



Application for licence

Part V Division 3 of the *Environmental Protection Act 1986*

Works approval number	L9227/2019/1
Works approval holder	Total Green Recycling Pty Ltd
ACN	131 084 805
DWER file number	DWERVT4527
Premises	Total Green Recycling 16-30 Sheffield Road WELSHPOOL 6106 Legal description Part of Lot 6 on Diagram 91787 Certificate of Title Volume 2087 Folio 321 As defined by the coordinates in Schedule 1 of the Licence
Date of report	6 May 2020
Decision	Licence granted

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1. Definitions

Key terms relevant to this decision report and their associated definitions are listed in **Table 1**.

Table 1: Definitions

Term	Definition
Applicant	Total Green Recycling Pty Ltd
Category / categories	Categories of prescribed premises as set out in Schedule 1 of the EP Regulations.
Decision Report	refers to this document.
Delegated Officer	An officer delegated under section 20 of the EP Act.
Department	The department established under section 35 of the <i>Public Sector Management Act 1994</i> and designated as responsible for the administration of Part V Division 3 of the EP Act.
DWER	Department of Water and Environmental Regulation As of 1 July 2017, the Department of Environment Regulation (DER), the Office of the Environmental Protection Authority (OEPA) and the Department of Water (DoW) amalgamated to form the Department of Water and Environmental Regulation (DWER). DWER was established under section 35 of the <i>Public Sector Management Act 1994</i> and is responsible for the administration of the <i>Environmental Protection Act 1986</i> along with other legislation.
Emission	has the same meaning given to that term under the EP Act.
EP Act	<i>Environmental Protection Act 1986 (WA)</i>
EP Regulations	<i>Environmental Protection Regulations 1987 (WA)</i>
Noise Regulations	<i>Environmental Protection (Noise) Regulations 1997 (WA)</i>
Occupier	has the same meaning given to that term under the EP Act.
Prescribed premises	This has the same meaning given to that term under the EP Act.
Premises	refers to the premises to which this Decision Report applies, as specified at the front of this Decision Report
Primary Activities	as defined in Schedule 2 of the Works Approval
Risk Event	As described in <i>Guidance Statement: Risk Assessment</i>

2. Purpose and scope of assessment

On 30 August 2019, Total Green Recycling Pty Ltd (the Applicant) submitted an application to the Department of Water and Environmental Regulation (DWER) for a new works approval. The Works Approval application was for Prescribed Premises Category 61A solid waste facility in Welshpool, Western Australia. During the assessment process it was identified that the facility had already been constructed. Consequently the Application was withdrawn and the Applicant was advised to apply for a licence instead.

On 20 November 2019 the Applicant submitted an application for a licence. The Applicant has relocated its existing electronic waste recycling facility, which was located in Kewdale, to the Welshpool premises.

3. Application details

Total Green Recycling Pty Ltd (the Applicant) proposes to operate an electronic waste recycling facility (Category 61A), located at 16-30 Sheffield Road, Welshpool.

Table 2 lists the documents submitted during the assessment process.

Table 2: Documents and information submitted during the assessment process

Document/information description	Date received
Application Form (Licence) and Supporting Documentation.	20 November 2019
Correspondence confirming premises boundary and operating hours	26 November 2019

4. Background

The Applicant has not previously held a licence or works approval at the proposed premises location.

This licence relates to the relocation of Total Green Recycling from Miles Road, Kewdale premises to a new premises in Welshpool. Table 3 presents the history of licences and works approvals held by the Applicant which relate to this electronic waste recycling facility.

Table 3: Applicant's instrument history

Instrument	Issued	Nature and extent of works approval, licence or amendment	Location	Status
L8929/2015/1	19/02/2016	Licence for Category 61A solid waste facility	33 Fargo Way, Welshpool	Licence surrendered 22/03/2018
W6099/2017/1	21/12/2017	Works Approval for Category 61 A solid waste facility	26 Miles Road, Kewdale	Progressed to Licence below
L9182/2018/1	6/02/2019	Licence for Category 61A solid waste facility		Licence expired 29/09/2019
L9227/2019/1	06/05/2020	Licence for Category 61A	16-30 Sheffield Road, Welshpool	Current instrument

Table 4 lists the prescribed premises category of the existing premises.

Table 4: Classification of premises and assessed design capacity

Category	Description	Assessed production or design capacity or throughput
Category 61A	Solid waste facility: premises (other than premises within Category 67A) on which solid waste produced on other premises is stored, reprocessed, treated, or discharged onto land.	4000 tonnes per year

5. Description of proposed activities

5.1 Operational aspects

The primary activities carried out on the premises are:

1. The collection and delivery of electronic waste.
2. Recycling electronic waste for materials.
3. Testing and refurbishing of electronics that are suitable for re-use.

Processes include re-use, manual disassembly, mechanical processing and sorting.

5.2 Infrastructure

The proposed infrastructure and equipment are outlined in Table 5 below and the site layout is shown in Figure 1.

Table 5: Proposed infrastructure and equipment

Ref	Infrastructure or Equipment	Site Layout Plan reference (Figure 1)
1	Dust extraction unit	Dust extractor unit
2	Two shredders	Mechanical processing plant
3	One hammer mill	
4	One eddy current separator	
5	Eleven conveyors	
6	Two vibrating feeders and sieves	
7	Horizontal plastic baler	
8	Air compressor	
9	Automatic colour sorter	
10	Small trommel	
11	Manual sorting line	

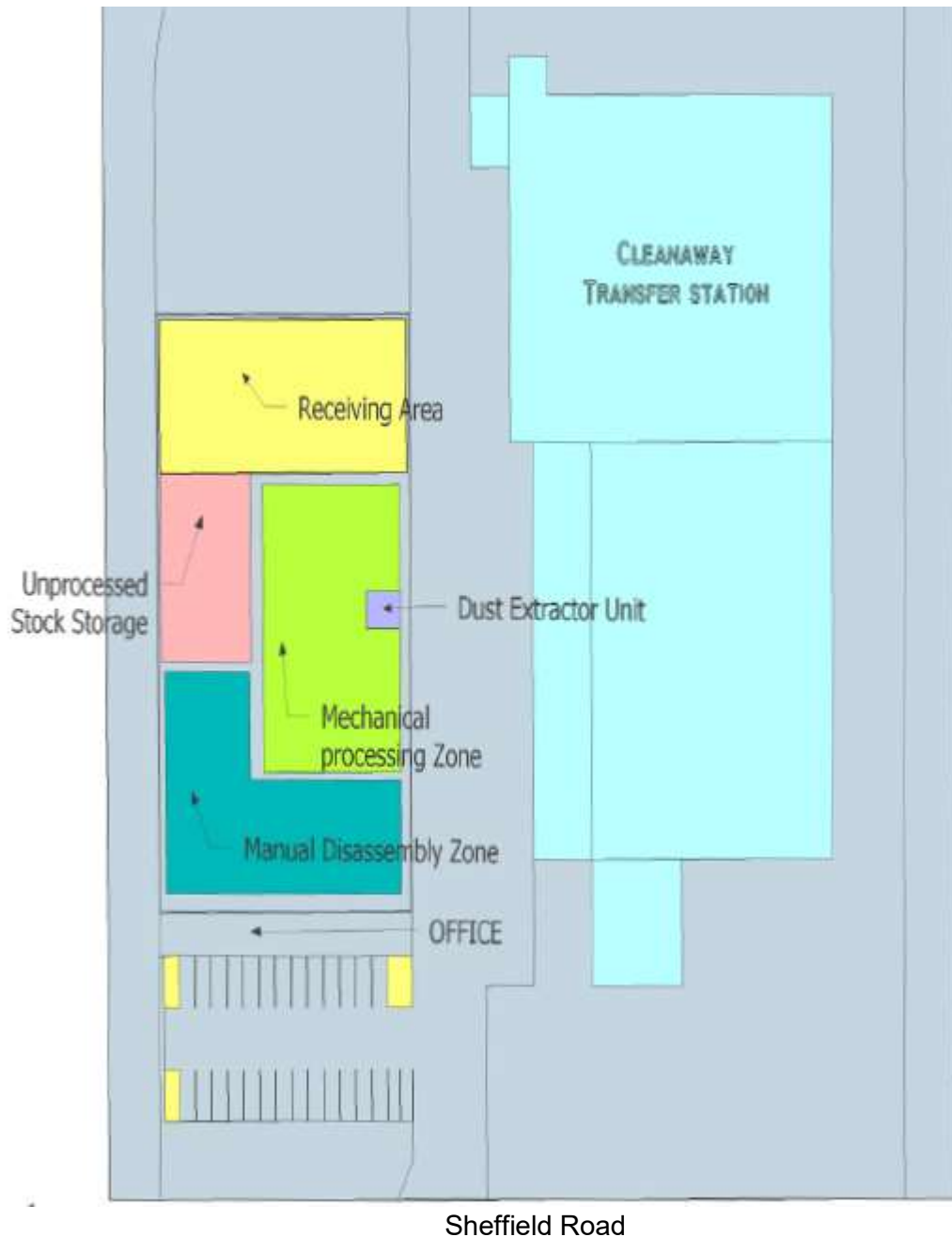


Figure 1: Site layout plan

5.3 Legislative context and other approvals

5.3.1 Lease agreement

The Applicant holds a sub-lease agreement with Cleanaway Operations Pty Ltd which is the sub-landlord for the premises located at 16-30 Sheffield Road. The sub-lease relates to part of Lot 6 on Diagram 91787. The lease expires 12 August 2020.

5.3.2 Planning approval

The Premises is zoned for General Industry under the City of Canning Local Planning Scheme No. 40. The Premises is also located within the Special Control Area – Perth Airport.

Updated advice from the City of Canning, dated 18 February 2020, advising that the land use is considered to be an 'Industry' land use. The City's Town Planning Scheme No. 40 defines Industry as:

industry means premises used for the manufacture, dismantling, processing, assembly, treating, testing, servicing, maintenance or repairing of goods, products, articles, materials or substances and includes facilities on the premises for any of the following purposes –

- (a) the storage of goods;*
- (b) the work of administration or accounting;*
- (c) the selling of goods by wholesale or retail;*
- (d) the provision of amenities for employees;*
- (e) incidental purposes;*

The Industry land use is a 'P' use within the General Industry zone which means that the use is permitted if it complies with any relevant development standards and requirements of the City's Town Planning Scheme No. 40. The City concluded that as the land use is permitted and there is no development occurring, there is no requirement for a development approval to be obtained.

5.3.3 Part V of the EP Act

The lot on which the Premises will be established is currently part of the W6021/2016/1 premises which is occupied by Cleanaway Solid Waste Pty Ltd. On 17 December 2019 Cleanaway Solid Waste Pty Ltd submitted a separate amendment application to DWER to excise the area sub-leased to the Applicant from their premises boundary. On 23 April 2020 DWER issued the amendment for W6021/2016/1.

5.3.4 Contaminated Sites Act 2003

The lot on which the Premises is located is classified as 'Contaminated – restricted use' under the *Contaminated Sites Act 2003*. This classification is based on the presence of asbestos-impacted soil and asbestos-containing material (ACM) buried beneath a bituminized surface in the northern and south-eastern portions of Lot 6 on Diagram 91787 at a depth of between 0.2 and 0.6 m below ground level.

Restrictions on use are summarized as follows:

- A site specific health and safety plan should be developed and implemented to address the risks to the health of any workers undertaking intrusive works until further notice.
- An ongoing site management plan is necessary to provide details of the location and the extent of the ACM with advice on management strategies if there is any disturbance of the existing ground surface or change to the current site configuration.
- The land use is restricted to commercial/industrial use. The site should not be developed for a more sensitive use such as recreational open space, residential use or childcare centres without further contamination assessment and/or remediation.

6. Emission sources, receptors and pathways

6.1 Emissions

The potential for emissions to impact on sensitive receptors has been assessed in accordance with the Department's Risk Framework. The key emissions during operation of the premises which have been considered in this report are dust and noise from activities including operation of mechanical equipment and vehicle movements.

In October 2018 the Applicant commissioned Herring Storer Acoustics to undertake a boundary noise survey of its previous facility located at 26 Miles Road, Kewdale. The objective of this study was to carry out noise level measurements around the boundary of the facility and compare to the regulatory criteria. Noise level measurements were performed around the boundary of the previous premises when the facility was operating at full capacity. This involved all internal equipment such as sorting line, grinder and shredder operating. Externally, operating noise sources included the diesel generator and the extraction fan system.

The resultant noise levels were 54, 55 and 61 dB(A). Herring Storer Acoustics concluded that all noise levels measured were below 65 Db(A) at the boundary, which is the assigned noise level for all hours in industrial premises.

The applicant has advised that all of the processing equipment and the dust extraction unit are the same as what was used at their previous premises. The only difference is that the dust extraction unit has now been put inside the building to further reduce noise emissions. Given this it is expected that the noise levels at the new premises will be the same or less than that at the previous premises.

The Applicant has proposed measures to assist in controlling noise and dust emissions, where necessary. The control measures are outlined in Section 6.4 below and have been considered when undertaking the risk assessment detailed in Section 7.

6.2 Environmental Siting

6.2.1 Potential receptors and environmental aspects

Risk is assessed as a combination of emission sources, the proximity and sensitivity of receptors to those emission sources and any pathways that can allow the emission to reach and potentially harm the receptor. Figure 2 and the table below provides a summary of human and environmental receptors in proximity to the premises which have a potential to be impacted from site activities, and the risk assessment in Section 6 considers these receptors in the context of emissions and potential pathways.

Table 6: Distance to receptors

Human receptors	Distance from activity or prescribed premises
Sheffield Lunch Bar	120 m north-west of the Premises
East Cannington Residential Development	1500 m south of the Premises
Wattle Grove Residential Development	1450 south-east of the Premises
Wattle Grove Primary School	1650 m south-east of the Premises

Queens Park Residential Development	1700 m south-west of the Premises
Environmental receptors	Distance from activity / prescribed premises
Geomorphic Wetlands Swan Coastal Plain	<ul style="list-style-type: none"> • Kewdale Freight Terminal Site (Conservation and Multiple Use), approximately 520 m north-east of the Premises • South Kewdale Yard (Resource Enhancement) Approximately 550 m east of the Premises • Artificial lake (Resource Enhancement), approximately 700 m west of the Premises • Palusplain (Conservation and Multiple Use), approximately 760 m south-east of the Premises
Bush Forever: Regional open space or proposed regional open space	<ul style="list-style-type: none"> • Site 424, approximately 1000 m south-west of the Premises • Site 386, approximately 1210 m north-east of the Premises • Site 282, approximately 1410 m south-east of the Premises • Site 319, approximately 1430 m north-east of the Premises
Threatened and Priority Ecological Communities	<ul style="list-style-type: none"> • Two types of endangered communities (SCP02 and SCP20a) and one Priority 3 community (Banksia WL SCP) within 1.5 km
Threatened/Priority Flora	<ul style="list-style-type: none"> • Four records of endangered species within 1.5 km • Two records of vulnerable species within 1.5 km • One record of a Priority 3 species within 1.5 km • Four records of Priority 4 species within 1.5 km
Threatened/Priority Fauna	<ul style="list-style-type: none"> • Two records of critically endangered species (Western Swamp Tortoise) within 1.5 km • 105 records of endangered species (Carnaby's Cockatoo) within 1.5 km • One record of a vulnerable species (Chuditch) within 1.5 km • One record of a Priority 3 species (Guildford Springtail) within 1.5 km • 23 records of a Priority 4 species (Quenda) within 1.5 km
Drinking Water Source Areas	None within 8 km of the Premises
Environmental aspects	Distance from activity / prescribed premises
Acid sulfate soils	The Premises is located within a moderate to low risk zone of the Acid Sulfate Soils Risk Map.



Figure 2: Distance to human receptors

6.2.1 Geology, hydrogeology and hydrology

The Premises is underlain by the Bassendean Sand which comprises quartz dune sand. Groundwater in the Superficial Aquifer is expected to occur at a depth of 6.8 m below ground level at the Premises. Regional groundwater flow in the Superficial Aquifer occurs to the south south-west towards the Canning River.

The closest surface water features to the Premises are wetlands within the Welshpool industrial area. The closest of these to the Premises are approximately 520m north east and 550m east of the Premises. The Canning River is located approximately 5km south-west of the Premises.

6.2.2 Perth Airport flight path

The Premises is located approximately 3km south of the Perth Airport runways and is in close proximity to flight paths regularly used by arriving and departing flights. Based on the City of Canning Local Planning Scheme No. 40, the Premises is located within the Perth Airport Special Control Area. One of the main planning objectives of this area is to prevent unreasonable encroachment of incompatible (noise sensitive) land uses and those activities affected or potentially impacted upon aircraft noise.

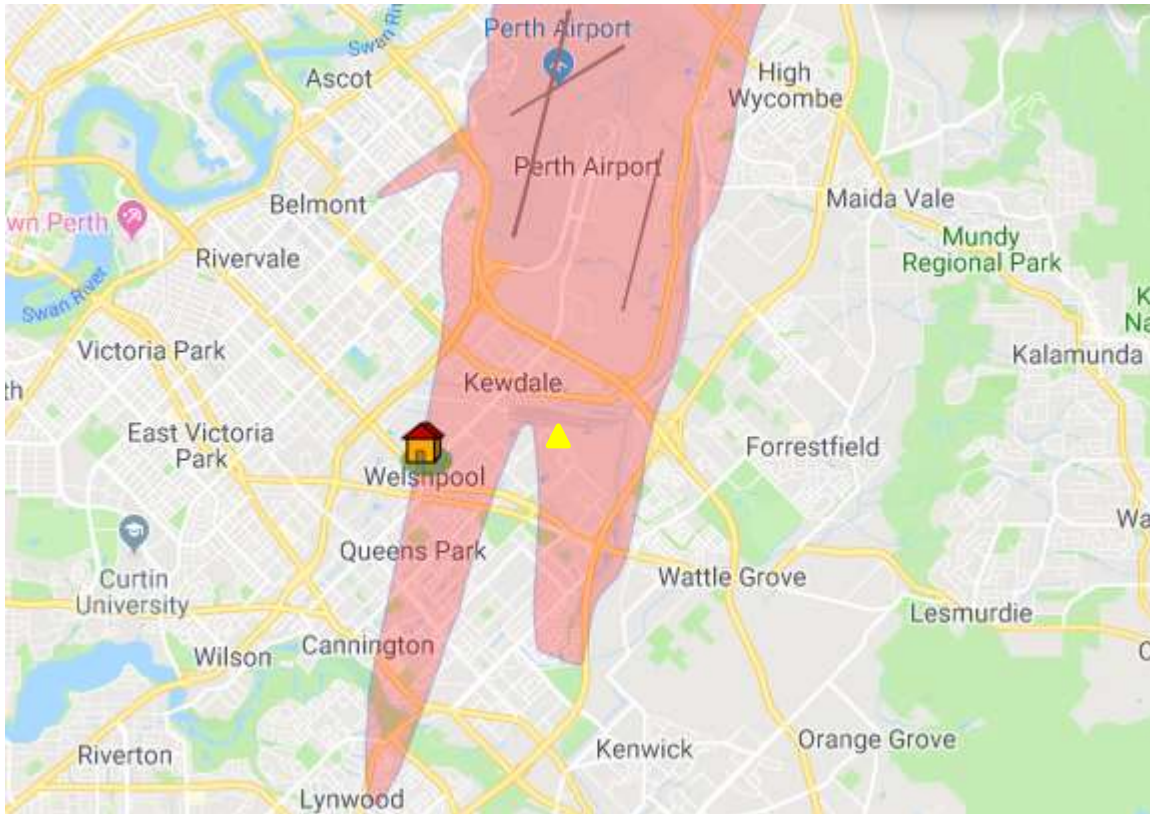


Figure 3: Location of the Premises (yellow triangle) in relation to the 2019 Perth Airport flight paths. The area depicted in red is above the 20 Australian Noise Exposure Forecast contour (Perth Airport, 2019).

6.3 Pathways

As dust and noise are considered potential emissions, the prevailing wind direction has been considered. Using information available on the Bureau of Meteorology's website, the closest available weather station for climate data is located at Perth Airport. Based on the climate data for this weather station (01 May 1944 to 11 Aug 2019), the prevailing wind direction is easterly in the morning and south westerly in the afternoon.

These pathways have been considered in the risk assessment table in Section 7.

6.4 Applicant controls

The Applicant has proposed the following management measures as part of the application:

Table 7: Summary of emissions and applicant controls

Source	Emission (as identified above)	Proposed controls
Release of general dust and silica dust during disassembly and shredding	Dust	<ul style="list-style-type: none"> • Processing of waste to occur within an enclosed shed located in industrial zoned area. • Dust extraction system fitted with a cartridge filter to be installed on the processing shed with up to 99.95% efficiency to 2.0 µm with an air exchange rate of 21 600 m³ per hour. <p>All potentially contaminated air generated within the enclosed shed is to be passed through the unit, no bypass is permitted.</p> <p>Discharged air is to be via an outlet located within one metre of the ground.</p> <ul style="list-style-type: none"> • All items which may contain hazardous materials are removed and not processed through the plant.
Operation of mechanical equipment including small hammer mill and shredder	Noise	<ul style="list-style-type: none"> • Siting of activities within enclosed shed in an industrial area • High risk plant (dust extraction unit) will be located on the eastern side of the premises, away from the western neighbour • Facility operating hours will be Monday to Friday 5:00am to 6:00pm and Saturday 6:00am to 12:30pm.

7. Risk assessment

The identification of the sources, pathways and receptors to determine Risk Events are set out in Tables 8 below, consistent with the *Guidance Statement: Risk Assessments*. Risk ratings have been assessed for each key emission source and take into account potential source-pathway-receptor linkages. The mitigation measures / controls proposed by the Applicant have been considered in determining the risk rating.

The conditions in the issued Licence as outlined in Table 8, have been determined in accordance with the *Guidance Statement: Setting Conditions*.

8.2 Risk assessment – operation

Table 8: Identification of emissions, pathway and receptors

Risk Event				Consequence rating ¹	Likelihood rating ¹	Risk ¹	Reasoning	Regulatory controls (refer to conditions of the granted instrument)
Source/Activities*	Potential emissions	Potential receptors, pathway and impact	Applicant controls					
Operation of plant equipment - shredding	Dust	Air/windborne causing impacts to surrounding industrial businesses and residential receptors (nearest is located 1450m south east) Potential impacts from dust and particulate (mercury, lead and silica) emissions include degradation of local air quality and impacts on the comfort and amenity of surrounding industrial receptors.	Refer to Table 7 above.	Minor	Rare	Low	The Applicant's proposed dust mitigation controls are likely to be sufficient at mitigating dust emissions.	Condition 1, 2 and 8
	Noise	Air/windborne causing adverse health and amenity impacts to surrounding industrial businesses (adjacent to the premises) and residential receptors (nearest is located 1450m south east)	Refer to Table 7 above.	Minor	Rare	Low	The Applicant's proposed noise mitigation controls are likely to be sufficient at minimizing noise emissions to assigned noise levels of the <i>Environmental Protection (Noise) Regulations 1997</i> .	Conditions 1, 2 and 8
Operation of dust extraction system	Noise	Air/windborne causing adverse health and amenity impacts to residential receptors (nearest is located 1450m south east)	Refer to Table 7 above.	Minor	Rare	Low	The separation distance between the premises and the nearest residential receptor will be sufficient to manage noise impacts.	Conditions 1, 2 and 8

Risk Event				Consequence rating ¹	Likelihood rating ¹	Risk ¹	Reasoning	Regulatory controls (refer to conditions of the granted instrument)
Source/Activities*	Potential emissions	Potential receptors, pathway and impact	Applicant controls					
		Air/windborne causing adverse health and amenity impacts to adjacent industrial businesses	Refer to Table 7 above.	Moderate	Rare	Medium	The placement of the dust extraction unit inside the shed along with the applicant's obligation to comply with the <i>Environmental Protection (Noise) Regulations 1997</i> will be sufficient to manage noise impacts.	Conditions 1, 2 and 8

Note 1: Consequence ratings, likelihood ratings and risk descriptions are detailed in the Department's Guidance Statement: Risk Assessments (February 2017)

8. Consultation

Table 9: Summary of consultation

Method	Comments received	DWER response
Application advertised on DWER website (10/12/2019)	None received	N/A
Local Government Authority advised of application (10/12/2019)	Comments received on 6 January 2020 advising that development approval was required and that an application had not been lodged. Further advice was provided by the Shire on 18 February 2020 advising that there is no requirement for a development approval to be obtained.	N/A
Applicant referred draft documents (10 January 2020)	In an email dated 5 February 2020 the Applicant advised that they had no comments regarding the decision documents.	N/A

9. Conclusion

Based on the assessment in this decision report, the Delegated Officer has determined that a licence will be granted, subject to conditions commensurate with the determined controls and necessary for administration and reporting requirements.

Tracey Hassell

A/Manager – Waste Industries

An officer delegated by the CEO under section 20 of the EP Act

Appendix 1: Key documents

Document title	Availability
Licence (L9227/2019/1) application form and supporting documentation (20/11/2019)	DWER records (DWERVT4527)
Herring Storer Acoustics – 2018 Boundary Noise Survey.	DWER records (A1741160)
DER, July 2015. <i>Guidance Statement: Regulatory principles</i> . Department of Environment Regulation, Perth.	accessed at www.dwer.wa.gov.au
DER, October 2015. <i>Guidance Statement: Setting conditions</i> . Department of Environment Regulation, Perth.	
DER, August 2016. <i>Guidance Statement: Licence duration</i> . Department of Environment Regulation, Perth.	
DER, February 2017 <i>Guidance Statement: Risk Assessments</i> . Department of Environment Regulation, Perth.	
DER, June 2019. <i>Guideline: Decision Making</i> . Department of Water and Environmental Regulation, Perth.	
Perth Airport, 2019. 'What does the current ANEF look like?'	accessed at https://aircraftnoise.perthairport.com.au/