will be taken for its use by other parties. The client may, at its discretion, use the report to inform regulators and the public.

© Reproduction of this report for educational or other non-commercial purposes is authorised without prior written permission from EMM provided the source is fully acknowledged. Reproduction of this report for resale or other commercial purposes is prohibited without EMM's prior written permission.

Document Control

Version	Date	Prepared by	Reviewed by
V1	9 April 2014	Jarred Kramer Kate Cox	Brett McLennan
V2	8 May 2014	Jarred Kramer	Kate Cox



T+61 (0)2 9493 9500 | F+61 (0)2 9493 9599

Ground Floor | Suite 01 | 20 Chandos Street | St Leonards | New South Wales | 2065 | Australia

emgamm.com

Table of Contents

Chapter 1	Introduction	1
1.1	Project overview	1
1.2	The proposal	1
1.3	The proponent	1
1.4	Project location	1
1.5	Purpose of this document	1
Chapter 2	Existing operations	5
2.1	Approval history	5
2.2	Approved operations	5
	2.2.1 Site layout	5
	2.2.2 Permitted wastes	5
	2.2.3 Processing area	6
	2.2.4 Products	7
	2.2.5 Waste management	7
	2.2.6 Staff and hours of operation	8
	2.2.7 Access and parking	8
2.3	Environmental management	9
Chapter 3	Project description	11
3.1	Introduction	11
3.2	Processing capacity	11
3.3	Materials received	11
3.4	Site layout	12
3.5	Hours of operation	12
3.6	Transport and employees	12
3.7	Licences and environmental management	13
Chapter 4	Statutory framework	15
4.1	Introduction	15
4.2	NSW Environmental Planning and Assessment Act 1979	15
	4.2.1 Approval process	15
	4.2.2. Other State approvals not required as which provet be greated	
4.3	4.2.2 Other State approvals not required or which must be granted	17
1.5	Commonwealth Environment Protection and Biodiversity Conservation Act 1999	17 17
4.4	· · · · · · · · · · · · · · · · · · ·	
	Commonwealth Environment Protection and Biodiversity Conservation Act 1999	17

Table of Contents (Cont'd)

	4.4.3 Waste Avoidance and Resource Recovery Act 2001	19
Chapter 5	Stakeholder engagement	21
Chapter 6	Environmental matters	23
6.1	Introduction	23
6.2	Noise	23
	6.2.1 Existing environment	23
	6.2.2 Assessment approach	23
6.3	Air quality and greenhouse gas emissions	24
	6.3.1 Existing environment	24
	6.3.2 Assessment approach	24
6.4	Traffic and transport	25
	6.4.1 Existing environment	25
	6.4.2 Assessment approach	25
6.5	Surface water	25
	6.5.1 Existing environment	25
	6.5.2 Assessment approach	26
	6.5.3 Waste management	26
6.6	Other matters	26
	6.6.1 Ecology	26
	6.6.2 Historic and Aboriginal cultural heritage	27
	6.6.3 Contamination	27
	6.6.4 Social and economics	27
	6.6.5 Visual	27
	6.6.6 Hazard and risk	28
Chapter 7	Conclusion	29

Tables

2.1	Product produced per annum	7
Figure	25	
Ü		
1.1	Regional context	3
2.1	Site layout	10

J13127RP1 iii

J13127RP1 iv

1 Introduction

1.1 Project overview

Boral Recycling (Boral) operates the Widemere Recycling facility (the facility) at Wetherill Park. The facility accepts construction and demolition waste where it separates, crushes and blends it with quarry material to form construction materials. Boral is seeking to modify operations at the facility, including increasing the maximum processing rate from 750,000 tonnes per annum (tpa) to 1,000,000 tpa (the proposal).

Based on discussions with NSW Planning & Environment (P&E) the proposal requires a new development application (DA). Accordingly, it will be assessed as a State Significant Development (SSD) under Part 4.1 of the NSW *Environmental Planning and Assessment Act 1979* (EP&A Act).

1.2 The proposal

Due to a change in market conditions and demand for recycled construction materials, Boral is seeking to modify approved operations to accommodate an increase in production volumes, undertake a minor internal road realignment to improve operation of the facility, permit the receival of additional material types, and allow maintenance activities on Sundays.

1.3 The proponent

Boral is a large international company with four operating divisions. The Construction Materials and Cement (CMC) division, which includes Boral Recycling, specialises in quarry, concrete, asphalt, transport and contracting operations throughout Australia, operating with a regional focus to service its local markets. It produces a broad range of quality recycled products which range from road bases and speciality products, to aggregates. Boral Recycling is the proponent for the DA.

1.4 Project location

The facility is located off Widemere Road, Wetherill Park within the Fairfield local government area (LGA), close to its boundary with Holroyd LGA. It is located between the employment lands developed in Boral's Greystanes Estate and the Wetherill Park industrial area, one of Sydney's largest industrial precincts (see Figure 1.1).

To the north of the facility is the former Prospect Quarry which is now used for commercial/light industrial purposes. Prospect Reservoir and its associated buffer area are to the west of the facility. To the east is a large stormwater detention basin. Residential land uses are approximately 1 km to the east.

1.5 Purpose of this document

The purpose of this preliminary environmental assessment (PEA) is to provide an overview of the facility to P&E, other relevant government agencies and Fairfield City Council. This document provides:

- an overview of existing operations at the facility;
- a description of the proposed changes to the facility;
- the statutory approval pathway; and

• a preliminary review of the environmental impacts of the facility for assessment as part of an SSD application.

This PEA provides the basis for the provision of assessment requirements by the Director-General of P&E (known as the Director-General's requirements, or DGRs).





2 Existing operations

2.1 Approval history

Development consent (DA 21-1-2002-i) was granted for the facility in 2002 by the Minister for Planning under the EP&A Act. The original development consent was for the construction and operation of the facility, including processing of up to 600,000 tpa of construction and demolition material.

The development consent was subsequently modified in 2005 (MOD-126-8-2005-i) to increase the processing capacity of the facility to 750,000 tpa, increase hours of operation and modify processing operations to include a blending plant.

2.2 Approved operations

Approved operations at the facility include the receipt of permitted waste which is sorted, processed and blended on site to produce a range of recycled aggregate and road base products. The facility has approval to process 750,000 tpa of material, comprising no more than 600,000 tonnes of permitted waste with the balance being made up of blending material (that is, material not more than 25 mm in diameter, including quarry fines).

2.2.1 Site layout

The facility occupies an area of approximately 7 hectares (ha), and comprises the following general areas (see Figure 2.1):

- receivals area which includes a weighbridge, spot checking platform, and administration buildings;
- incoming materials stockpile area where incoming vehicles unload waste material;
- processing plant;
- processed materials stockpiles including imported quarry product; and
- water management area (including retention basins).

2.2.2 Permitted wastes

The facility has approval to process 750,000 tpa of permitted waste. Permitted waste includes:

- building and demolition waste, as defined in Schedule 1 of the NSW *Protection of the Environment Operations Act 1997* (PEOE Act);
- asphalt waste;
- virgin excavated natural material (VENM);
- plasterboard and ceramics;
- cured concrete waste (washout) or in solid form from concrete batching plant;
- processed natural quarry product;

- soil that meets thresholds for General Solid Waste in Table 1 of the waste classification guidelines;
- garden waste, as defined in the POEO Act;
- general or specific exempted waste; and
- any waste that is below licensing thresholds in Schedule 1 of the POEO Act.
- All material delivered to the facility is checked upon arrival at the receivals area to:
- ensure the materials are permitted waste materials;
- ensure quality of incoming materials;
- avoid raw material stockpile cross contamination; and
- enable Boral to track the material's progress through the facility.

All delivery trucks entering the facility register at the site office and weighbridge, registering the weight of the load and identity of the truck. Each load is inspected from the viewing platform above the weighbridge.

Once inspected, each truck proceeds to the receivals area where it is allocated to one of the stockpiles according to the type and size of the load. Each load is re-checked again for contamination (wastes not permitted at the facility) as it is unloaded.

Material that is larger than 600 mm is broken down into manageable sizes using a 40 tonne (t) excavator in the receivals area.

The size and number of stockpiles in the receivals area varies depending on market supply and demand.

2.2.3 Processing area

The processing area is where the facility processes the permitted wastes listed above into recycled road and construction materials using the processing method below:

- 1. Crushing materials are transported from the incoming material stockpiles and fed into the primary and secondary crushers at the processing plant to reduce the size of the material.
- 2. Removing impurities crushed material is magnetically separated to remove the majority of steel and other metals. The steel is stored separately and disposed of via a steel recycler. The non-magnetic material then passes through picking stations where impurities are manually sorted from the raw waste. The crushed material also runs through sets of blowers to further remove any other impurities such as plastics.
- 3. Screening material is transported via conveyor to screens to separate the material based on size.
- 4. Stabilisation plant processed finished product including engineered and non-engineered construction materials are put through the pugmill to improve permeability resistance and improve strength of construction materials. The volume of materials fed into the stabilisation plant depends on market demands.

5. Finished product stockpiles - these stockpiles are a blend of various processed products that meet required product specifications.

2.2.4 Products

The process generates three main products; aggregates, road base and recycled sand. Recycled aggregate, road base and recycled sand products typically produced at the facility include:

- Recycled DGB20;
- Unbound Base 3051.2;
- EnviroblendTM;
- Recycled DGS 40;
- Recycled DGS20;
- Recycled Subbase;
- Superfill;
- 20 mm Recycled Road Gravel;
- 20 mm Recycled Road Base;
- Recycled pipe bedding;
- 20 mm recycled aggregate; and
- 10 mm recycled aggregate.

The volume of product produced is a combination of blending imported material with processed waste material through fixed plant. The total product produced at the facility per annum over the last four years is shown in Table 2.1.

Table 2.1 Product produced per annum

Year	Produced product (t)	
2009 – 2010	644,000	
2010 -2011	727,000	
2011 – 2012	741,000	
2012 - 2013	744,000	

2.2.5 Waste management

The facility creates limited volumes of waste including:

• typical foreign material such as plastics, rags and wood that are found in raw feed are collected in bins and sent to a licensed landfill facility;

- scrap metal that is collected by a steel recycler; and
- standard office waste.

2.2.6 Staff and hours of operation

The hours of operation for processing activities are:

- Monday to Friday 6 am to midnight; and
- Saturday 6 am to 6 pm.
- The facility receives material and dispatches product:
- 24 hours Monday to Friday; and
- Saturday 6 am to 4 pm;
- No activities are undertaken on Sundays or public holidays.
- The facility employs up to 30 full-time staff.

2.2.7 Access and parking

All materials are transported to the facility via road with access from Widemere Road and Reconciliation Road. Approximately 233 truck movements (combination of inbound and outbound truck movements) are generated by the facility per day.

The internal flow of traffic at the facility is divided into trucks delivering waste material, and trucks collecting product.

Trucks arriving with waste materials arrive at the receivals area (which includes a weighbridge) for spot checking (see Figure 2.1). Once checked, trucks proceed to the receivals yard to unload. Trucks exit the site on the north side of the receivals area (refer to Figure 2.1).

Trucks entering to collect product enter via a different route to those delivering material (shown on Figure 2.1). Once loaded with product in the product stockpile area, trucks exit via the wheel wash facility onto Reconciliation Road.

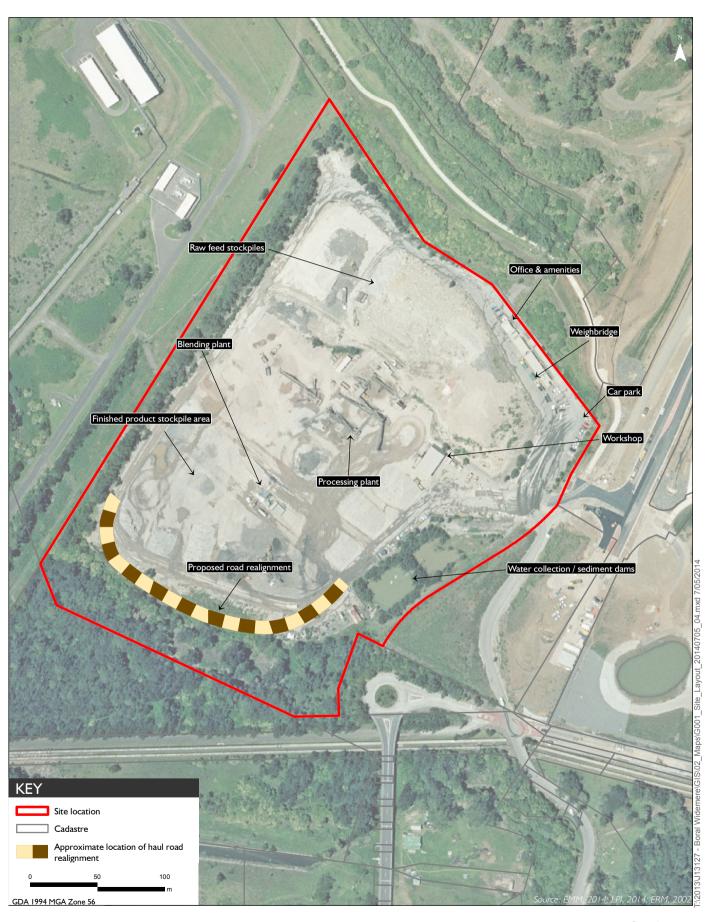
The facility provides 30 parking spots (1 disabled) for employees and visitors.

2.3 Environmental management

The facility operates under an operations environment management plan (OEMP) which sets out environmental management and monitoring requirements for the facility.

The facility has dust and air quality management measures that include two wheel washing facilities. One located at the exit gate for inbound trucks exiting the site, and the other wheel washing facility located just before entering the weighbridge for trucks carrying outbound product. The site also has fixed stockpile water cannons and water carts on site to suppress dust emissions.

The facility also has a surface water management system whereby surface runoff is directed into primary and secondary settlement ponds. Some of this water is reused for onsite dust suppression.





3 Project description

3.1 Introduction

Boral is seeking a new development consent for the facility, which includes continuation of operations approved under the current development consent (as modified) for the facility and summarised in Chapter 2, with the following modifications:

- increase in the maximum processing capacity, to 1,000,000 tpa;
- addition of new waste streams to the permitted wastes received by the facility;
- minor changes to the site layout, including realigning the southern internal road (refer to Figure 2.1); and
- change the operating hours of the facility allow maintenance activities on Sunday and public holidays.

The realignment of the southern internal road would allow the stockpiling of additional recycled materials, facilitating the additional processing rate. It will also allow for improved water management at the facility.

The modifications to approved operations are required in order to respond to changes in market demands for engineered road base products, optimise the use of the site, and consolidate waste from other Boral operations to improve broader resource recovery outcomes for the business.

3.2 Processing capacity

Approved operations include the processing of up to 750,000 tpa of material, comprising no more than 600,000 tonnes of permitted waste with the balance being made up of blending material (not more than 25 mm in diameter).

Approval is being sought to increase the volume of permitted wastes and blending material processed at the facility to a maximum of 1,000,000 tpa of material in total.

3.3 Materials received

Permitted wastes under approved operations will continue to be received by the facility. Approval is also being sought to receive the following additional waste streams:

- glass;
- timber;
- excavated natural material (ENM);
- tiles and masonry (including materials direct from the manufacturer);
- quarry products (greater than 20 mm); and
- wet concrete batching plant stirrer waste.

- The additional wastes streams will provide other recycling options for Boral's existing customer base. The addition of these waste streams will not require any modifications to the existing plant and equipment or processing method at the site.
- The addition of glass in production will enhance the properties of some engineered road base products.
- Quarry products (greater than 20 mm) will be used as an alternative blending material, which will provide greater flexibility for product blending.

Concrete batching plant stirrer waste would be sourced mainly from Boral's concrete batching plants within the Sydney region. The wet concrete stirrer waste would be stockpiled in the same location as the concrete washout received under approved operations, and allowed to dry prior to processing. The existing concrete washout stockpile area has a solid concrete base, and would provide a non permeable barrier to contain the wet concrete stirrer waste. The stirrer waste would solidify quickly, and would be crushed at the facility.

3.4 Site layout

The proposal involves minor changes to the site layout, including realignment of the southern internal haul road (as shown in Figure 2.1). The realignment would provide greater flexibility for vehicle movements and improve internal traffic management at the facility during peak delivery/transport times. It would also facilitate a minor increase in the size of the finished product stockpile area, and improve the efficiency of the site water management system by improving catchment boundaries and water movement on site.

The haul road realignment would be contained fully within the site boundary, and would not require the removal of native vegetation.

No changes to the general layout of plant and equipment are proposed, which would continue to be consistent with approved operations.

3.5 Hours of operation

Changes to the approved hours of operation, to include maintenance activities from 6 am to 6 pm on Sundays and public holidays, are being sought. There would be no change to approved hours of operation for processing or other ancillary activities. These activities would continue to be undertaken in accordance with approved operations, 24 hours Monday to Friday, and Saturday 6 am to 4 pm.

3.6 Transport and employees

The proposed increase in processing capacity at the facility will increase the number of vehicles travelling to and from the facility. Additional employment of up to three full time equivalent employees will also be generated by the proposal (in addition to the employees under approved operations).

3.7 Licences and environmental management

As described in Section 4.4.2, the facility operates under Environment Protection Licence (EPL) 11815 for recovery of general waste and waste storage. A variation to this EPL would be required if the DA was approved.

Should the DA be approved, the OEMP would be revised and updated to reflect the changes to the facility.

4 Statutory framework

4.1 Introduction

The facility requires development consent under the SSD provisions within Division 4.1 of Part 4 of the EP&A Act.

This chapter describes the approval process under both the EP&A Act and Commonwealth *Environment Protection and Biodiversity Conservation Act 1999* (EPBC Act). An overview of approvals that may be required under other legislation for the facility is also provided.

4.2 NSW Environmental Planning and Assessment Act 1979

4.2.1 Approval process

i General

The EP&A Act and the NSW *Environmental Planning and Assessment Regulation 2000* (EP&A Regulation) provide the framework for environmental planning and assessment in NSW. Part 4 of the EP&A Act relates to development assessment, including Division 4.1 which specifically relates to the assessment of development deemed to be significant to the State (or SSD).

Section 89C(2) of the EP&A Act states that a:

... State environmental planning policy may declare any development, or any class or description of development, to be State significant development.

State Environmental Policy (State and Regional Development) 2011 (he SRD SEPP), among other things, defines certain development that is SSD. Clause 8 of the SRD SEPP states:

- (1) Development is declared to be State significant development for the purposes of the Act if:
 - (a) the development on the land concerned is, by the operation of an environmental planning instrument, not permissible without development consent under Part 4 of the Act, and
 - (b) the development is specified in Schedule 1 or 2.

The facility meets both these requirements; it is not permissible without development consent and is development specified in Schedule 1 of the SRD SEPP.

ii Permissibility

The facility is located within the Greystanes Southern Employment Lands which is listed as a State significant site under *State Environmental Planning Policy (Major Development) 2005* (the Major Development SEPP).

Under the Major Development SEPP, the facility is zoned IN2 (Light Industrial). Within this zone, materials recycling or recovery centres are permissible with development consent.

Accordingly the facility is permissible with development consent under the Major Development SEPP.

iii Development specified in Schedule 1

Schedule 1 of the SRD SEPP defines a range of general SSDs, including waste and resource management facilities. Clause 20 of Schedule 1 states:

(3) Development for the purpose of resource recovery or recycling facilities that handle more than 100,000 tonnes per year of waste

The facility is a development for the purposes of resource recovery and a recycling facility that handles more than 100,000 tonnes per year of waste.

iv Consent authority

Under Section 89D of the EP&A Act, the Minister for Planning and Infrastructure is the consent authority. However, it should be noted that pursuant to Section 23 of the Act, the Minister may delegate the consent authority function to the Planning Assessment Commission, the Director-General or to any other public authority.

v Approval process

An application for SSD (known as DA) must be accompanied by an environmental impact statement (EIS), prepared in accordance with the EP&A Regulation.

Before preparing an EIS, an applicant must request DGRs for the preparation of the EIS. These requirements specify what must be addressed in an EIS. Typically they require the following:

- an assessment of issues specific to the proposed development such as potential impacts on potential noise, air quality and traffic impacts etc;
- specify technical assessment guidelines relevant to the proposed development; and
- consultation with the local council, government agencies and local community.

Before DGRs are issued, P&E will consult with relevant public authorities and Fairfield City Council to obtain input into the DGRs.

Once finalised, the EIS must be publicly exhibited for at least 30 days, including:

- publication on P&E's website;
- advertisement in a local newspaper; and
- written notice to the local council.

During exhibition any person can make a written submission about the proposal (including objecting to the development). P&E may require Boral to provide a written response to any issues raised in submissions.

4.2.2 Other State approvals not required or which must be granted

There are a number of authorisations, approvals and licences under other State legislation that apply to the proposal and these are summarised in Section 4.4. However it is important to note that if the proposal is approved there are a number of authorisations under other State legislation that are not required or cannot be refused.

Section 89J of the EP&A Act states that the following relevant authorisations are not required for SSD that is authorised by a development consent:

- the concurrence under Part 3 of the NSW *Coastal Protection Act 1979* of the Minister administering that Part of that Act;
- permits under section 201, 205 or 219 of the NSW Fisheries Management Act 1994;
- an approval under Part 4, or an excavation permit under section 139, of the NSW *Heritage Act* 1977;
- an Aboriginal heritage impact permit under section 90 of the NSW National Parks and Wildlife Act 1974;
- an authorisation referred to in section 12 of the NSW *Native Vegetation Act 2003* (or under any Act to be repealed by that Act) to clear native vegetation on State protected land;
- a bush fire safety authority under section 100B of the NSW 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 NSW *Water Management Act 2000*.
- In addition, Section 89J states that Division 8 of Part 6 of the NSW *Heritage Act 1977* does not apply to prevent or interfere with the carrying out of SSD authorised by a development consent.

Section 89K of the EP&A Act lists the authorisations that must be obtained but cannot be refused if they are necessary for carrying out SSD that is authorised by a development consent. Of relevance to the proposal, these authorisations include:

- an EPL under the POEO Act;
- a consent under section 138 of the NSW Roads Act 1993; and
- The purpose of sections 89J and 89K is to facilitate the achievement of the majority of the State authorisations required for SSD following the assessment process under the EP&A Act.

4.3 Commonwealth Environment Protection and Biodiversity Conservation Act 1999

The EPBC Act aims to protect matters deemed to be matters of national environmental significance (MNES) including:

world heritage properties;

- places listed on the National Heritage Register;
- Ramsar wetlands of international significance;
- threatened flora and fauna species and ecological communities;
- migratory species;
- Commonwealth marine areas; and
- nuclear actions (including uranium mining).

If an action (or project) will, or is likely to, have a significant impact on any MNES, it is deemed to be a controlled action and requires approval from the Commonwealth Environment Minister or the Minister's delegate. To determine whether a proposed action will or is likely to be a controlled action, an action may be referred to Department of the Environment.

The proposal will not have an impact on MNES.

4.4 Other NSW legislation and policies

4.4.1 SEPP 33 – Hazardous and Offensive Development

State Environmental Planning Policy No. 33 (SEPP 33) provides definitions for hazardous and offensive industry to based on the impacts. SEPP 33 is relevant as diesel would be stored on site. A risk screening procedure to determine whether the development is considered to be a 'potentially hazardous industry' under the SEPP 33 will be completed as part of the EIS.

4.4.2 NSW Protection of the Environment Operations Act 1997

The POEO Act aims to protect restore and enhance the quality of the environment, having regard for the need to maintain ecologically sustainable development. This is achieved through giving the community access to meaningful information about pollution and installing mechanisms to reduce risks to human health and prevent the degradation of the environment.

An EPL is required for the following activities listed under Schedule 1 of the POEO Act:

34 Resource recovery

- (1) This clause applies to recovery of general waste, meaning the receiving of waste (other than hazardous waste, restricted solid waste, liquid waste or special waste) from off site and its processing, otherwise than for the recovery of energy.
- 41 Waste processing (non-thermal treatment)
- (1) This clause applies to non-thermal treatment of general waste, meaning the receiving of waste (other than hazardous waste, restricted solid waste, liquid waste or special waste) from off site and its processing otherwise than by thermal treatment.

42 Waste storage

(1) This clause applies to waste storage, meaning the receiving from off site and storing (including storage for transfer) of waste.

If the DA is approved, Boral will apply to have its current EPL varied. As previously stated, under the provisions of the EP&A Act, an EPL cannot be refused if it is necessary for carrying out a SSD authorised by a development consent.

4.4.3 Waste Avoidance and Resource Recovery Act 2001

The objects of the NSW *Waste Avoidance and Resource Recovery Act 2001* are to encourage efficient use of resources and reduce environmental harm. This is aimed to be achieved with the principles of ecologically sustainable development and considering resource management options against the hierarchy of avoid, reuse and dispose.

The proposal is consistent with these objects through continual reduction in waste generation.

5 Stakeholder engagement

Boral recognises that engagement and consultation with stakeholders is integral to the operation of the facility. Accordingly, stakeholder engagement will form a key component of the approval process.

Key stakeholders that will be consulted during the approval process include:

- P&E;
- The Environment Protection Authority (EPA);
- Roads and Maritime Service (RMS);
- Fairfield City Council; and
- Holroyd City Council.

Stakeholder engagement will continue throughout the environmental assessment process.

6 Environmental matters

6.1 Introduction

A review of the environmental matters associated with the development application has been undertaken to identify issues and assessment approach for the EIS. The environmental matters and proposed assessment approach are described in the following sections.

6.2 Noise

6.2.1 Existing environment

The facility is located within an industrial area with noise-generating industries nearby including other waste recycling facilities. The closest residential receptors are located approximately 1 km to the east of the facility.

Noise monitoring was undertaken in 2006 to measure compliance with noise limits specified in the development consent. The results indicated the facility complied with approved limits. There have been no significant changes to site operations since this monitoring was undertaken. The alterations to approved operations proposed are unlikely to significantly increase noise emissions as no additional plant or equipment is proposed. Furthermore, peak hour traffic volumes are unlikely to change significantly and therefore there is not anticipated to be a change in peak hour noise levels due to the proposed development.

6.2.2 Assessment approach

A noise assessment will be undertaken as part of the EIS to predict noise impacts from proposed operations.

The EPA's *Industrial Noise Policy* (DEC 2000) requires proponents to characterise background noise levels for developments and assess the likely impact of the predicted or measured noise levels from the proposed development.

A quantitative noise impact assessment will be undertaken to assess noise impacts from the facility. The scope of the assessment would include:

- characterisation of background noise levels;
- development of a predictive noise model;
- assessment of the noise impacts associated with the construction and operation phases; and
- consideration of road traffic noise effects.

The assessment would be undertaken in consultation with the EPA to ensure that noise matters are adequately assessed.

6.3 Air quality and greenhouse gas emissions

6.3.1 Existing environment

Air quality impacts of approved operations were assessed as part of the modification to the facility in 2005. The assessment concluded that air quality criteria would not be exceeded at sensitive receptors, including the proposed Southern Residential land on the Greystanes Estate (now developed).

Approved operations have not changed since the assessment; however a number of dust mitigation measures have been installed, namely fixed water cannons on stockpiles and two wheel-washes at the exit points of the facility. These installations assist in managing dust emissions from the facility.

Boral is required to undertake dust deposition monitoring as part of its EPL for the facility. To date, the facility has complied with its EPL and dust monitoring requirements.

The nature of permitted wastes at the facility means that odour-generating materials, such as putrescibles wastes are not received. No odour-generating wastes are proposed to be received under proposed operations.

6.3.2 Assessment approach

An air quality assessment will be undertaken to review the potential air quality (dust) impacts associated with the facility in accordance with the EPA's *Approved Methods for the Modelling and Assessment of Air Pollutants in New South Wales* (DEC 2005) which lists the statutory methods for modelling and assessing emissions of air pollutants from stationary sources in NSW.

The scope of the assessment will include:

- characterisation of background air quality, including dust deposition and suspended particulates (total suspended particulates (TSP) and particulate matter with a diameter less than 10 and 2.5 microns (PM₁₀ and PM_{2.5});
- identification of sensitive receptors;
- assessment of the air quality impacts associated with the operation phase of the facility;
- development of a predictive air quality model;
- presentation of the results of the modelling showing location of sensitive receptors;
- comparison of the predicted dust deposition and suspended particulates levels against relevant criteria; and
- development of measures to avoid, reduce and mitigate potential impacts.
- The scope of the air quality assessment would also include an assessment of greenhouse gas emissions.

The assessment would be undertaken in consultation with the EPA to ensure that air quality matters are adequately assessed.

6.4 Traffic and transport

6.4.1 Existing environment

The facility is located between the employment lands developed in Boral's Greystanes Estate and the Wetherill Park industrial area, one of the largest industrial precincts in Sydney. The local major road network now includes Reconciliation Road which provides a north south connection between the Wetherill Park industrial area and The Prospect Highway at its intersection with the M4 Motorway.

Traffic travelling to and from the site uses Reconciliation Road (recently opened in December 2013), to join the M4 to the north or, via Widemere Road through Wetherill Park to the south.

Existing transport routes for heavy vehicles entering and exiting the facility are split with approximately 70% travelling to the north and 30% travelling south based on the 2005 modification. The increase in processing capacity will generate additional daily truck movements. Additionally, there have been significant changes to the local road network and surrounding land uses associated with the Greystanes Southern Employment Lands.

6.4.2 Assessment approach

A traffic and transport impact assessment will be undertaken to assess potential impacts associated with traffic generation from the facility. The assessment will be in accordance with RMS's *Guide to Traffic Generating Developments* (RTA 2002), and will include an assessment of:

- existing traffic levels on the transport routes and intersections used by the facility;
- predictions of traffic generated by the facility;
- potential impacts to road and intersection capacity during construction and operational phases, including the local network, with particular regard to:
 - cumulative traffic impact assessment;
 - condition assessment of the existing network;
 - proposed new road infrastructure; and

The assessment will be undertaken in consultation with key regulatory authorities (RMS, Holroyd and Fairfield Councils) to ensure that traffic matters are adequately assessed.

6.5 Surface water

6.5.1 Existing environment

The facility's surface water currently drains in a south east direction. Surface runoff from the western section of site is diverted along the haul road to join the rest of the site's surface water flow into primary and secondary settlement ponds. Some of this water is reused for onsite dust suppression. The settlement ponds overflow to Prospect Creek when the storage capacity is exceeded. The facility's discharge is regulated by its EPL.

The proposed operational changes will not require an increase in water demands, however a surface water assessment and water balance model is proposed as part of the EIS.

6.5.2 Assessment approach

A surface water assessment for the facility will be completed as part of the EIS. A critical element of the assessment will include hydrological modelling to understand the hydrological characteristics of surface water flows and quality from the facility entering Prospect Creek.

The assessment will include:

- potential impacts on the quality and quantity of existing surface water, including impacts on hydrological values of watercourses, including any potential environmental flows;
- a site water balance, including a description of site water demands, water disposal methods (inclusive of volume, quality and frequency of any water discharges), water supply infrastructure and water storage structures; and
- a description of the proposed water management.

6.5.3 Waste management

The facility accepts permitted wastes for processing and recycling as detailed in Section 2.2 in accordance with receivals protocols well established as part of approved operations.

The facility is consistent with the NSW Government's aims to reduce the volume of waste being disposed in landfills. The approved operations also assist in providing recycled products for road base and aggregates which reduce demand for, and reliance on natural extractive resources.

The increased awareness in the marketplace for the need for waste recycling and reuse has resulted an increased demand for both the type of products generated for the facility, as well as the redirection of construction and demolition wastes to operations such as the facility rather than disposing of waste to landfill.

The proposed operations including the increased processing capacity are a direct result of the increasing demand for improved recycling, reuse and reprocessing initiatives in the construction and demolition waste sector.

Materials contained within C&D waste which cannot be recycled on site, such as steel and plastic, are separated and stored prior to transfer to appropriate recycling or disposal facilities.

The additional waste streams and increased processing capacity will generate a negligible amount of additional waste materials that cannot be recycled on site. These will be managed in the same manner as approved operations.

6.6 Other matters

6.6.1 Ecology

The facility has been operating since 2002, and accordingly, is highly disturbed. While there is extant vegetation surrounding the perimeter of the facility on land owned by Boral, no changes to the disturbance footprint of the facility are proposed.

The internal road realignment will remove some degraded groundcover and grass in the south portion of the site which is currently being used for equipment lay-down and storage. Native vegetation surrounding the site will not be impacted by the continuation of approved operations or the alterations proposed under the DA.

A detailed ecology assessment is not proposed as part of the EIS.

6.6.2 Historic and Aboriginal cultural heritage

Previous archaeological surveys of the facility (ERM 1998) identified the site as highly disturbed prior to the construction of the facility, and unlikely to contain archaeological deposits. The proposed operations will not alter the disturbance footprint of the facility. Realignment of the internal haul road will involve the regrading of the existing haul road and removal of ground cover.

Two items of heritage significance are located close to the facility; the Old Sydney Water Supply Canal immediately north of the facility, and the Prospect Reservoir to the north-west of the facility. Neither of these heritage items will be impacted by the proposed operations.

As previously stated, the facility has been extensively disturbed historically and by approved operations. Therefore items of heritage value would not be impacted as a result of this proposal.

A detailed assessment of historic and Aboriginal cultural heritage is not proposed as part of the EIS.

6.6.3 Contamination

Contamination investigations were undertaken at the facility historically, prior to its approval. The original development consent required that remediation of previous contamination was required prior to construction. The required remediation was undertaken and signed off by an accredited Site Auditor.

Approved operations are undertaken in accordance with receival protocols for all materials entering the site as described in Chapter 2. This includes regular random sampling and testing of materials being processed at the facility as part of quality assurance procedures. The proposed operations will continue to be undertaken in accordance with these protocols to ensure that contaminated materials are not brought on to the site.

The EIS will provide a detailed description of the measures implemented to ensure that contaminated materials are not brought to the facility.

6.6.4 Social and economics

The proposal will have social and economic benefits to the local community and wider Sydney region associated with direct and indirect economic benefits of the proposed increase to the facility's processing capacity, and resultant increase in employment.

A detailed assessment of social and economic impacts is not proposed as part of the EIS.

6.6.5 Visual

The facility is well screened from visual receptors to the south, west and north. Reconciliation Road, immediately to the east of the site, has some views of the facility. However landscaping along Reconciliation Road predominantly obscures views.

The proposal, including internal road realignment and other minor changes to the site layout, would not significantly alter the visual characteristics of the facility. Accordingly, detailed assessment of visual impacts is not proposed as part of the EIS.

6.6.6 Hazard and risk

The facility has a 5,000 L above ground tank that stores diesel fuel for plant and equipment as part of approved operations. Accordingly, a risk screening assessment against SEPP 33 will be undertaken as part of the EIS.

7 Conclusion

Due to a change in market conditions and demand for recycled construction materials, Boral is seeking to modify approved operations to accommodate an increase in production volumes, undertake a minor internal road realignment, permit the receival of additional material types, and allow maintenance activities on Sundays, at its Widemere Recycling facility at Wetherill Park.

Based on discussions with P&E, the proposal requires a new development consent. Accordingly, a DA will be lodged for the proposal under the SSD provisions under Division 4.1 of Part 4 of the EP&A Act.

This document provides a description of the proposal for which approval is sought and provides the relevant information for P&E to provide DGRs to inform the EIS.



SYDNEY

Ground floor, Suite 1, 20 Chandos Street St Leonards, New South Wales, 2065 T 02 9493 9500 F 02 9493 9599

NEWCASTLE

Level 5, 21 Bolton Street Newcastle, New South Wales, 2300 T 02 4927 0506 F 02 4926 1312

BRISBANE

Suite 1, Level 4, 87 Wickham Terrace Spring Hill, Queensland, 4000 T 07 3839 1800 F 07 3839 1866

