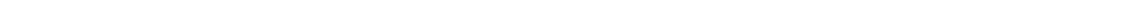




Kemps Creek Advanced Resource Recovery Technology Facility | Part 3A

ANNUAL ENVIRONMENTAL MANAGEMENT REPORT 2021-2022

Prepared for Cleanaway Pty Ltd | 13 October 2022





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PR219

Prepared by		Reviewed by
Name	Alistair Campbell	Darren Green
Company	Element Environment	Element Environment
Position	Consultant	Associate
Project Role	Author	Technical Reviewer

Signature		
Date	13 October 2022	13 October 2022

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CHAPTER 1

INTRODUCTION

1 INTRODUCTION

1.1 Background

The Kemps Creek Advanced Resource Recovery Technology (ARRT) facility (the facility) is in the north-west corner of the Elizabeth Drive Landfill (EDL) at 1725 Elizabeth Drive, Kemps Creek in the Penrith local government area (LGA). The site is approximately 40 kilometres (km) west of Sydney central business district.

The site covers approximately 8 hectares (ha) of land in EDL (refer Figure 2-1). There are several sensitive receivers near the east and south of the site and one receiver approximately 1 km west of the site.

An environmental assessment (EA) was prepared in June 2007 to consider the environmental effects of the facility and support the development application.

The facility received Project Approval MP06_0185 (Project Approval) on 15 April 2008 under the now repealed Part 3A of the NSW *Environment Planning and Assessment Act 1979* (EP&A Act), and has been operational since 25 March 2009. Since determination of the original development consent, three modifications have been submitted:

- Modification 1 (MOD 1) – change to operating hours;
- Modification 2 (MOD 2) – increase annual processing capacity; and
- Modification 3 (MOD 3) – upgrades to the maturation pads and process.

MOD 1 was determined on 20 September 2010, MOD 2 was withdrawn, and MOD 3 was determined on 24 January 2014.

Prior to 18 December 2021 (the integration date) the facility was owned and operated by Suez Recycling & Recovery Pty Ltd, after which ownership of the facility was transferred to Cleanaway Pty Ltd.

1.2 Purpose and reporting period

The purpose of this report is to address the requirements specified in Condition 5 of Schedule 4 of the Project Approval (refer Table 1-1). The period of reporting for this annual environmental management report (AEMR) is 15 April 2021 to 14 April 2022.

Table 1-1 Compliance with Condition 5 of Schedule 4 of the Project Approval

Requirement	Reference
Every year from the date of this approval, unless the Director-General agrees otherwise, the Proponent shall submit an AEMR to the Director-General and relevant agencies. The AEMR shall:	
(a) identify the standards and performance measures that apply to the development;	Section 2
(b) include a summary of the complaints received during the past year, and compare this to the complaints received in previous years;	Section 3
(c) include a summary of the monitoring results for the development during the past year;	Section 3
(d) include an analysis of these monitoring results against the relevant: <ul style="list-style-type: none">▪ impact assessment criteria;▪ monitoring results from previous years; and▪ predictions in the EA.	Section 3
(e) identify any trends in the monitoring results over the life of the development;	Section 3
(f) identify any non-compliance during the previous year; and	Section 4

Requirement	Reference
(g) describe what actions were, or are, being taken to ensure compliance.	Section 4

1.3 Objective

The objective of this report is to succinctly document the environmental performance and compliance of the facility for the period since the integration date to 14 April 2022 and describe any corrective actions.

CHAPTER 2

PROJECT OVERVIEW

2 PROJECT OVERVIEW

2.1 The approved development

The facility has a processing capacity up to 120,000 tonnes per annum (tpa) of General Solid waste and 14,400 tpa of biosolids to produce compost, remove recyclables such metal from the waste stream for recycling, and remove residual inert wastes for suitable disposal (refer Table 3-3).

Waste operations are approved for 20 years from the commencement of operations on site. Major components of the approved development are detailed in Table 2-1.

Table 2-1 Major components of the approved development

Aspect	Description
Waste Receipt	Up to 120,000 tpa of General solid waste and 14,400 tpa of biosolids. Waste is transported in domestic waste collection vehicles along Elizabeth Drive and the existing landfill access road.
Receival Hall	The receival hall is ~9.2 metres (m) high, has a floor area of 2,400 m ² and is fully enclosed under negative pressure. Waste delivered to the receival hall is initially sorted and large waste items recovered. Mixed waste and source separated organics are transported separately by conveyor to the resource recovery building.
Resource Recovery Building	The resource recovery building is ~10.5 metres high, has a floor area of 2,130 m ² and is enclosed under negative pressure. Mixed waste and source separated organics are processed separately using: <ul style="list-style-type: none"> trommels; manual sorting; magnetic and eddy current separators to remove metals; and shredders and mixers to prepare for composting. The refined waste streams are transported separately by conveyor to the composting tunnels.
Composting Tunnels	Thirty, 24 m long ventilated and fully enclosed tunnels are used for biological treatment of the separate waste streams. Moisture, temperature and oxygen levels are controlled to maximise rot, prior to transfer to the maturation area via front end loader.
Maturation Area	The external maturation area is intended to cure the compost for a few months prior to transfer to the refining building via front end loader. <i><u>Note: there has been no external maturation activities since the NSW Environment Protection Authority (EPA) banned the restricted use of mixed organic material (MWOO) in October 2018. Furthermore, the EPL licence conditions do not authorise the storage of mixed solid waste to be stored outside.</u></i>
Refining Building	The refining building is enclosed, ~10.5 m high, with a floor area of 1,020 m ² . It is used for the final refining of the compost, prior to removal via front end loader to the maturation pad for export. <i><u>Note: there has been no refining activities since 2021.</u></i>
Outputs	The facility has the following outputs: <ul style="list-style-type: none"> 25,000-40,000 tpa of compost; 5,000-8,000 tpa of recyclables including wood, paper, plastics and metal; and 35,000-50,000 tpa of residual non-putrescible waste for disposal at SITA's landfill or another suitably licensed facility landfill.
Water Management	Stormwater drainage and pond, leachate ponds, an overflow pond, mains water connection and a self-contained sewerage plant. Leachate is sent to a licenced liquid waste treatment facility.
Associated Infrastructure	Office and amenities buildings, electricity connection, sealed internal access road and weighbridge.
Odour Management	Semi-enclosed biofilters.

Aspect	Description
Hours of Operation	<p>Waste Receipt, outdoor operations and product dispatch:</p> <ul style="list-style-type: none"> Monday-Friday, 6 am-6 pm. Saturday, 8 am-5 pm; and Sunday, 8 am-4 pm. <p>Outdoor operations:</p> <ul style="list-style-type: none"> Monday-Friday, 6 pm-10 pm; and Public holidays, 7 am-4 pm. <p>Indoor operations: Monday-Saturday, 7 am-11 pm.</p> <p>Emergency: Anytime.</p>
Traffic	Approximately 236 vehicle movements a day.

2.2 Current activities

The site has been receiving up to 120,000 tpa of General solid waste and removing recyclables such as steel and aluminium from the waste stream for recycling and remove residual inert wastes for suitable disposal.

Compost has been produced in the composting tunnels, however, due to the EPA's ban on the use of MWOO, this compost has been transported to EDL for disposal. There has been no storage of compost on the external maturation pads since 2018 and the refining area of the building has not been used since 2021

2.3 Approvals, licences and permits

Approvals, licences and permits held or applicable to the reporting period are described in Table 2-2.

Table 2-2 Approvals, licences and permits

Type	Reference	Description
Approval	MP06_0185	Project Approval under section 75J of the EP&A Act.
Approval	MP06_0185-Mod-1	MOD 1 under section 75W of the EP&A Act.
Approval	MP06_0185-Mod-3	MOD 3 under section 75W of the EP&A Act.
Licence	Environment Protection License (EPL) 12889	Environment Protection Licence granted under section 55 of the NSW <i>Protection of the Environment Operations Act 1997</i> (POEO Act).

2.4 Environmental performance criteria

Environmental performance criteria in Table 2-3 have been sourced from the facility's approvals, licences and permits listed in Table 2-2.

Table 2-3 Environmental performance criteria

Aspect	Source	Criteria	Requirement
Waste management	EPL 12889	Limit on waste types	<p>The site may only receive the following waste types:</p> <ul style="list-style-type: none"> general solid waste (putrescible); general solid waste (non-putrescible); and biosolids categorised as unrestricted use, or as restricted use 1, 2 or 3, in accordance with the criteria set out in the biosolids guidelines.
	MP06_0185; EPL 12889	Limit on input	<p>The site must not receive more than:</p> <ul style="list-style-type: none"> 120,000 t of general solid waste; and

Aspect	Source	Criteria	Requirement																																			
			<ul style="list-style-type: none">14,400 t of biosolids.																																			
	EPL 12889	Limit on waste storage	The authorised amount of waste permitted on site at any one time cannot exceed 32,100 t.																																			
Odour	MP06_0185	Limit on odour	The site must not cause or permit the emission of any offensive odour from the site.																																			
Dust	MP06_0185	Limit on dust	The site must minimise and prevent the emission of dust.																																			
Noise	MP06_0185; EPL 12889	Limit on noise	Noise generated by the site must not exceed the limits in the tables below: <table><tr><th>Location</th><th>Day L_{Aeq} (15 min)</th><th>Evening L_{Aeq} (15 min)</th><th>Night L_{Aeq} (15 min)</th><th>Night L_{Amax}</th></tr><tr><td>McGarvie Smith Farm</td><td>42</td><td>39</td><td>35</td><td>n/a</td></tr><tr><td>1745 Elizabeth Drive</td><td>41</td><td>40</td><td>37</td><td>47</td></tr><tr><td>1669A Elizabeth Drive</td><td>38</td><td>38</td><td>35</td><td>n/a</td></tr><tr><td>Caretakers Residence 1669A Elizabeth Drive</td><td>41</td><td>42</td><td>38</td><td>53</td></tr></table> <table><tr><th>Location</th><th>6am to 7am, Monday to Friday L_{Aeq} (15 minute)</th></tr><tr><td>McGarvie Smith Farm</td><td>39</td></tr><tr><td>1745 Elizabeth Drive</td><td>40</td></tr><tr><td>1669A Elizabeth Drive</td><td>38</td></tr><tr><td>Caretakers Residence 1669A Elizabeth Drive</td><td>42</td></tr></table>	Location	Day L _{Aeq} (15 min)	Evening L _{Aeq} (15 min)	Night L _{Aeq} (15 min)	Night L _{Amax}	McGarvie Smith Farm	42	39	35	n/a	1745 Elizabeth Drive	41	40	37	47	1669A Elizabeth Drive	38	38	35	n/a	Caretakers Residence 1669A Elizabeth Drive	41	42	38	53	Location	6am to 7am, Monday to Friday L _{Aeq} (15 minute)	McGarvie Smith Farm	39	1745 Elizabeth Drive	40	1669A Elizabeth Drive	38	Caretakers Residence 1669A Elizabeth Drive	42
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Water quality	MP06_0185; EPL 12889	Pollution of water	The site must not cause or permit any waters to be polluted. <p>“waters” mean the whole or any part of—</p> <p>(a) any river, stream, lake, lagoon, swamp, wetlands, unconfined surface water, natural or artificial watercourse, dam or tidal waters (including the sea), or</p> <p>(b) any water stored in artificial works, any water in water mains, water pipes or water channels, or any underground or artesian water.</p>																																			
	EPL 12889	Discharge water quality limit	Surface water may discharge from the site only from one location, EPL monitoring point 1. Water discharged from Point 1 must always comply with the concentration limits in the table below: <table><tr><th>Pollutant</th><th>UoM</th><th>Limit</th></tr><tr><td>Ammonia</td><td>Mg/L</td><td>0.9</td></tr></table>	Pollutant	UoM	Limit	Ammonia	Mg/L	0.9																													
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Ammonia	Mg/L	0.9																																				

Aspect	Source	Criteria	Requirement
			pH
			pH
			6.5-8.5
			Total suspended solids (TSS)
			Mg/L
			50

2.5 Environmental monitoring requirements

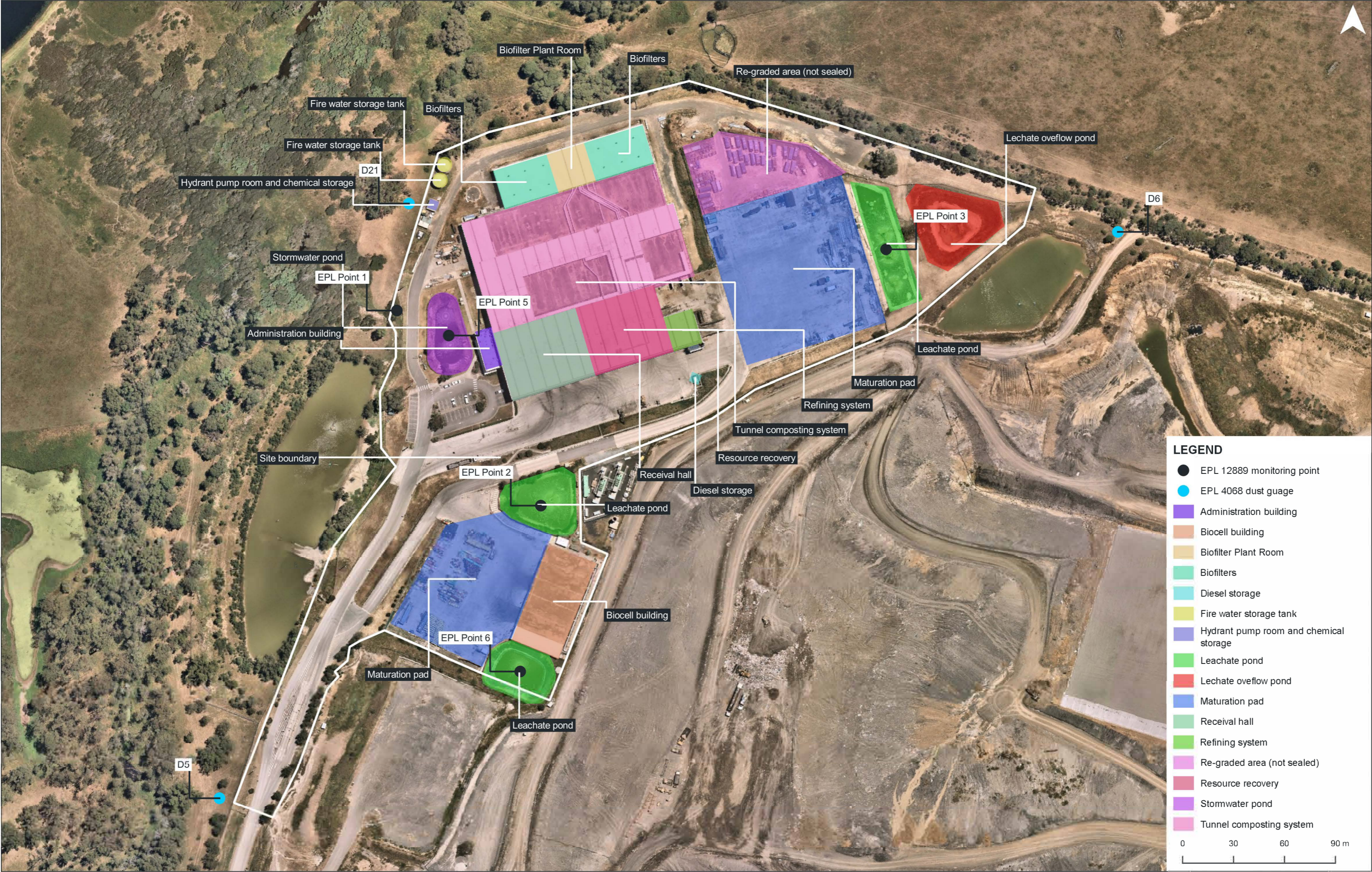
Environmental monitoring requirements in Table 2-4 have been sourced from the facility's approvals, licences and permits listed in Table 2-2.

Table 2-4 Environmental monitoring requirements

Aspect	Source	Criteria	Requirement
Waste	MP06_0185	Waste inputs	The site must monitor the following incoming requirements of waste: <ul style="list-style-type: none"> quantity; type; and source of waste.
		Waste outputs	The site must monitor the following outgoing requirements of waste: <ul style="list-style-type: none"> quantity; type; destination and quality of the outputs.
Noise	MP06_0185	Operational noise monitoring	Monitor operational noise in accordance with the approved environmental management plan (EMP), which stipulates a frequency of every five years. Operational noise monitoring was last conducted on December 2021.
Water quality	EPL 12889	Discharge water quality	EPL monitoring point 1 must be sampled during discharge at least four times per year for ammonia, biochemical oxygen demand (BOD), conductivity, oil and grease, pH, total organic carbon and TSS. Analysis results from EPL monitoring point 1 should take into consideration this location's concentration limits stipulated in EPL 12889.
		Leachate water quality	Leachate dams (EPL monitoring points 2,3 and 6) must be sampled once per year and analysed for ammonia, BOD, chemical oxygen demand (COD), pH and TSS.

Figure 2-1
Site location plan

KEMPS CREEK ADVANCED RESOURCE RECOVERY TECHNOLOGY FACILITY
ANNUAL ENVIRONMENTAL MANAGEMENT REPORT



CHAPTER 3

ENVIRONMENTAL PERFORMANCE

3 ENVIRONMENTAL PERFORMANCE

The Kemps Creek ARRT Monthly site inspections document the regular checks to ensure environmental controls are functioning and demonstrates the sites compliance with its environmental performance and management criteria.

3.1 Waste management

Prior to delivery of waste, it is a requirement that the consignor of the waste has assessed the waste in accordance with the NSW *Waste Classification Guidelines*.

All waste deliveries are via a weighbridge, where an operator records the details and weight of the vehicle. Deliveries are received via the receival hall, where loads are visibly inspected prior to input into the recovery process.

Waste that does not meet the categories listed in the EPL is not accepted on site. There is currently no stockpiling of waste on site.

3.1.1 Waste monitoring

A tracking system called 'Mandalay' is used to track all incoming and outgoing wastes. Mandalay keeps record of the following information:

- source of waste;
- incoming/outgoing;
- date and time;
- customer number and name;
- delivery vehicle details;
- waste type; and
- quantity of waste.

Biosolids were not received in the previous reporting period and the facility received ~76,000 t of general solid waste. A review of information from Mandalay for this reporting period shows the facility has not accepted any unapproved waste types and is below the annual tonnage limit for general solid waste and biosolids (refer Table 3-1 and Figure 3-1).

Table 3-1 Incoming quantity over time

Waste type	Limit (t)	29/07/2018 - 28/07/2019	29/07/2019 - 28/07/2020	29/07/2020 – 14/04/2021	21/12/2021 – 13/04/2022
General solid waste	120,000	100,041	83,113	76,487	62,516
Biosolids	14,400	11,069	0	0	0

As the facility is regulated by an EPL, all information pertaining to incoming and outgoing waste quantities is reported in an annual return submitted to the EPA after the EPL anniversary date (29 July).

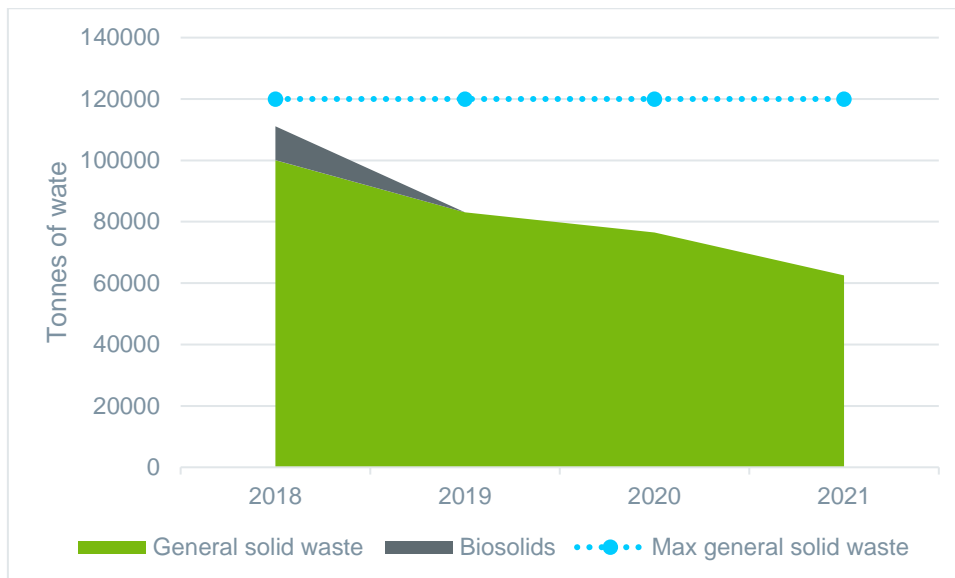


Figure 3-1 Change to incoming waste for the facility

3.2 Odour

Odour is managed in accordance with the odour management plan (OMP). The OMP is not a requirement of any approvals, licences or permits, but has been developed to ensure compliance with the odour performance criteria.

Potential odour sources, ranked in order of inherent risk, are:

1. Maturation pads – notably, these maturation pads have not been used to store compost material since the EPA banned the restricted use of MWOO in October 2018.
2. Bio-filters.
3. Waste receipt and storage in the facility.
4. Leachate and stormwater dam.
5. Refining.
6. Drying tunnels.

A process of continuous improvement in odour emission management is implemented at the facility. Outputs from this continuous improvement process has resulted in the following additional odour emission controls:

- Remote control doors – to minimise opening times and prevent site vehicles and equipment from falsely triggering sensors, all rapid roller doors have been upgraded with remote controls.
- Leachate dam levels – to maintain low water levels in the leachate dams, excess leachate is disposed offsite to an external licensed treatment facility. This ensures the leachate dams have sufficient capacity for typical rain events and reduces the risk of the leachate dams becoming an odour source.

3.2.1 Odour impact assessment criteria

The *Approved Methods and Guidance: for the Modelling and Assessment of Air Pollutants in New South Wales* (Guideline for Air Pollutants) (Department of Environment and Climate Change, 2005) were referenced in the EA when setting the impact assessment criteria. Based on the recommended odour performance criterion in the Guideline for Air Pollutants, the EA determined an odour unit (OU) of 2 or less was applicable to the facility.

The EA concluded that odour levels were predicted to be under 1 OU at existing residences closest to the facility. Odour levels up to 2 OU would be experienced on small sections of two residential lots along the southern boundary of the Twin Creeks development. Odour levels across all other sections of Twin Creeks would be less than 2 OU. These modelled odour impacts were considered acceptable, and it was determined the facility was unlikely to result in offensive odours.

3.2.2 Odour monitoring

There is no requirement in EPL 12889 or the Project Approval to quantitatively monitor odour emissions, however the facility must not cause or permit the emission of any offensive odour.

Key odour monitoring is:

- Daily and weekly check of controls on potential odour sources.
- Weekly odour tours of surrounding areas to verify if odour emissions are leaving the site (*Weekly Odour Checklist*).

A selection of completed records (daily odour checklists and weekly checklists) from the reporting period were reviewed to verify compliance with the environmental performance criteria. Odour monitoring reports are available from 5 Jan 2022 – 14 April 2022. Odour monitoring information for this period is provided in Table 3-2.

The source of the facilities detected odours in the area has been ascertained based on the site's operating conditions, wind direction and other odour sources in the area. Notably, most of the sampled records indicate no odours have been emitted from this site. This information correlates with the current operating conditions, with no composted material stored on the external maturation pads and is supported by no odour complaints in the reporting period.

Table 3-2 Odour events during the reporting period

Date	Reported by	Additional Comments and Observations	Attributable to the facility
11/01/2022	Khushboo Singh - Cleanaway	Waste being tracked from the landfill on the access road which was addressed promptly Odour noted on Mamre Road near the Chicken farm. Odour consistent with the poultry waste. Slight odour noted on about 200 metres distance near the facility on Elizabeth drive. The Production Manager informed that he had noted it the evening before, and he believes it to be from ANL.	No
20/01/2022	Khushboo Singh - Cleanaway	Strong odour noted near the creek at about 200 metres distance near the facility. The same odour was not present when checked at Facility. The odour is unlikely from the facility but could be from ANL where organics are processed. A very strong gas odour was coming from the landfill near the weighbridge. Supervisor notified.	No
25/01/2022	Mike Banasaz	Organics odour (strong)	No
31/01/2022	Joshua Tonga	The bridge before site had organic smell (After animal shelter)	No
02/02/2022	Joshua Tonga	Manure smell	No
15/02/2022	Joshua Tonga	Grass clippings	No
21/02/2022	Mike Banasaz	Green organics smell	No
01/04/2022	Khushboo Singh - Cleanaway	The odour at Elizabeth Drive did not continue at the facility. Strong gas odour detected near the weighbridge. Landfill Manager notified about it and advised to conduct a flare test.	No

3.2.3 Odour complaints

There were no recorded odour complaints within the reported timeframe. Between 2013 and 2018 there was a downward trend to odour complaints, with an average of 29 complaints per

year for the 5 period; there have however been no reported complaints since 2019 (refer Figure 3-2).

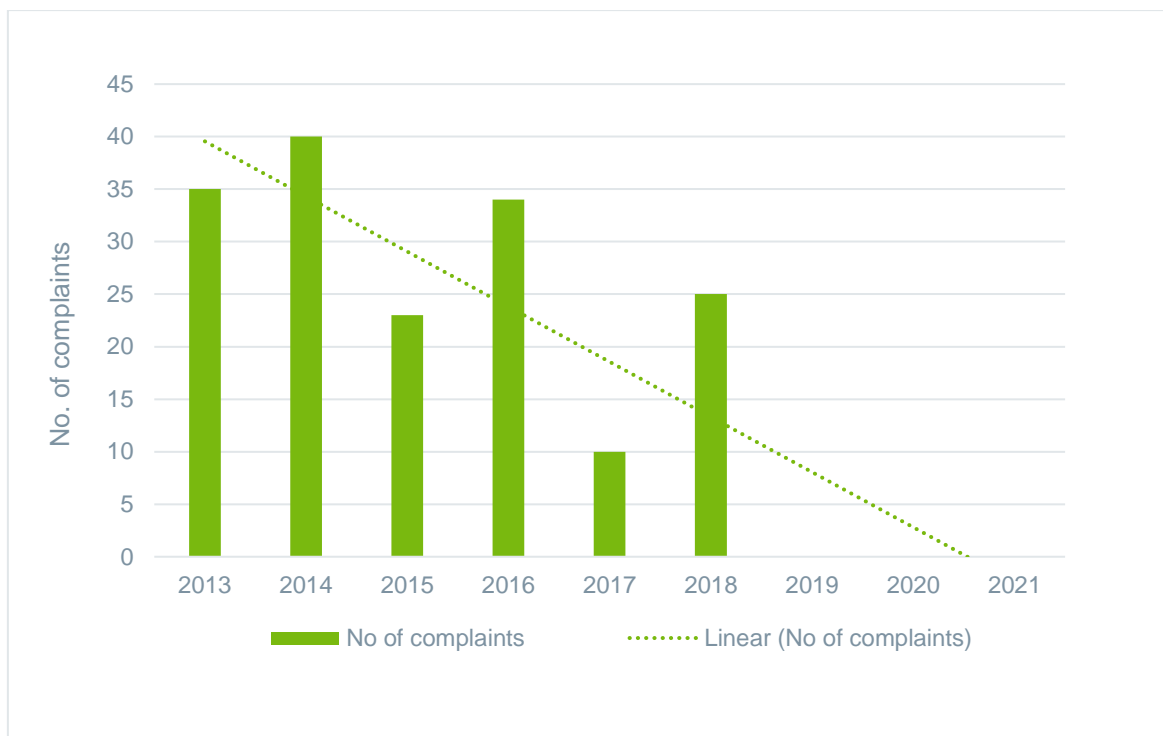


Figure 3-2 Odour complaints over time

Based on the monitoring records there have been no offensive odours recorded during the reporting period and there have been no offensive odours notified by the EPA.

3.3 Water quality

The site manages its water quality by separating clean stormwater runoff from contaminated leachate.

The leachate management system collects leachate from the composting systems and maturation pads and directs this to the leachate ponds (four in total). Each leachate ponds is inspected weekly to ensure there is sufficient capacity to hold any additional runoff from rain.

Leachate can be transferred between ponds as required to maintain the appropriate freeboard. Overflow from the leachate ponds is directed to a leachate overflow pond, which is maintained empty wherever possible. Leachate in the overflow pond cannot be discharged from site and is collected and disposed offsite as liquid waste at a suitably licensed facility.

The stormwater management system collects clean water from roof runoff, clean hardstand areas, access roads and grass areas and directs this water to the stormwater pond. Water from the stormwater pond is re-used for dust suppression and other site operations.

Overflow from the stormwater pond is directed into EDL's north-western sedimentation dam, which discharges into Badgerys Creek. The point where overflow from the stormwater pond meets EDL's north-western sedimentation dam is EPL monitoring point 1, the facility's only licensed discharge point.

The stormwater from the stormwater pond (monitoring point 5) on the facility is transferred to EDL's north-western sedimentation dam to prevent it from discharging into the creek. The point

where the overflow from the stormwater pond discharges offsite is EPL monitoring point 1, the facility's only licensed discharge point. The discharged stormwater from this point eventually flows into Badgery's Creek.

These areas are inspected daily, weekly and monthly to ensure:

- leachate ponds have sufficient freeboard;
- the leachate overflow pond is empty;
- aerators and other odour source controls are operational; and
- hardstand areas, access roads and grassed areas are free of litter, debris or other fluids or materials that could contaminate stormwater runoff.

3.3.1 Water quality impact assessment

The EA did not establish any formal water quality impact assessment criteria and predicted:

- no impact on the naturally occurring saline groundwater at the southwest of the site.
- the facility would generate leachate which is likely to contain concentrations of pollutants that make the liquid unsuitable for discharge to waterways.

3.3.2 Water quality monitoring

It is a requirement of EPL 12889 that water quality is monitored during operations to ensure the site is compliant with its environmental performance and monitoring requirements. There has only been one discharge via EPL monitoring point 1 during the reporting period. In this instance the sampled water quality exceeded the concentration limits approved in EPL 12889 (refer Table 3-3).

Table 3-3 Water quality analysis results for the reporting period

Sample ID	Record	Ammonia (mg/L)	pH	TSS (mg/L)
	Concentration limit	0.9	6.5-8.5	50
EPA ID No.1 - Stormwater	Sampled 02/03/2022	0.12	8.24	275

The background to this discharge is:

- On 2 March 2022, a leachate discharge event at the Overflow Leachate Dam occurred and had ceased by the morning of 10 March 2022.
- Analysis results recorded on the 2 March 2022 from discharge point 1 show that water at these points exceeded the TSS concentration limits.
- Between 22 February 2022 and 9 March 2022, approximately 538 mm rainfall was recorded at the site (Figure 3-3). This discharge event occurred in the largest rainfall event for this reporting period.

It is worth noting that the rainfall around the period of this discharge equated to a 50-year average recurrence interval per the Bureau of Meteorology intensity, frequency and duration chart for this area (refer Figure 3-3). The leachate overflow pond was designed for a 10-year average recurrence interval.

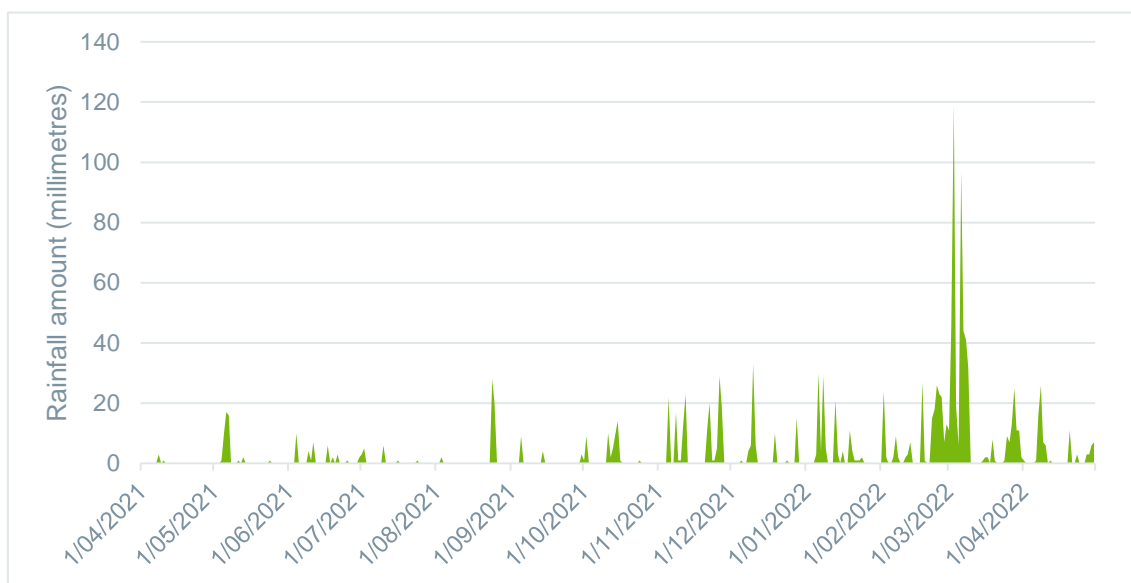


Figure 3-3 Rainfall over time

3.3.3 Water quality complaints

The facility has not received water quality complaints during the reporting period.

3.4 Noise

Operational noise is monitored in accordance with the approved EMP, which stipulates an operational monitoring frequency every five years.

3.4.1 Noise impact assessment criteria

The intrusiveness and amenity criteria from the *Industrial Noise Policy* (INP) (EPA, 2000) were referenced in the EA when setting the operational noise impact assessment criteria.

The EA predicted that noise impacts from the facility on the area surrounding were acceptable, as the noise levels were low enough to ensure future land use conflicts were unlikely.

3.4.2 Noise monitoring

It is worth noting that the facility and EDL are both within the Kemps Creek Resource Recovery Park, but each facility operates under separate approvals and licences which have different performance criteria and noise limits therefore, noise associated from the landfill operation were excluded from the compliance noise assessment.

Attended operational noise monitoring was conducted on 2 and 3 December 2022. One measurement was conducted for each of the identified receivers during the morning shoulder period and day to address waste receipt, outdoor operations, indoor operations and product dispatch activities. In the evening, two measurements were conducted for each receiver to address outdoor and indoor operations. One measurement was conducted for 1669A Elizabeth Drive, Caretakers Residence and 1745 Elizabeth Drive during the evening to address indoor operations.

Table 3-4 summarises the noise monitoring results from 2020 and compares these to the results from 2018.

Table 3-4 Noise monitoring results

Location	Type	Morning Shoulder Period (6-7am)	Day L _{Aeq} (15 min)	Evening L _{Aeq} (15 min)	Night L _{Aeq} (15 min)	Night L _{Amax}
McGarvie Smith Farm	Limit	39	42	39	35	n/a
	Measured 2018	36	37	34	33	
	Measured 2020	<40	<40	<35	<35	
	Measured 2021	<40	<40	<35	<35	
	Measured 2022	<40	<40	<35	<35	
1745 Elizabeth Drive	Limit	40	41	40	37	47
	Measured 2018	32	33	<30	<30	<30
	Measured 2020	<35	<35	<30	<30	<30
	Measured 2021	<35	<35	<35	<35	Complies
	Measured 2022	<35	<35	<35	<35	Complies
1669A Elizabeth Drive	Limit	38	38	38	35	n/a
	Measured 2018	40	38	35	33	
	Measured 2020	<35	<35	<35	<30	
	Measured 2021	<35	<35	<35	<35	
	Measured 2022	<35	<35	<35	<35	
Caretakers Residence 1669A Elizabeth Drive	Limit	42	41	42	38	53
	Measured 2018	39	37	33	<30	<30
	Measured 2020	<40	<40	<35	<35	<35
	Measured 2021	<40	<40	<40	<39	Complies
	Measured 2022	<40	<40	<40	<39	Complies

3.4.3 Noise complaints

The facility has not received noise complaints during the reporting period.

3.5 Dust

The facility has largely eliminated the generation of dust by sealing all external maturation areas. There is one area, referred to as the re-graded area (~2,700 m²), which is not sealed. This area is mostly used for the storage of equipment and does not receive a significant volume of traffic. This area has a low-risk for emitting dust due to its small size, usage and location.

The facility has been inspected each week and month during the report period. There were no recorded instances where the site has emitted dust.

3.5.1 Dust impact assessment criteria

The Guideline for Air Pollutants were referenced in the EA when setting the impact assessment criteria. The Guideline for Air Pollutants criterion for dust deposition is 4 g/m²/month, which is an annual average of the monthly dust deposition rates.

The EA concluded the facility was unlikely to result in exceedances of the air quality criteria for dust concentration and deposition.

3.5.2 Dust monitoring

There is no requirement in EPL 12889 or the Project Approval to quantitatively monitor dust deposition and there are no emission limitations.

Dust gauges associated with EPL 4068 are analysed every quarter. Analysis results from dust gauges nearest the facility in the last few quarters are included in Table 3-5.

It should be noted these results are not representative of the facility's activities alone; dust deposition gauges by design capture all particulate matter and are more appropriately representative of locality. The locality around the facility is currently undergoing significant development which would be contributing to dust deposition (e.g. Western Sydney Airport, Mamre Road developments).

Table 3-5 Dust deposition monitoring (g/m²/month)

Location	May 2021	Aug 2021	Sep 2021	Oct 2021	Nov 2021	Jan 2022	Mar 2022
D5	4	3.8	5.3	8.8	7.4	2.5	3.2
D6	52.2	0.9	4.5	9.3	10	22.5	8.9
D8	4	2.9	18.3	30.9	31.1	13.9	21.5
D10	8.5	3.8	13.9	11	4.9	4.1	8.7
D17	3.6	1.7	6.5	-	5	7.5	6.3
D20	4.5	0.4	4.1	8.5	10	11.5	15.3
D21	0.7	2.1	2.1	3.9	2.6	3.9	3.7

3.5.3 Dust complaints

The facility has not received dust complaints during the reporting period.

CHAPTER 4

COMPLIANCE STATUS

4 COMPLIANCE STATUS

An independent environmental audit (IEA), reviewing the period April 2018 to October 2020, was concluded on 2 December 2020. Non-compliance findings of the IEA, and corrective actions being implemented by the facility are documented in Table 4-1.

There have been no other reported non-compliances during this reporting period.

Table 4-1 IEA non-compliances

Approval (ID)	Requirement	Findings	Audit recommendation	Corrective action(s)	Status
3.5	The Proponent shall prepare and implement a Waste Monitoring Program for the project to the satisfaction of the Director-General, prior to the commencement of operation. This program must: (a) be prepared in consultation with EPA by a suitably qualified and experienced expert; and (b) include a suitable program to monitor the: • quantity, type and source of waste received on site; • quantity, type and quality of the outputs produced on site; and (c) outline contingency measures that would be implemented in the event that levels of foreign matter or contaminants in the compost output exceed acceptable levels.	The product quality manual prepared for the facility would be sufficient to address the monitoring objectives of this condition, but there is no evidence of the EPA having been consulted in the preparation of this document nor is there evidence of DPIE approving this document. The current version of the EMP does not address the monitoring objectives of this condition.	Consult with EPA on the waste monitoring requirements from the product quality manual, document this consultation and the monitoring requirements in the EMP.	The Department of Planning and Environment approved the EMP (version 5, dated 19 August 2021) on 1 April 2022.	Closed
3.11	The Proponent is required to prepare a feasibility report for the Director-General's approval within 5 years of this approval, outlining options to capture and use greenhouse gas in the generation of	SUEZ has not prepared and submitted a feasibility report for DPIE approval. SUEZ has sought clarification from DPIE on this condition but no responses from DPIE to SUEZ's request for	Prepare and submit a modification to remove the condition about the feasibility report.	An external consultant prepared a Greenhouse Gas Feasibility Report (dated 28/02/2022), which was approved by the Department of	Closed

Approval (ID)	Requirement	Findings	Audit recommendation	Corrective action(s)	Status
	electricity. The report must identify which options could be reasonably and feasibly implemented.	clarification were provided. It is noted that the AEMR 2018-19 identified an action for SUEZ to seek a modification to the project approval to remove this condition because the development cannot comply with the requirement.		Planning and Environment on 23 June 2022.	
3.20	The Proponent shall prepare and implement a Soil, Water and Leachate Management Plan for the project to the satisfaction of the Director-General. This plan must: (a) be submitted to the Director-General for approval prior to carrying out any development on site; (b) be prepared by a suitably qualified and experienced expert; (c) be prepared in consultation with the EPA, NOW and Council; and (d) include: • a site water balance; • an erosion and sediment control plan; • a stormwater management scheme; • a surface water, groundwater and leachate monitoring program; and • a surface water, groundwater and leachate response plan.	EMP which was originally submitted on 29/04/2009 and approved by DPIE on 30/04/2009, included a soil, water and leachate management plan. The EMP was updated following the last independent environment audit and approved by DPIE on 29/11/2019. The plan however does not identify who prepared this plan (i.e. suitably qualified and experienced expert) and there is no evidence of EPA, NOW or Council having been consulted in the preparation.	Include evidence of consulting EPA, DPIE Water and Council in the Soil, Water and Leachate Management Plan. If this evidence is not available, these stakeholders should be provided an opportunity to comment on the current plan, and the plan should be updated and SUEZ attempts at consultation should be documented.	The Department of Planning and Environment approved the EMP (version 5, dated 19 August 2021) on 1 April 2022.	Closed
3.23	The stormwater management scheme must: (a) be consistent with the guidance in the latest	The stormwater management system included in the EMP does not demonstrate how the scheme is	The stormwater management scheme needs to demonstrate (1) compliance with Managing Urban	The Department of Planning and Environment approved the EMP (version	Closed

Approval (ID)	Requirement	Findings	Audit recommendation	Corrective action(s)	Status
	version of Managing Urban Stormwater: Council Handbook (EPA); and (b) have sufficient capacity to cater for the 90th percentile 5 day rainfall event.	consistent with Managing Urban Stormwater: Council Handbook (EPA) nor does the scheme demonstrate how the system has sufficient capacity for the 90th percentile 5-day rainfall event.	Stormwater: Council Handbook (EPA) and (2) that the system has capacity to handle the 90th percentile 5 day rainfall event.	5, dated 19 August 2021) on 1 April 2022.	
3.24	The surface water, groundwater, and leachate monitoring program must: (a) be generally consistent with the guidance in EPA's Environmental Guidelines for Composting & Related Organics Processing Facilities; and (b) include: <ul style="list-style-type: none"> • baseline data; • details of the proposed monitoring network; and • the parameters for testing and respective trigger levels for action under the surface water, groundwater and leachate response plan (see below). 	The EMP (July 2020) does not include a groundwater monitoring program or baseline data.	The EMP needs to be updated to include a groundwater monitoring program and baseline data; or the condition should be modified and the need for groundwater monitoring removed.	The Department of Planning and Environment approved the EMP (version 5, dated 19 August 2021) on 1 April 2022.	Closed
3.25	The surface water, groundwater and leachate response plan must: (a) include a protocol for the investigation, notification and mitigation of any exceedances of the respective trigger levels; and (b) describe the array of measures that could be implemented to respond to any surface or groundwater contamination that may be caused by the development.	The EMP (July 2020) does not include a groundwater response plan, investigation and notification procedures as well as how to respond to surface or groundwater contamination.	The EMP needs to be updated to include surface water, groundwater and leachate response plan that meets the requirements of this condition.	The Department of Planning and Environment approved the EMP (version 5, dated 19 August 2021) on 1 April 2022.	Closed



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