



Licence number	L8125/2005/4
Licence holder	Crosslands Resources Pty Ltd
ACN	061 262 397
Registered business address	7 Rheola Street West Perth WA 6005
DWER file number	DER2014/001271-1
Duration	02/11/2015 to 01/11/2035
Date of amendment	26/02/2020
Premises details	Jack Hills Iron Ore Project M20/506 Beringarra-Cue Road MEEKATHARRA WA 6642

Prescribed premises category description (Schedule 1, <i>Environmental Protection Regulations 1987</i>)	Assessed production / design capacity
Category 5 Processing or beneficiation of metallic or non-metallic ore	50,000 tonnes per year
Category 64 Class II putrescible landfill site	5,000 tonnes per year
Category 85 Sewage facility	Less than 100 cubic metres per day

This licence is granted to the licence holder, subject to the attached conditions, on 26 February 2020, by:

**MANAGER WASTE INDUSTRIES
REGULATORY SERVICES**

an officer delegated under section 20 of the *Environmental Protection Act 1986* (WA)

Licence history

The licences and works approvals issued for the premises since 04/09/2006 are:

Date	Reference number	Summary of changes
04/09/2006	W4259/2005/1	Works Approval
08/11/2006	L8125/2005/1	New application
18/10/2007	L8125/2005/2	Licence re-issue
22/10/2010	L8125/2005/3	Licence re-issue
21/02/2013	L8125/2005/3	Licence amendment
29/10/2015	L8125/2005/4	Licence re-issue
23/06/2016	L8125/2005/4	Licence amendment - registered address and Licence duration
2/12/2019	L8125/2005/4	Licence transfer - change of registered address and conversion into current licence format
26/02/2020	L8125/2005/4	Licence amendment – increase waste acceptance quantities and add additional landfill areas.

Interpretation

In this licence:

- (a) the words ‘including’, ‘includes’ and ‘include’ in conditions mean “including but not limited to”, and similar, as appropriate;
- (b) where any word or phrase is given a defined meaning, any other part of speech or other grammatical form of that word or phrase has a corresponding meaning;
- (c) where tables are used in a condition, each row in a table constitutes a separate condition;
- (d) any reference to an Australian or other standard, guideline, or code of practice means the version of the standard, guideline, or code of practice in force at the time of granting of this licence and includes any amendments to the standard, guideline or code of practice which may occur from time to time during the course of the licence;
- (e) unless specified otherwise, any reference to a section of an Act refers to that section of the EP Act; and
- (f) unless specified otherwise, all definitions are in accordance with the EP Act.

NOTE: This licence requires specific conditions to be met but does not provide any implied authorisation for other emissions, discharges, or activities not specified in this licence.

Licence conditions

The licence holder must ensure that the following conditions are complied with:

General

1. The licence holder shall ensure that vehicle wash-down areas are equipped with fuel/oil traps and provisions to ensure hydrocarbon contaminated waters are not discharged to the environment.
2. The licence holder shall ensure mechanical workshops and refuelling areas are constructed and maintained to prevent hydrocarbons from being discharged to the environment.
3. The licence holder shall record and investigate the exceedance of any descriptive or numerical limit in this section.
4. The licence holder shall only accept waste to the landfill and wastewater treatment plant if:
 - (a) it is of a type listed in Table 1
 - (b) the quantity accepted is below any quantity limit listed in Table 1; and
 - (c) it meets any specification listed in Table 1

Table 1 Waste acceptance

Waste type	Quantity limit tonnes/year	Specifications
Clean Fill	5,000 tonnes per annual period	None specified
Inert Waste Type 1		None specified
Inert Waste Type 2		Tyres are not accepted for burial
Putrescible Waste		None specified
Sewage	Less than 100 cubic metres per day	Accepted through sewer inflow(s) only

5. The licence holder shall ensure that wastes accepted onto the landfill, wastewater treatment plant and bioremediation facility are only subjected to the processes set out in Table 2 and in accordance with any process limits described in that Table.

Table 2 Waste processing

Facility	Waste type	Process	Process limits
Landfill	Clean fill	Receipt, handling and disposal of waste by landfilling	<ul style="list-style-type: none"> • Disposal of waste by landfilling shall only take place within the landfill sites shown on the Map of waste disposal and processing locations in Schedule 1. • Waste shall be disposed of in a defined trench or within an area enclosed by earthen bunds. • The tipping area shall be no greater than two metres in height above ground level. • The size of the tipping face shall not be larger than 30m in length.
	Putrescible Waste		
	Inert Waste Type 1		
	Inert Waste Type 2		

Facility	Waste type	Process	Process limits
			<ul style="list-style-type: none"> Waste shall be placed and compacted to ensure all faces are stable and capable of retaining cover material.
Wastewater treatment plant	Sewage	Biological, physical and chemical treatment	None specified
Bioremediation facility	Hydrocarbon contaminated soil	Biological treatment	<ul style="list-style-type: none"> Located in the waste rock dump, as shown in the Map of waste disposal and processing locations in Schedule 1. Contained within earthen bunds on compacted road base.

6. The licence holder shall ensure that cover is applied and maintained on landfill wastes in accordance with Table 3 and that sufficient stockpiles of cover are maintained on site at all times

Table 3 Cover requirements

Waste type	Cover material	Depth	Timescales
Inert Waste Type 1	Inert and incombustible material	Sufficient to ensure the waste is completely covered and that no waste is exposed	Monthly or as soon as practicable after deposit and prior to compaction.
Inert Waste Type 2			
Putrescible Waste			
Clean fill	No cover requirements		

7. The licence holder shall ensure that no waste is burnt on the premises.
8. The licence holder shall ensure that any waste that has been washed or blown outside the landfill area is collected and returned to the tipping area on a monthly basis.
9. The licence holder shall ensure the limits specified in Table 4 are not exceeded.

Table 4 Production or design capacity limits

Category ¹	Category description ¹	Premises production or design capacity limit
5	Processing or beneficiation of metallic or non-metallic ore	50,000 tonnes of ore per annual period

Note1: *Environmental Protection Regulations 1987, Schedule 1*

Emissions

10. The licence holder shall record and investigate the exceedance of any descriptive or numerical limit specified in any part of section 2 of this licence.
11. The licence holder shall ensure that where waste is emitted to land from the emission points in Table 5 [and identified on the map of emission points in Schedule 1] it is done so in accordance with the conditions of this licence.

Table 5 Emission points to land

Emission point reference and location on Map of premises	Description	Source including abatement
Irrigation area	Fenced irrigation area	Treated wastewater from wastewater treatment plant

Monitoring

12. The licence holder shall ensure that:
 - a) all water samples are collected and preserved in accordance with AS/NZS 5667.1;
 - b) all wastewater sampling is conducted in accordance with AS/NZS 5667.10;
 - c) all laboratory samples are submitted to and tested by a laboratory with current NATA accreditation for the parameters being measured [unless indicated otherwise in the relevant table.
13. The licence holder shall ensure that quarterly monitoring is undertaken at least 45 days apart.
14. The licence holder shall ensure that all monitoring equipment used on the premises to comply with the conditions of this licence is calibrated in accordance with the manufacturer's specifications and the requirements of the licence
15. The licence holder shall, where the requirements for calibration cannot be practicably met, or a discrepancy exists in the interpretation of the requirements, bring these issues to the attention of the CEO accompanied with a report comprising details of any modifications to the methods.
16. The licence holder shall undertake the monitoring in Table 6 according to the specifications in that table

Table 6 Monitoring of emissions to land

Emission point reference	Parameter	Units	Averaging period	Frequency
WWTP discharge point	Volumetric flow rate (cumulative)	m ³ /day	Monthly	Continuous
	pH ¹	pH	Spot sample	Quarterly

Emission point reference	Parameter	Units	Averaging period	Frequency
	Total Suspended Solids	mg/L		
	Biochemical Oxygen Demand			
	Total Nitrogen			
	Total Phosphorus			
	<i>E. coli</i>	cfu/100 mL ²		

Note1: In-field non-NATA accredited analysis permitted for pH measurement

Note2: Actual units are to be reported except where the result is greater than the highest detectable level of 24,000 cfu/100mL

Records and reporting

17. All information and records required by the licence shall:

- (a) be legible;
- (b) if amended, be amended in such a way that the original and subsequent amendments remain legible or are capable of retrieval;
- (c) except for records listed in 17(d) be retained for at least 6 years from the date the records were made or until the expiry of the licence or any subsequent licence; and
- (d) for those following records, be retained until the expiry of the licence and any subsequent licence:
 - (i) off-site environmental effects; or
 - (ii) matters which affect the condition of the land or waters.

18. The licence holder shall complete an Annual Audit Compliance Report indicating the extent to which the licence holder has complied with the conditions of the licence, and any previous licence issued under Part V of the Act for the premises for the previous annual period.

19. The licence holder shall implement a complaints management system that as a minimum records the number and details of complaints received concerning the environmental impact of the activities undertaken at the premises and any action taken in response to the complaint.

20. The licence holder shall submit to the CEO an Annual Environmental Report within 28 calendar days after the end of the annual period. The report shall contain the information listed in Table 7 in the format or form specified in that table.

Table 7 Annual Environmental Report

Condition or table (if relevant)	Parameter	Format or form
-	Summary of any failure or malfunction of any pollution control equipment and any environmental incidents that have occurred during the annual period and any action taken	None specified
-	Summary of authorised activities including comparison of the approved production and design capacities and actual production/throughput for the Annual period	Brief summary
Table 6	Monitoring of emissions to land and a summary of results	None specified
Table 6	An assessment of monitoring results against previous monitoring results.	None specified
18	Compliance	Annual Audit Compliance Report (AACR)
19	Complaints summary	None specified

21. The licence holder shall submit the information in Table 8 to the CEO according to the specifications in that table.

Table 8 Non-annual-reporting requirements

Condition or table (if relevant)	Parameter	Reporting period	Reporting date (after end of the reporting period)	Format or form
-	Copies of original monitoring reports submitted to the licence holder by third parties	Not Applicable	Within 14 days of the CEOs request	As received by the licence holder from third parties

22. The licence holder shall ensure that the parameters listed in Table 9 are notified to the CEO in accordance with the notification requirements of the table.

Table 9 Notification requirements

Condition or table (if relevant)	Parameter	Notification requirement	Format or form
-	Production ceasing for an unspecified period of time	As soon as practicable after the decision has been made	None specified
-	Production recommencing	At least 90 calendar days prior to production recommencing	None specified
9	Breach of any limit specified in the licence	To be submitted within 28 calendar days after the end of the annual period	Annual Audit Compliance Report (AACR)

Definitions

In this licence, the terms in Table 10 have the meanings defined.

Table 10: Definitions

Term	Definition
ACN	Australian Company Number
Annual Audit Compliance Report (AACR)	means a report submitted in a format approved by the CEO (relevant guidelines and templates may be available on the department’s website).
annual period	a 12 month period commencing from 1 January until 31 December of the same calendar year.
AS/NZS 5667.1	means the Australian Standard AS/NZS 5667.1 <i>Water Quality – Sampling – Guidance of the Design of sampling programs, sampling techniques and the preservation and handling of samples</i> ;
AS/NZS 5667.10	means the Australian Standard AS/NZS 5667.10 <i>Water Quality – Sampling – Guidance on sampling of waste waters</i> ;
averaging period	means the time over which a limit is measured or a monitoring result is obtained
books	has the same meaning given to that term under the EP Act.
CEO	means Chief Executive Officer of the Department. “submit to / notify the CEO” (or similar), means either: Director General Department administering the <i>Environmental Protection Act 1986</i> Locked Bag 10 Joondalup DC WA 6919 or: info@dwer.wa.gov.au

Term	Definition
cfu	means colony-forming unit
Clean Fill	has the meaning defined in Landfill Waste Classification and Waste Definitions 1996 published by DER and as amended from time to time
controlled waste	has the definition in <i>Environmental Protection (Controlled Waste) Regulations 2004</i>
department	means the department established under section 35 of the <i>Public Sector Management Act 1994 (WA)</i> and designated as responsible for the administration of the EP Act, which includes Part V Division 3.
discharge	has the same meaning given to that term under the EP Act.
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>
Inert Waste Type 1	has the meaning defined in Landfill Definitions
Inert Waste Type 2	has the meaning defined in Landfill Definitions
Landfill Definitions	means the document titled "Landfill Waste Classification and Waste Definitions 1996" published by the Chief Executive Officer of the Department of Environment as amended from time to time
licence	refers to this document, which evidences the grant of a licence by the CEO under section 57 of the EP Act, subject to the specified conditions contained within.
licence holder	refers to the occupier of the premises, being the person specified on the front of the licence as the person to whom this licence has been granted.
NATA	means the National Association of Testing Authorities, Australia
NATA accredited	means in relation to the analysis of a sample that the laboratory is NATA accredited for the specified analysis at the time of the analysis
premises	refers to the premises to which this licence applies, as specified at the front of this licence and as shown on the premises map Figure 1 in Schedule 1 to this licence.
prescribed premises	has the same meaning given to that term under the EP Act.
Putrescible waste	means the organic component of the waste stream which can be decomposed by microbial action and become putrid and likely to cause obnoxious odours and attract (scavenging) birds or animals; putrescible waste includes food wastes or wastes of animal or vegetable origin

Term	Definition
quarterly	means the 4 inclusive periods from 1 April to 30 June, 1 July to 30 September, 1 October to 31 December and in the following year, 1 January to 31 March
Spot sample	means a discrete sample representative at the time and place at which the sample is taken
Waste	has the same meaning given to that term under the EP Act.

Schedule 1: Maps

Premises map

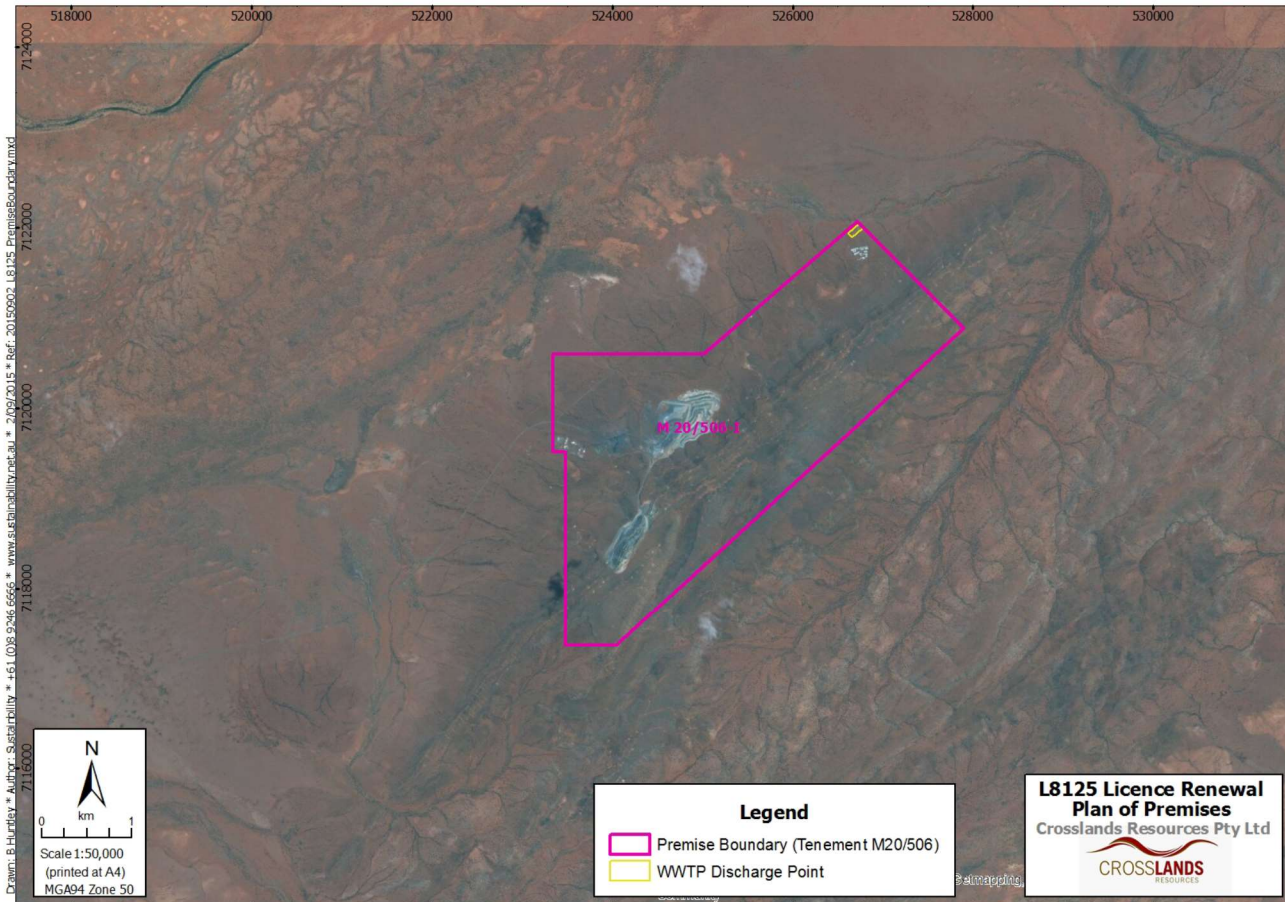


Figure 1: Map of the boundary of the prescribed premises

The location of the emission point defined in Table 5 is shown below. The yellow line defines the Irrigation area.

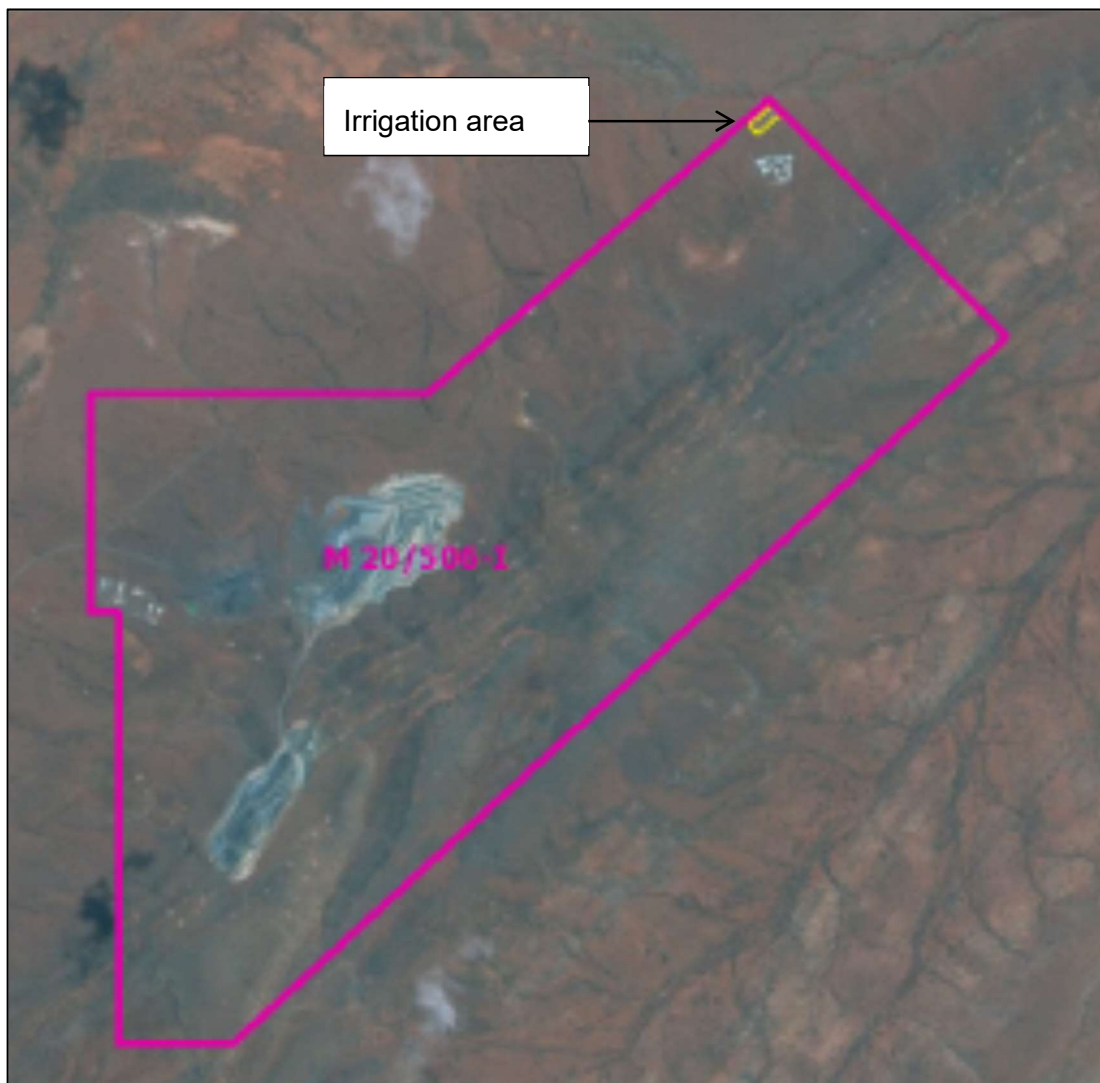


Figure 2: Map of emission point to land

The location of the landfill areas and the bioremediation facility are shown below. The landfill areas are depicted by red line (location 1, 2A and 2B). The bioremediation area is situated within the Waste Rock Dump (location 1).



Figure 3: Map of waste disposal and processing locations.

L8125/2005/4 Amended: 26/02/2020