# SEARs Scoping Report: Warren Road Recycling Facility

A Submission to the Department of Planning, Industry and Environment NSW on behalf of Polytrade Pty Ltd – trading as Polytrade Recycling

14th May 2021









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#### **Prepared by**

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#### **Revision History**

Ver	Date	Status	Author	Approver
0.1	13/04/2021	Draft	Maya Deacock	Esther Hughes
0.2	16/04/21	Review	Esther Hughes	- /
0.3	14/05/2021	Final	Maya Deacock	Esther Hughes

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# Glossary

Terminology	Definition		
CIV	Capital Investment Value		
DCP	Development Control Plan		
DPIE	Department of Planning, Industry and Environment (NSW)		
EIS	Environmental Impact Statement		
EP&A Act	Environmental Planning and Assessment Act 1979		
EPA	Environment Protection Authority (NSW)		
EPL	Environment Protection License		
FTE	Full Time Equivalent		
LEP	Local Environmental Plan		
LGA	Local Government Area		
MRA	MRA Consulting Group		
MRF	Materials Recycling Facility		
MSW	Municipal Solid Waste		
PoEO Act	Protection of the Environment Operations Act 1997		
RMS	Roads and Maritime Service		
SEPP	State Environmental Planning Policies		
SSD	State Significant Development		
TfNSW	Transport for New South Wales		
WARR	Waste Avoidance and Resource Recovery		



## **Executive Summary**

#### Introduction

MRA Consulting Group (MRA) have prepared this Project Scoping Report on behalf of Polytrade Recycling (Polytrade) for submission to the NSW Department of Planning, Industry and Environment (DPIE). Polytrade have recently acquired a lease for a site in Smithfield, in Sydney's west, and propose to commission the site as a Materials Recovery Facility (MRF) and process up to 150,000 tonnes of domestic kerbside and commercial recycling per year.

#### **Background**

Polytrade is an Australian privately-owned recycling company headquartered in Melbourne, Victoria. Polytrade operates 14 fully commingled MRF's and/or processing facilities across New South Wales, Victoria and Queensland. The company was founded in Australia in 1995 and now employs over 140 people across their sites. Nationally, Polytrade processes over 400,000tpa of recyclables per annum, including glass, paper and cardboard, plastics, steel, aluminium and general waste.

#### The Proposal

Polytrade have recently entered into a long-term lease at 132-144 Warren Road, Smithfield. The site is approximately 1.9ha in size and consists of a shed (8,600m²), staff and visitor parking (1,600m²), landscaped areas (1,910m²) and external hardstand for circulation (6,400m²).

The proposed MRF would process 150,000tpa of domestic kerbside recycling, operating 24 hours a day 7 days a week.

In order to achieve this, sorting plant and equipment will be sourced and installed inside the existing shed at the site, as well as bunker walls and a suitable fire suppression system. Two weighbridges will be installed to the eastern and western side of the shed. Two roller doors on the eastern side of the shed would be removed and replaced with a single, larger roller door.

The CIV of the project is approximately \$17 million and the project is expected to generate 30 temporary jobs throughout the construction and commissioning phase, and 36 ongoing full-time jobs during operation in addition to multiple indirect jobs in transport, manufacturing and administration.

#### **Statutory Context**

The scale of proposed processing of recycling (>100,000tpa) will trigger State Significant Development under the *State Environmental Planning Policy (State and Regional Development) 2011* (SRD SEPP). Accordingly, the Department of Planning, Industry, and Environment (DPIE) will be the consent authority for the development application.

The development will require a licence under the Protection of the Environment Operations Act (PoEO Act) as it will process and store more than 6,000tpa of general waste.

The site is located in land zoned IN1 – General Industrial under the Holroyd Local Environmental Plan (HLEP) 2013. Resource Recovery is permitted with consent in this zone type. Additionally, under the *State Environmental Planning Policy (Infrastructure)* 2007 (ISEPP), waste management facilities are permitted with consent in prescribed zones (IN1 – General Industrial is classified as a prescribed zone).

The project's compliance with the Holroyd Local Environmental Plan and the Holroyd Development Control Plan will be included in the Environmental Impact Statement

#### **Strategic Context**

This project supports the NSW Waste and Resource Recovery (WARR) targets for resource recovery, being an increase in the waste diverted from landfill to 75% by 2021-2022 and increasing recycling rates to 70% for Municipal Solid Waste (MSW).



The project also creates more capacity for processing of kerbside recycling in the Sydney metro region and directly contributes to the city's circular economy by providing a source of clean recycled material suitable for reprocessing.

#### **Options Analysis**

Several alternative options were considered when developing the project proposal:

#### Option 1: Process 150,000tpa of commingled recycling at the site at 132-144 Warren Road, Smithfield

This option involves developing the site at 132-144 Warren Road, Smithfield, into a MRF capable of receiving and processing 150,000tpa of domestic kerbside and commercial recycling. The site is suitable for such a use, both in terms of site infrastructure (with minimal additional work required) as well as from a planning perspective (resource recovery permitted with consent in the IN1 General Industrial zone).

The site is situated in an industrial area close to major arterial roads that will connect the site to the rest of metropolitan Sydney without causing undue disturbance to residents. Residents and other sensitive receivers are located a substantial distance from the site and there are therefore no expected impacts to residential amenity.

#### Option 2: Process 99,000tpa of commingled recycling at the site at 132-144 Warren Road, Smithfield

An alternative option was considered of processing operations at the site at a scale underneath the SSD threshold (<100,000tpa). This would reclassify the proposed development as Designated Development, and an application would be made to Cumberland Council.

This option was rejected as it would not fully utilise the site or meet the desired processing capacity and consequently recovery and diversion potential of the proposal would be limited. Should Polytrade later choose to increase processing capacity to 100,000tpa or greater, the approvals that would be required would be with associated with increased financial and time costs.

#### Option 3: Process 150,000tpa of commingled recycling at another site

This option would require an additional site search, with associated time and financial costs. Polytrade have already scoped the site for suitability and entered a long-term lease agreement. Polytrade has been engaging with commercial property agents for the last 3 years to source and secure a suitable site. Termination of the agreement would result in financial penalty associated with violating the contract. In addition, suitable sites that are conveniently located throughout the Sydney metropolitan area, are rare.

#### Preferred option

Option 1 is preferred due to the increasing need for resource recovery in the Sydney metropolitan region, and the suitability of the site for the layout of proposed plant and equipment, and geographic location in relation to feedstock generation and offtake partners.

#### **Potential Environmental Impacts**

Construction works and ongoing operation of the MRF may see impacts realised by neighbouring properties in the following aspects:

- The site falls under a medium to low flood impact risk according to Cumberland Council flood mapping. The potential impacts of flooding will be assessed as part of the EIS process.
- Nearby water systems will be protected through the management of the site. Materials will not be stored where there is potential to generate leachate. Furthermore, incoming loads are unlikely to produce leachate as they are dry and have a high absorption capacity.
- Only pre-sorted plastic and commingled domestic and commercial recycling will be accepted at the MRF. Putrescible waste, liquid waste, hazardous waste, and medical or quarantine waste will not be accepted at this facility.



- Noise will be generated during construction and operation phases. The development is surrounded on all sides by industrial land for at least 390m. Background noise levels are already elevated due to the adjacent road.
- The incidence and severity of fires at recycling facilities have been historically high. Mitigation
  measures, such as a sprinkler system and back to base monitoring will be implemented, in
  accordance with Building Code of Australia (BCA) and NSW Fire and Rescue guidelines for Fire
  Safety in Waste Facilities.
- The site is expected to receive up to 138 trucks per day for receival of recycling and offtake of product and residual. This averages to 11 per hour or one truck every 6 minutes. Access is provided via Warren Rd. The site is able to accommodate trucks entering and exiting in a forward-facing direction with minimal traffic conflicts via separate entry and exit points.
- Parking for staff and visitors will be provided onsite.
- Minor excavation may be required as part of this proposal for the installation of two weighbridges. The site is not subject to acid sulphate soils and no soil contamination issues are likely to occur.
- Minor emissions to air may occur from vehicles, generators or front-end loaders. Standard management measures and the dispersion of pollutants would be able to mitigate risk.
- The processing of dry recyclables is unlikely to emit offensive odours due to the nature of materials and absence of putrescible substances.
- There are minimal anticipated environmental impacts associated with heritage, bushfire, biodiversity, and visual amenity due to the industrial location and pre-developed nature of the site.

#### Conclusion

The project is aligned with NSW EPA's Strategic Plan and will result in up to 150,000 tonnes of material being sorted for reprocessing in Australia's growing domestic remanufacturing market. The project will contribute towards the State's shift to a Circular Economy and will provide employment opportunities by creating 30 short term jobs and 36 ongoing operational jobs.

Sydney's population is projected to reach 6.6 million by 2036, and the city's capacity to process and recover resources from commingled recycling must grow to meet this need. This proposal will utilise state of the art recycling technology to achieve maximum resource recovery and meet the expanding need for local processing. It also supports Federal and State initiatives for onshoring of remanufacturing industries, in response to China National Sword and the ensuing COAG waste export ban.

The site is well located to receive recycling from all over Sydney and minimise the cost and environmental impacts of transporting commingled recycling to the extended metropolitan region.

The facility is on appropriately zoned industrial land with minimal impacts to the surrounding neighbourhood.

The project is justified socially (by new job creation), environmentally (by ongoing and sustainable management of waste), and economically (by supporting the domestic reprocessing market). It aligns with current and future land use for the surrounding area and with the resource recovery aims and objectives of the WARR Strategy.



### 1 Introduction

This project scoping report, submitted to support a request for Secretary's Environmental Assessment Requirements (SEARs Request) has been prepared by MRA Consulting Group (MRA) on behalf of Polytrade Recycling (Polytrade).

Polytrade have entered a long-term lease agreement at 132-144 Warren Road, Smithfield in Sydney's West, and intend to change the site use to resource recovery. The site is situated within the Cumberland Council Local Government Area (LGA).

The proposed Materials Recycling Facility (MRF) will receive and sort up to 150,000 tonnes per annum (tpa) of domestic kerbside recycling (yellow lid bin) and commercial recycling and operate 24 hours a day (3 x 8-hour shifts), 7 days a week. The site would receive, sort and process recycled materials for reprocessing. The facility will provide materials to be used for manufacturing in the local economy following the Federal Government's waste export ban (Recycling and Waste Reduction Act 2020).

This report aims to provide a formal introduction to the proposed development and will:

- Outline the proposed works and operations;
- Provide a description of the site, surrounding area, and environmental context;
- Assess different options and alternatives to the proposal;
- Provide a high-level summary of the planning framework and strategic context of the proposed development;
- Outline the strategic need of the proposal;
- Identify current and future community consultation and stakeholder engagement activities undertaken for the proposal;
- Provide a preliminary environmental assessment for the proposal; and
- Provide the justification and need of the proposal.

The proposal is State Significant Development (SSD) under Schedule 1 of the *State and Regional Development State Environmental Planning Policy (SRD SEPP) 2011* as a waste and resource management facility with the purpose of resource recovery that handles more than 100,000 tpa.

The proposed development has an approximate capital investment value (CIV) of \$17 million and would employ up to 30 people during construction and generate 36 FTE positions during operation.



## 2 Background

#### 2.1 The Applicant

Polytrade (the Applicant) is an Australian privately-owned recycling company headquartered in Melbourne, Victoria. Polytrade operates 14 fully commingled MRF's and/or recycling processing facilities across New South Wales, Victoria and Queensland. Polytrade was founded in Australia in 1995 and now employs over 140 people across their sites. Nationally, Polytrade processes over 400,000tpa of recyclables per annum; including glass, paper and cardboard, plastics, steel, aluminium, and general waste.

#### 2.2 Site Description

The proposed development is to be located at 132-144 Warren Road, Smithfield, in the Cumberland Council LGA. The site is approximately 1.9ha in area and includes the following infrastructure:

- Shed (8,600m<sup>2</sup>)
- Hardstand (6,400m²)
- Staff and Visitor Parking (1,600m<sup>2</sup>)
- Landscaped Areas (1,910m²)

These features of the site are marked up in Figure 1 below:

Shed 132-144 Warren Road, Smithfield

Landscaped Areas

Sealed Hardstand

Staff and Visitor Parking

Figure 1: Satellite Image of Site

Source: Nearmaps, 2021



The site has been previously used (up until March 2021) as a steel shed/structure fabricator.

The site is identified as Lot 2 of DP 1230452 in the Holroyd Local Environmental Plan (HLEP) 2013. The site is zoned as IN1 – General Industrial. Waste management and resource recovery use is permitted with consent in the IN1 zoning.

#### 2.2.1 Description of the Environment

The site topography is largely flat, with a slight incline towards the Warren Road boundary at the north of the site. The street frontage at Warren Road is landscaped, with a mixture of planted trees, shrubs, and grass. The existing buildings are setback approximately 13-15m to the Warren Road frontage. The road reservation provides an additional setback of 4m to Warren Road.

The site is situated in an industrial area, with the neighbouring lots developed into industrial sheds and yards.

Vehicle access is provided to the site by Warren Road, which forms part of the Cumberland Highway (a State road), connecting to the Hume Highway or South-Western Motorway in the South and the Western Motorway in the North. The site is located approximately 23km West from the Sydney CBD and 4.1km South-West from Paramatta CBD. Public transport is available in the form of bus routes servicing the Smithfield area, Yennora train Station (2.6km) and Guildford Station (3.1km).

#### 2.3 Surrounding Area

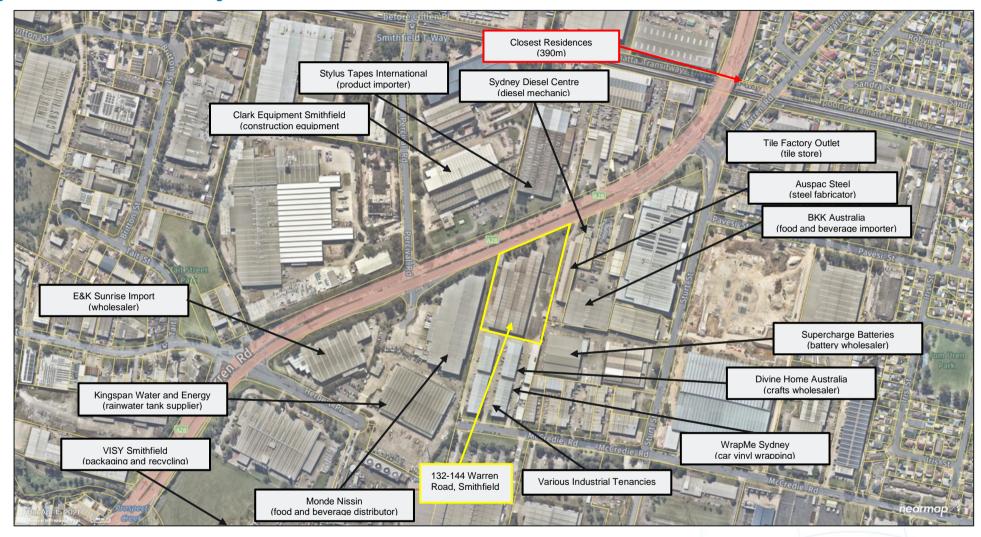
The site is surrounded by industrial and warehousing buildings as outlined in Table 1 and in Figure 2 below.

Table 1: Surrounding land uses from 132-144 Warren Road

Direction from the Site	Use		
North	<ul> <li>Stylus Tapes International: product importer (111-121 Warren Road)</li> <li>Clark Equipment Smithfield: construction equipment supplier (21 Percival Road)</li> <li>TFO Tile Factory Outlet: tile store (107 Warren Road)</li> </ul>		
South  Divine Home Australia: crafts wholesaler (9/191McCredie Road)  Visy Smithfield: packaging (6 Herbert Place)  WrapMe Sydney: car wrapping (39/191 McCredie Road)  Various small warehouse tenancies (191-193 McCredie Road)			
East	<ul> <li>Auspac Steel: steel fabricator (128 Warren Road)</li> <li>BKK Australia: food importer (4/120 Warren Road)</li> <li>Sydney Diesel Centre; diesel mechanic (126 Cumberland Highway)</li> <li>Supercharge Batteries: battery wholesaler (31-39 Sturt Street)</li> </ul>		
West	Monde Nissin Smithfield: processed food manufacturer (146 Warren Road)		



Figure 2: Site in context with surrounding land uses



Source: Nearmap 2021



The site and surrounding land are contained within the Smithfield Industrial Zone. The Smithfield Industrial Zone contains large manufacturing and service industries and covers more than 33 hectares with lot sizes between 1000m² and 5 hectares. The Smithfield Industrial Zone is zoned IN1 General Industrial. Land directly to the east of the IN1 land is zoned IN2 Light Industrial. Other land zones in proximity to the site include SP2 – Infrastructure (State Road), RE1 – Public Recreation, and R2 – Low Density Residential.

Figure 3: Zone Map of Site and Surrounds

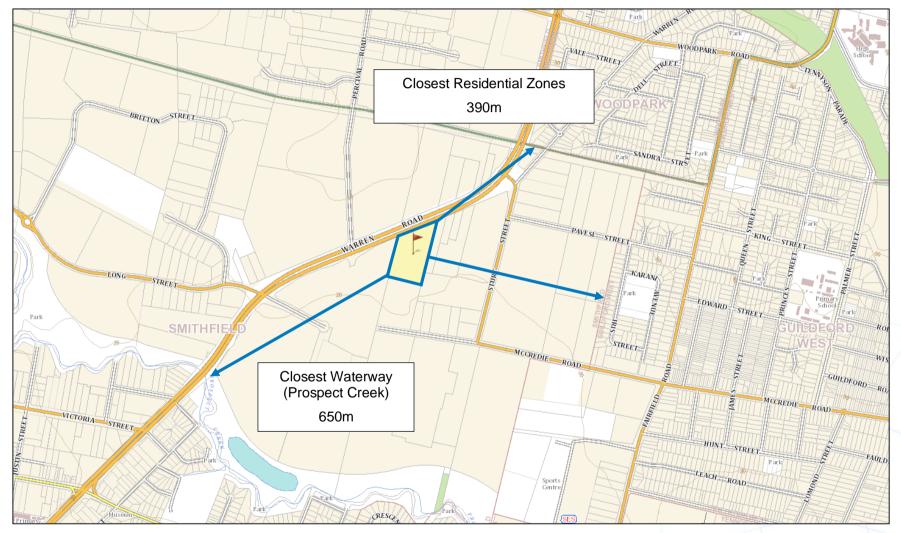


Source: ePlanning Spatial Viewer, 2021.

The nearest residences are located approximately 390m North of the site within the suburb of Woodpark as shown in Figure 4. The nearest waterway is located is prospect Creek and is located 680m South.



Figure 4: Site locality and surrounds



Source: SIX Maps, 2021



#### 2.4 Existing Approvals

#### 2.4.1 Environment Protection Licence

The site does not hold any Environment Protection Licence (EPL) as the previous use was not a scheduled activity under Schedule 1 of the Protection of the Environment Operations Act 1997 (POEO Act).

#### 2.4.2 Development Consent

- Stage 2

The oldest available development application (DA) dates to July 2<sup>nd</sup>, 1984, and granted consent "for the erection of an office addition in accordance with plans received by council on 21st June, 1984".

More recently, a DA for two stages of development was approved by Holroyd Council on October 4th, 2016 (2015/454/1). The DA was granted *Deferred Commencement* pursuant to section 80(3) of the Environmental Planning and Assessment Act 1979. The proposed development was for the "demolition of existing factory and offices, re-alignment of lot boundaries, site works, construction of 56 industrial units and a warehouse in 2 stages".

- Stage 1 Demolition of existing structures within Lot 17,
DP 58900, re-alignment of lot boundaries, site works,
construction of 56 industrial units in 6 sub stages and
strata subdivision into 56 lots and common property

Demolition of existing structures within Lot 18,

DP 58900 and construction of a warehouse with

associated office

A further three amendments for this DA approval were sought and approved by Cumberland Council. The three amendments requested for the site are outlined as follows for reference.

- Modification to development consent according to section 96(1A) of The Environment, Planning and Assessment Act, consent no. 2015/454/2 was granted on October 17, 2017. The modified consent included the modification of internal and external alterations to the approved industrial complex. The modification consent included the amendment to condition 44 under Schedule 'B', notably a reduction in the number of industrial units constructed from 56 to 46. The other modification relates to condition 186 under schedule 'B', which stipulated at least 137 car parking spaces numbered and market in accordance with the endorsed plan be made available at all times.
- Pursuant to Section 96(1A) of the Environmental Planning & assessment Act (1979) modification to development consent was granted on March 15, 2018 under application number 2015/454/3. The approved modification was for a reduction in culvert works, as permitted under the Holroyd Council LEP 2013. The approval complied with the SEPP 55, SEPP Infrastructure 2009 and Holroyd LEP 2013 (note that most of Holroyd Council merged into Cumberland Council in May 2016).
- Pursuant to Section 4.55(1A) modification to development consent was granted on February 19, 2019 under application number 2015/454/4. The approved modification was for "changes to the staging requirements for construction and strata subdivision". The modifications approved were a reduction of subdivided lots from 56 to 40 and the reduction construction sub stages from 6 to two (1A and 1B). Other development conditions remained unchanged.



## 3 Proposal Description

#### 3.1 Proposal Objectives

The objectives of the proposal are to:

- Change use of the site to a MRF capable of processing 150,000tpa of commingled recyclables;
- Amend site infrastructure needed to support the proposal including internal roads, two weighbridges, parking and hardstand, stormwater infrastructure, fencing and landscaping.

#### 3.2 Construction, Demolition, and Commissioning of Site

Some minor works to the shed and site are proposed.

#### 3.2.1 Construction Works

Internal steel walls will be constructed within the shed to form the receival area for all incoming recycling. Additionally, concrete bunker walls will be installed to house product stockpiles (bales and glass bunkers). The shed will be fit out with a fire suppression system and associated infrastructure, in alignment with the NSW Fire and Rescue guideline *Fire Safety in Waste Facilities*.

#### 3.2.2 Installation of Equipment

The following sorting equipment will be installed in the shed:

- · Infeed hopper;
- · Conveyors;
- Trommels:
- · Ballistic separators;
- Air separators;
- Dust collectors;
- Overband magnets;
- Eddy current magnets;
- Glass crusher;
- Paper cleaning screen;
- Sorting tables;
- Balers:
- Optical sorters;
- Robot sorting technology;
- Dust collection machinery; and
- Other material quality control systems.

The configuration of equipment is provided in Appendix A.

#### 3.3 Resource Recovery

The site will receive commingled recycling from a combination of nearby councils and local businesses.

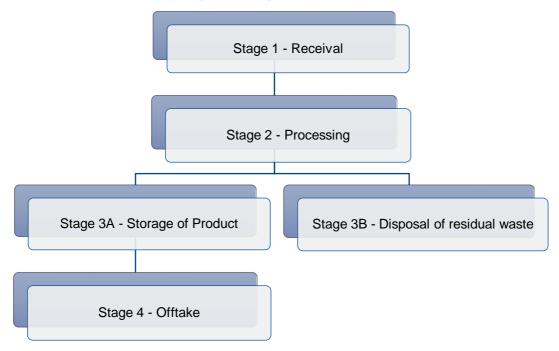
Waste received and processed onsite will largely be sorted into the following categories:



- Paper and cardboard;
- Glass:
- Plastic;
- Ferrous metal;
- Non-ferrous metal; and
- Residual.

The flow of materials from receival to offtake are outlined in Figure 5 below.

Figure 5: Proposed process flow for recycling processing operations



#### 3.3.1 Receival

Council waste collection vehicles (25-35m³ capacity) will bring domestic kerbside commingled recycling to the site for sorting. Receival of material will be over 5 days a week (weekdays only), over a period of 12 hours a day. Commercial recycling will be delivered by rigid vehicles/tippers etc. Commercial recycling will be received 7 days a week, over 12 hours a day.

An area of approximately 3,000m² within the shed will be allocated to receival of commingled recycling. The receival area has been designed with additional contingency capacity to account for any unexpected downtime in processing. No recycling or residual material, sorted or unsorted, will be stored outside the shed at any time.

Manual pre-sorting of materials will remove oversized or bulky material prior to processing through sorting equipment.

#### 3.3.2 Processing

Material will be loaded into an infeed hopper using a front-end loader. A range of equipment and plant will separate the materials, sorting by weight, size, and material type.

Ultimately, the materials will be sorted into the following categories:



- Ferrous metals;
- Non-ferrous metals
- Glass:
- Plastics;
- Paper and cardboard; and
- Residual.

#### 3.3.3 Storage of Product

Storage will occur entirely within the confines of the shed.

Paper and cardboard, plastics, and smaller fractions of ferrous and non-ferrous metals will be baled and stacked in bunkers at the northern end of the shed.

Glass will be stored in a concrete bunker in the southwest area of the shed.

Oversize metals will be stored in a 30m<sup>3</sup> bin.

A small proportion of incoming recycling will be residual, or recycling that is too damaged or soiled for reprocessing. Residual materials will be baled and stored in a concrete bunker prior to offtake to a suitably licenced facility for disposal. Bulky residual will be separated at the receival floor and stored in a 30m³ hook lift bin prior to collection. The hook lift bin will remain indoors at all times until collection and will be covered prior to transportation offsite.

All product and residual storage areas will be sized and managed according to the NSW Fire and Rescue guidelines for waste (*Fire Safety in Waste Facilities*, February 2020). This includes maximum bunker wall heights, buffer areas, minimum spacing distances, and face angles for bunkered materials.

#### 3.3.4 Disposal of Residual Waste

Waste will be consolidated and transferred to a suitably licensed facility for disposal via the weighbridge.

#### 3.3.5 Offtake

Product offtake will be conducted over a 24-hour time period, 7 days per week.

Offtake loading will occur both at the loading ramp and glass loading area at the western side of the shed, and at the loading area on the eastern side of the shed (refer to Figure 6), and vehicles will be weighed using a weighbridge before and after loading.

Trucks used for offtake are expected to be walking floor or tautliner semi-trailers, export container semitrailers, or truck and dog.

#### 3.4 Waste generation

Approximately 10%, or 15,000 tonnes, of total annual material inputs are expected to be non-recyclable. These items are separated out through the facility's sorting process and will be temporarily stored within the shed. These residual waste materials will be removed from the site to be disposed of in a suitably licensed facility as necessary.

The remaining 90% of materials are recyclable and will be separated into material stream and transported to respective reprocessing facilities.



#### 3.5 Vehicular access, traffic generation and parking

#### 3.5.1 Vehicular Access

The site is accessible by both vehicles and pedestrians from Warren Road. The site features two vehicle access points which allows a linear truck route through the site with dedicated entry and exit points.

#### 3.5.1.1 Incoming Material Receival

The incoming kerbside domestic commingled recycling will be delivered to the site in Council or Contractor recycling collection vehicles. These vehicles will enter the site over a 12-hour period between 4am and 4pm, 5 days per week (Monday to Friday). The incoming commercial recycling will typically be delivered in rigid vehicles or tippers. These vehicles will enter the site between 4am and 4pm, 7 days per week.

All vehicles will enter the site, weigh on the first weighbridge and then unload the materials at the receival area shown in red on Figure 6 below.

#### 3.5.1.2 Offtake

Offtake of recovered recycling and residual will occur over a 24-hour period, 7 days a week. Collections will be scheduled outside of peak receival times to avoid traffic conflicts at the site. All vehicles transporting materials to and from the site will be covered at all times, with exception to loading and unloading.

#### Residual

Following processing, residual waste will be baled and stored at the southwestern corner of the shed. Bales will be transferred to a walking floor trailer for offtake. This material will be delivered to a suitably licensed facility for disposal.

The oversized or bulky fraction of residual waste will be manually separated at the incoming material receival zone and will be stored in a 30m³ hook lift bin. This bin will be collected from the receival zone by a hook-lift truck on a regular basis.

#### **Glass**

Glass will be stored in bunkers at the southwestern corner of the site, within the confines of the shed. Truck and dogs will be used to transport this material offsite and will be loaded using a front-end loader in the 'glass loading area' highlighted on Figure 6 below.

#### **Paper and Cardboard and Plastics**

Paper and cardboard will be baled and stored in the stockpile area to the northern section of the shed. These bales will be transported offsite by tautliner semitrailers. Plastics will be stored as bales in the north eastern stockpile area of the shed. Plastics will be loaded onto tautliner semitrailers at the loading area on the eastern side of the shed.

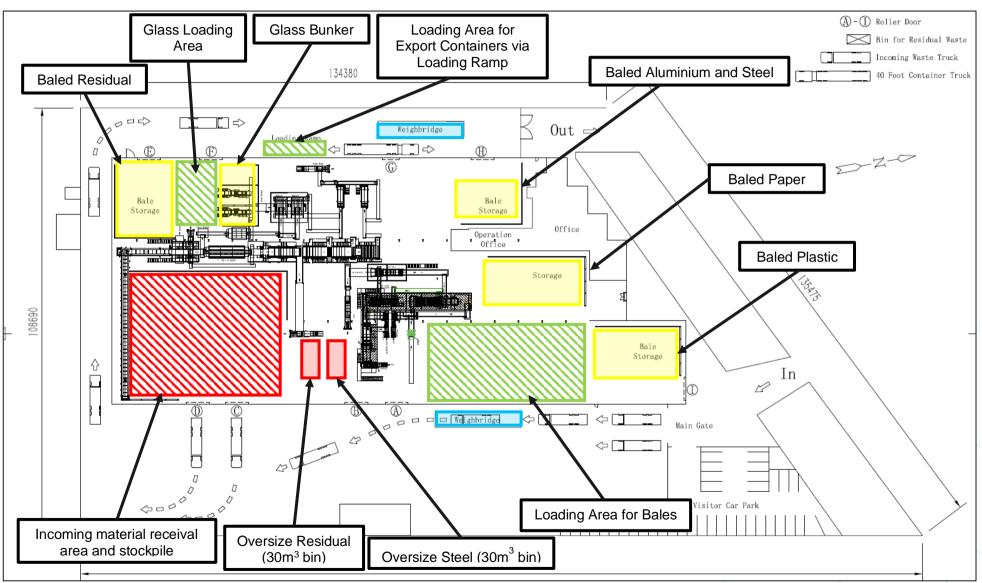
#### **Ferrous and Non-Ferrous Metals**

Bulky steel will be separated and stored in a 30m<sup>3</sup> hook lift bin, which will be collected on an as-needs basis by a hook-lift truck.

Steel and aluminium, once processed, will be baled and stored in the north western stockpile area of the shed as identified in Figure 6 below. They will be loaded via the loading ramp into export containers on semitrailers at the western boundary of the shed.



Figure 6: Receival and Loading Areas at the site





#### 3.5.2 Traffic Generation

Trucks that are expected to utilise the site include Council waste collection vehicles, walking floor semi-trailers and other smaller rigid/tipper trucks for receival and truck and dog, B Doubles, tautliner semitrailers and export container semitrailers for offtake.

Receival of waste will occur over a 12-hour period, between 4am and 4pm. Approximately 100 - 115 Council and commercial recycling collection vehicles will enter the site, being approximately 8 - 10 trucks per hour. Council trucks will drop off recycling material 5 days a week, Monday to Friday. Commercial recycling will be received at the site 7 days a week. Council and commercial trucks will enter the site at the eastern driveway, weigh in on the first weighbridge, manoeuvre into position at the receival bay, offload recycling, circumnavigate the shed to the western exit, weigh out on the second weighbridge, and depart the site at the western driveway.

Offtake will occur over a 24-hour period. Approximately 22 trucks will enter the site, being an average of less than one per hour. Offtake trucks will enter the site at the eastern driveway, weigh in on the first weighbridge, manoeuvre to the appropriate loading area (either the loading ramp on the western side of the shed or the bale loading area on the eastern side of the shed), load up with offtake material, weigh out on the second weighbridge, and depart the site through the western driveway.

In total, at peak, up to 138 trucks will enter the site per day, which equates to an average of 11 per hour or one truck every 6 minutes. A swept path diagram for both Council trucks and semitrailers is available in Appendix B.

#### 3.5.3 Parking

There is ample parking for passenger vehicles at the site, with a large hardstand lot available at the north-eastern corner of the site. Approximately 50 car spaces are available. Under this proposal, approximately 40 parking spaces will remain available to staff and visitors. Each shift requires 8-12 staff. Taking into account an overlap of staff on site during changeover, a maximum of 24 spaces are required to accommodate staff parking needs. Additional spaces would be provided for visitors and mobility parking.

#### 3.6 Construction and operating hours

#### Construction:

Construction will occur within the daily timeframes in Council and Roads and Maritime Services (RMS) (now Transport for NSW, or TfNSW) *Construction Noise and Vibration Guidelines* (2016) which are outlined in Table 2 below:

**Table 2: Construction hours** 

Construction Hours	Monday to Friday	Saturday	Sunday / Public Holidays
Standard construction hours	7am to 6pm	8am to 1pm	No work
Construction activities with impulsive or tonal noise emissions	8am to 5pm	9am to 1pm	No work

#### Operation:

The proposed development will operate 24 hours a day, 7 days a week. Receival of incoming material will occur daily, with Council collections 5 days a week and commercial collections 7 days a week, over a period of 12 hours each day. Processing of materials and offtake will occur 24 hours a day, 7 days a week.



#### 3.7 Estimated value of works

Capital Investment Value (CIV) for proposed works is approximately \$17m.

#### 3.8 Employment

#### Construction:

• 30 construction/equipment commissioning personnel.

#### Operation:

• 36 FTE facility operational personnel.



## 4 Statutory and Strategic Context

#### 4.1 Strategic Context

The following strategic context is relevant to the proposal:

#### NSW Waste Avoidance and Resource Recovery Strategy 2014-2021

The NSW Waste Avoidance and Resource Recovery (WARR) Strategy 2014–21 is a key component of the Government's vision for the environmental, social, and economic future of NSW and is supported financially by the Waste Less, Recycle More initiative. The NSW government is also in the process of developing a 20-year strategy which will focus on sustainability, reliability and affordability of waste and recycling in NSW.

Polytrade are proposing to develop a MRF for the purposes of recovering recycled materials from domestic kerbside recycling bins. This development is consistent with the WARR Strategy as it will provide necessary infrastructure to divert recyclable material from landfill, thereby assisting in the progression toward the target of increasing recycling to 70%.

#### **NSW Container Deposit Scheme (CDS)**

The New South Wales Container Deposit Scheme (CDS) came into effect on 1 December 2017 and is being operated by Cleanaway and TOMRA in a joint venture partnership as Network Operator, as well as a separate Scheme Coordinator. Also known as "Return and Earn", the NSW CDS is the largest litter reduction scheme introduced by the State.

The proposed development will contribute towards the success of the CDS program by recovering eligible containers and directing them into the local reprocessing market for recycled goods.

#### Council of Australian Governments (COAG) Export Ban of Waste

The Council of Australian Governments (COAG) announced in August of 2019 that the export of unprocessed waste material from Australia would be banned. The ban targets plastic, paper, glass and tyres – commencing with glass from January 2021, mixed plastics from July 2021, tyres from December 2021, single resin/polymer plastics that have not been reprocessed from July 2022, and mixed and unsorted paper products from 1 July 2024.

All Australian governments (Federal, State, Territory and Local) recognise and support that households and the waste industry must transition to the ban. Australia's waste and recycling industry requires support to respond to changes in policy and legislation, and to build Australia's capacity to generate high value recycled commodities and associated demand.

The proposed facility aims to address the need for additional recycling capacity for domestic kerbside recycling and would produce a valuable output which could be reused in local and regional markets.

#### 4.2 Statutory Context

The following legislation is relevant to the proposal:

#### **Environmental Planning and Assessment (EP&A) Act 1979**

The Environmental Planning and Assessment Act 1979 (EP&A Act) and the Environmental Planning and Assessment Regulation 2000 (EP&A Regulation) provide the framework for the assessment of the environmental impact of proposed development in NSW.

Part 3 of the EP&A Act provides for the formation of environmental planning instruments (EPIs), which can take the form of Local Environmental Plans (LEPs) or SEPPs. EPIs contain provisions that control the permissibility of development and identify when development approval is required. EPIs that are applicable to the Proposal are:

- State Environmental Planning Policy (Infrastructure) 2007;
- Holroyd Local Environmental Plan 2013.



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

This proposal is classified as State Significant Development under Schedule 1, Section 23 of the State Environmental Planning Policy (State and Regional Development) 2011 as it is:

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

State Significant applications are submitted to the Department of Planning Infrastructure and the Environment and the Minister for Planning is the consent authority.

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

Pursuant to Clause 121 development for the purpose of a waste or resource management facility (including resource recovery facility) may be carried out by any person with consent on land in a prescribed zone.

The proposal is consistent with the definition of a waste or resource management facility, or more specifically, a resource recovery facility. The site is located within a prescribed zone (IN1 General Industrial). Consequently, the development is permissible with consent pursuant to the provision of the Infrastructure SEPP.

#### **Holroyd Local Environmental Plan 2013**

The site is zoned IN1 General Industrial under the Holroyd LEP 2013. The proposed development is consistent with the definition of a "waste or resource management facility". The development is permissible with consent in accordance with the IN1 zone and is consistent with the objectives of the IN1 zoning.

#### **Holroyd Development Control Plan 2013**

The application will consider the provisions of the Holroyd Development Control Plan 2013.

#### **Protection of the Environment Operations Act 1997**

Proposed activities at the development are listed under Schedule 1 of the POEO Act as 'resource recovery' activities and therefore requires a licence to operate at a scale of over 6,000tpa.



## 5 Options Analysis

#### 5.1 Objectives of Proposal

The objectives of this proposal are to:

- Receive and process up to 150,000tpa of domestic kerbside recycling from the Sydney metropolitan region;
- Provide single streams of recycled materials to the reprocessing and manufacturing market, supporting the COAG's decision to ban the export of waste from Australia;
- Divert waste from landfill in accordance with the WARR Strategy and the principles of the waste hierarchy;
- Minimise adverse impacts to the environment and the local community; and
- Create jobs for the stimulus of the local economy.

# 5.2 Option 1: Process 150,000tpa of commingled recycling at the site at 132-144 Warren Road, Smithfield

This option involves developing the site at 132-144 Warren Road, Smithfield, into a MRF capable of receiving and processing 150,000tpa of domestic kerbside recycling. The site is suitable for such a use, both in infrastructure (with minimal additional work required) as well as from a planning perspective (resource recovery permitted with consent in the IN1 General Industrial zone).

The site is situated in an industrial area close to major arterial roads that will connect the site to the rest of metropolitan Sydney without causing undue disturbance to residents. Residents and other sensitive receivers are located a suitable distance from the site and there are no expected impacts to amenity.

The proposal falls under SSD and will require consent from DPIE, with an environmental assessment undertaken for the project in the form of an Environmental Impact Statement.

This option provides a significant source of recovered recycled material into the domestic reprocessing market, as well as creating more capacity to process recycling in the Sydney metropolitan region. It also contributes towards the NSW WARR Strategy target of increasing recycling rates to 70% for Municipal Solid Waste (MSW).

# 5.3 Option 2: Process 99,000tpa of commingled recycling at the site at 132-144 Warren Road, Smithfield

An alternative option was considered of processing operations at the site at a scale underneath the SSD threshold (<100,000tpa). This would reclassify the proposed development as Designated Development, and an application would be made to Cumberland Council.

This option was rejected as it would not fully utilise the site or meet the desired processing capacity and consequently recovery and diversion potential of the proposal would be limited. Should Polytrade later choose to increase processing capacity to 100,000tpa or greater, the approvals that would be required would be with associated with increased financial and time costs.

#### 5.4 Option 3: Process 150,000tpa of commingled recycling at another site

This option would require an additional site search, with associated time and financial costs. Polytrade have already scoped the site for suitability and entered a long-term lease agreement. Termination of the agreement would result in financial penalty associated with violating the contract.



#### 5.5 Preferred option

Option 1 is preferred due to the need for increasing need for resource recovery in the Sydney metropolitan region, and the suitability of the site with regard to the layout of proposed plant and equipment and geographic location in relation to feedstock generation, accessibility and offtake partners.



## 6 Potential Environmental Impacts

#### 6.1 Soils and Contamination

Since the proposed development is situated on a pre-developed site, no major excavation works are anticipated during the developmental works of the project. It is anticipated that any minor dust erosion and sedimentation would be managed in accordance with standard construction management practices. No impacts on groundwater are foreseen during these minor earthworks.

The site is not affected by Acid Sulfate Soils (ASS).

#### 6.2 Heritage

The site is not listed as being a heritage site or containing heritage items under the Holroyd Local Environmental Plan 2013. An additional search of the NSW Heritage Database did not return any items at the address.

No items or areas of Aboriginal Significance are known to occur within, or adjacent to, the subject land. A search of the Aboriginal Heritage Information Management System (AHIMS) database confirms that there are no significant aboriginal sites or locations within a 1km buffer of the subject site.

Given the past industrial land uses and a lack of recorded heritage items, it is unlikely that the proposed development would have any impact on Aboriginal heritage.

#### 6.3 Bushfire

The site is not located in bushfire prone land. There is no expected hazard with regard to bushfire related to this project.

#### 6.4 Waste Management

The size of the shed is sufficient for the proposed throughput, taking into account the floorspace required for vehicle movements, stockpiles and machinery. The floorspace analysis included a contingency period of 2.5 days and the space requirements for fire safety.

#### 6.4.1 Receival

The site will be limited to receive domestic kerbside recycling (from Council areas around metropolitan Sydney), some commercial commingled recycling and pre-sorted plastic from other recycling facilities.

No general waste or otherwise putrescible materials will be accepted at the site. Non-conforming loads will be rejected and directed to a suitably licenced facility for disposal.

#### 6.4.2 Stockpiling

All materials will be stored within the confines of the shed. At no point will any material be stored outside the shed.

For commingled recycling received at the site, a watertight steel floor with two adjoining walls will form the pre-sorting stockpile area.

Bales of recycled material will be stored in concrete bunkers with three walls 4m tall (bales stacked 3m high maximum). Bales of residual will similarly be stored in concrete bunkers with three walls 4m tall (bales stacked 3m high maximum).

Glass will be stored loose in concrete bunkers with three walls 4m tall (loose stockpile 3m high maximum).

Oversize metal and oversize residual waste will be stored in separate 30m³ hook lift bins.



#### 6.4.3 Site management

The site will be managed in accordance with an Operational Environmental Management Plan, which is a compilation of plans and policies that ensure the safe and efficient operation of the site. The OEMP will feature:

- Environmental Management System, including:
  - Organisation chart;
  - Statutory requirements;
  - o Reporting requirements;
  - o Complaints and community consultation; and
  - o Training schedule.
- Risk Assessments;
- Monitoring and Review protocols;
- Acoustic Management Plan;
- Traffic Management Plan; and
- Pollution Incident Response Management Plan.

The site will be maintained to be clean and tidy at the conclusion of each shift.

Waste materials will be managed to avoid environmental impacts, including materials handling and stockpiling. The MRF will not accept hazardous waste, liquid waste, medical waste, or quarantine waste.

#### 6.5 Water Management

The site is covered with hardstand and no significant ground excavation is anticipated as the development proposes to use the existing shed. Some excavation or ground-breaking works may be required for the installation of the weighbridges and truck loading ramp.

The EIS will include design of surface water controls to prevent uncontrolled release of water from the site. These controls will be described in the EIS.

Site stormwater drains will be fitted with stainless steel grates (5mm) to capture and retain litter, thereby preventing off-site water quality impacts.

New bunding is proposed around the waste receival area and stockpile bunkers, to capture any leachate generated, in the event that the fire suppression system is activated.

No waste materials will be stored outside the shed at any time.

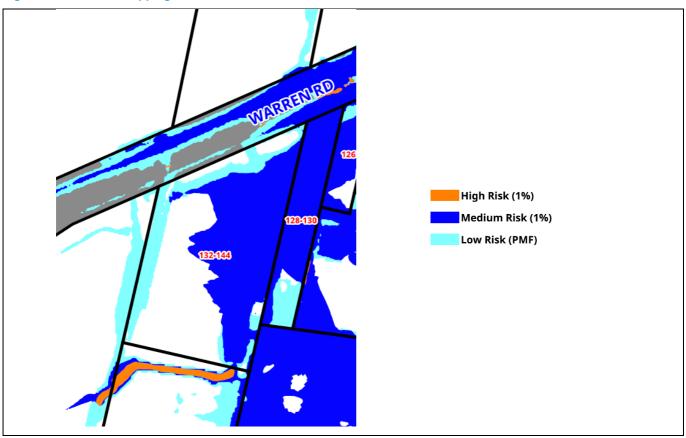
During the construction phases, standard measures to contain runoff and sediment will be implemented.

#### 6.6 Flooding

Flood mapping conducted by Cumberland Council (published March 2021) show that the site is at medium to low risk for flood events (Figure 7).



Figure 7: Flood Risk Mapping



Source: Cumberland City Council, Map 4 – Flood Risk Precincts, March 2021

#### 6.7 Biodiversity

The development would be unlikely to have an impact on species or their habitat given the existing industrial nature of the site.

The site is brownfield in nature and exists in a well-established industrial zone. It has been heavily developed for previous uses such as steel fabrication and metal works.

Preliminary investigations via a search of the NSW Values Map identified no threatened or endangered flora and fauna populations are located on the site. No existing trees or remnant vegetation would be removed as part of the proposal.

Considering that the site is previously developed, and that no vegetation will be removed, the existing biodiversity values of the site would not be affected by the proposal.

#### 6.8 Hazards

Plastic, paper and cardboard are combustible materials and may be subject to fire hazards.

Fire risk will be controlled through the installation of a suitable fire suppression system and passive measures in accordance with the BCA and with reference to the NSW Fire and Rescue guidelines.

Small volumes of hazardous materials will be stored on site. These may include:

- Diesel fuel;
- LPG 15kg gas bottles;
- Hydraulic oil;
- Engine/transmission oil;



- Oxygen gas;
- Acetylene gas; and
- · Argon gas.

#### 6.9 Traffic

Access to the site is via Warren Road. Warren Road is a State Road, and is part of the Cumberland Highway, connecting the Hume Highway to the Pacific Highway. Warren Road is six-lane dual carriageway, with access to the site only from the southbound lanes.

Figure 8: Site location in context with Sydney road network



Source: SIX Maps, 2021

The facility is expected to accommodate 138 trucks per day entering the site for receival and offtake of commingled recycling waste. This equates to 11 trucks per hour (22 movements) or one truck every 6 minutes.

In addition, up to 12 staff vehicles would access the site per shift (36 movements).

No parking would be provided for trucks at the site. There are 40 staff parking spaces provisioned, which is more than adequate for the 36 staff members who would be working at the premises over three shifts.

Traffic impacts will be capable of being managed given the nature of the site and surrounding industrial zone – internal traffic movements would be managed with improved site circulation by a linear path for entrance and exit from the site.

Additional traffic generated by the facility is unlikely to overburden the local roads.

#### 6.10 Visual Amenity

The site is located within the Smithfield Industrial Zone and is surrounded by industrial and warehouse buildings and is IN1 zoned which is General Industrial with Warren Road and the Cumberland Highway to the north. The



site is additionally screened from public view at Warren Road through the landscaped plantings of shrubs and trees at the street frontage. No vegetation is proposed to be removed under this development.

Since the project site is located within a broader industrial precinct with the existing shed already present at the site, there will be minimal visual impacts due to the developmental works of this project.

#### **6.11 Noise**

Operational noise is anticipated from truck movements, loading/unloading commingled recyclable waste and the operation of processing equipment/s within the MRF.

- The site is surrounded by a major road, industrial development and warehousing buildings.
- The nearest residential receptors are located approximately 390m North of the site within the suburb of Woodpark.

It is considered unlikely that noise will affect the amenity of the closest sensitive receptors or industrial premises.

#### 6.12 Air quality

Operational - dust and odour

- The development could result in minor dust generation resulting from unloading and processing activities of commingled recycling waste. However, the materials received are generally non-friable and are not expected to cause air quality impacts.
- The site is covered with hardstand, and therefore vehicles are unlikely to generate excessive dust from the surfaces they traverse.
- The nearest residential receptors are located approximately 390m north of the site within the suburb of Woodpark. There is minimal potential to receive any airborne emissions from the facility.
- Odour is not expected to be an issue, as the site will not accept putrescible or malodorous wastes.

Operational air quality related impacts are anticipated to be minor and able to be managed through:

- The installation of dust collectors within the MRF to capture dust from the processing equipment.
- All loads will be covered during transportation.
- All processing and storage will be undertaken indoors.

Construction - dust and odour

- Minor construction works are proposed to amend the site infrastructure including development of internal roads, weighbridges, parking and hardstand, stormwater infrastructure, fencing and landscaping.
- Construction dust related impacts are anticipated to be minor and able to be managed through standard dust controls such as watering, covering soil, and reducing truck speeds.



## 7 Stakeholder Engagement

# 7.1 Pre-Application Consultation with the Department of Planning, Industry and Environment (DPIE)

On Friday the 30th of April 2020, Polytrade and MRA met with Sheelagh Laguna, Shaun Williams, and Katelyn Symington of DPIE for a pre-application meeting. The purpose of this meeting was to inform DPIE of the proposal, confirm the planning pathway for the proposal, and understand any initial concerns or comments from the Department.

The main questions raised by DPIE at this early stage were the access and movement of trucks around the site, the receival and offtake of materials from the site, types of equipment to be installed, confirmation that all materials would be stored and managed inside, details of the neighbouring uses, and the proposed fire detection and suppression systems for the site.

This Scoping Report has been updated to clarify the majority of these items. Further consultation is anticipated through the SEARs and via direct contact with relevant authorities and the local neighbourhood. Any further concerns will be addressed through the design and consultation process and in the environmental assessment.



## 8 Justification and Conclusion

The project is aligned with NSW EPA's Strategic Plan and will result in up to 150,000 tonnes of material being sorted for reprocessing in Australia's growing domestic remanufacturing market. The project will contribute towards the State's shift to a Circular Economy and will provide employment opportunities by creating 30 short term jobs and 36 ongoing operational jobs.

Sydney's population is projected to reach 6.6 million by 2036, and the city's capacity to process and recover resources from commingled recycling must grow to meet this need. This proposal will utilise state of the art recycling technology to achieve maximum resource recovery and meet the expanding need for local processing. It also supports Federal and State initiatives for onshoring of remanufacturing industries, in response to China National Sword and the ensuing COAG waste export ban.

The site is well located to receive recycling from all over Sydney and minimise the cost and environmental impacts of transporting commingled recycling to the extended metropolitan region.

The facility is on appropriately zoned industrial land with minimal impacts to the surrounding neighbourhood.

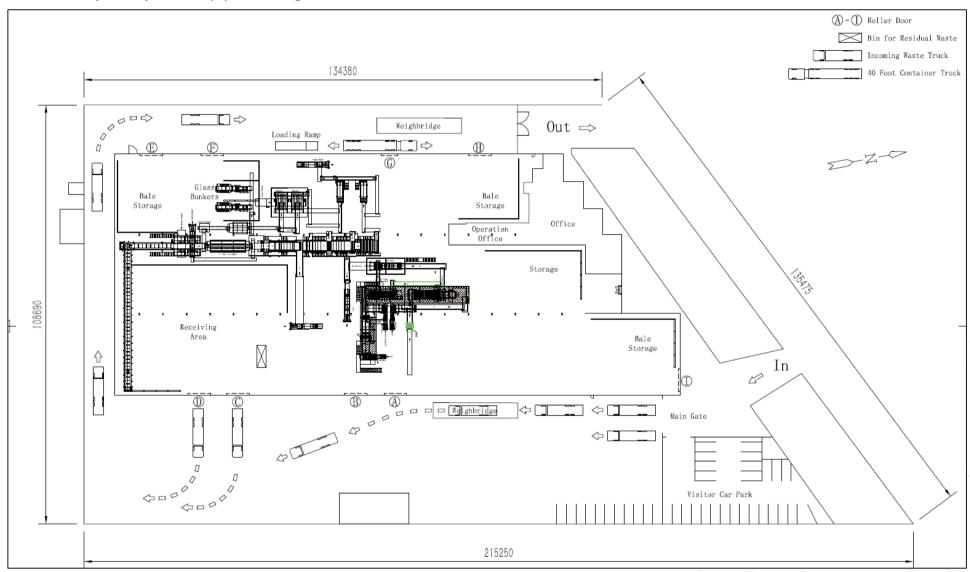
The project is justified socially (by new job creation), environmentally (by ongoing and sustainable management of waste), and economically (by supporting the domestic reprocessing market). It aligns with current and future land use for the surrounding area and with the resource recovery aims and objectives of the WARR Strategy.



# Appendix A Site Plans



Figure 9: Preliminary Site Layout and Equipment Configuration





# Appendix B Swept Path Diagrams



Figure 10: Council Waste Vehicle - Swept Path Diagram

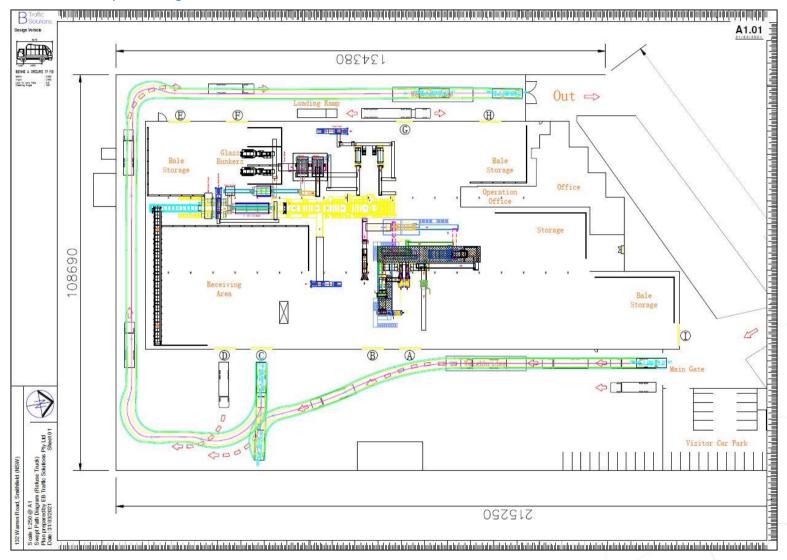
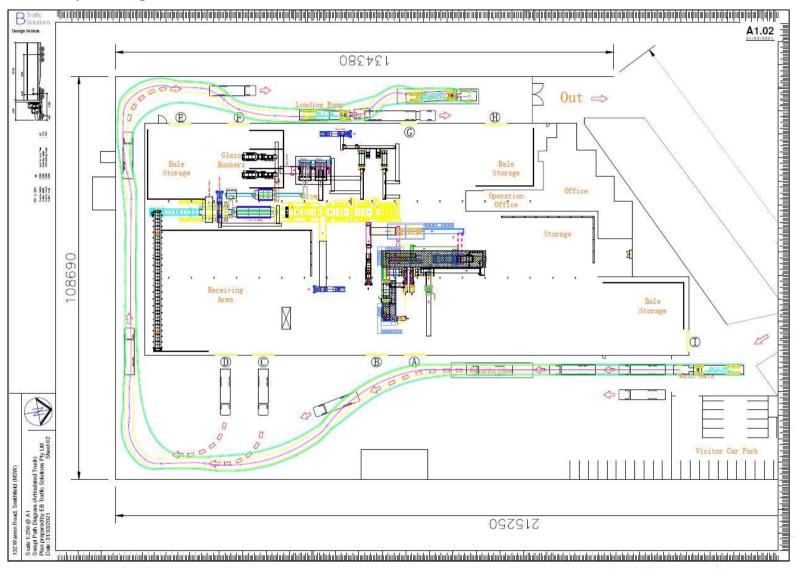




Figure 11: Offtake Vehicle - Swept Path Diagram



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