



Licence number	L8758/2013/2
Licence holder	CITIC Pacific Mining Management Pty Ltd
ACN	119 578 371
Registered business address	45 St Georges Terrace PERTH WA 6000
DWER file number	DWERVT16087~1
Duration	25/11/2024 to 24/11/2044
Date of issue	22/11/2024
Premises details	Sino Iron Project Desalination Plant and Bulk Loading Facility General Purpose Lease G08/52 MARDIE WA 6714 as depicted in Schedule 1

Prescribed premises category description (Schedule 1, <i>Environmental Protection Regulations 1987</i>)	Assessed production / design capacity
Category 54A: Water desalination plant	44 gigalitres per annual period
Category 58: Bulk material loading or unloading	252,000 tonnes per day

This amended licence is granted to the licence holder, subject to the attached conditions, on 22 November 2024

Neville Welsh
SENIOR INDUSTRY LICENSING OFFICER
INDUSTRY REGULATION (STATE-WIDE DELIVERY)
Officer delegated under section 20 of the Environmental Protection Act 1986

Licence history

Date	Reference number	Summary of changes
05/11/2009	W4482/2008/1	New application for the Plant and BLF.
22/12/2011	W4482/2008/1	<p>On 3 July 2009 the Minister for Environment approved an application under section (s) 45C of the Act, allowing for an increase in concentrate production from 19.6 million tonnes per annum (Mtpa) to 27.6 Mtpa. This resulted in amendments to the works approval.</p> <p>The Plant:</p> <ul style="list-style-type: none"> The Licensee requested that the commissioning requirements be removed, considering a s45C to the initial Ministerial Statement resulted in additional commissioning conditions for the Plant under Part IV of the Act. However, as the specific monitoring of parameters falls under Part V of the Act this was declined by DER. <p>BLF:</p> <ul style="list-style-type: none"> Maximum capacity increased. In unsafe weather conditions, the barges and trans-shipment facility will return to anchorage in the Dampier port cyclone moorings until operational conditions prevail. The two main stormwater settlement ponds were relocated to the north of the stockyards. An updated map was provided. Concentrate final moisture content was increased to up to approximately 8%. This allows for increased ease of handling and further reduces the potential for dust emissions. Due to the high moisture content in the product additional dust extraction systems were not required. All transfer points are sheltered and enclosed and dust sprays are fitted on reclaimers, stackers and the BLF.
9/5/2013	W4482/2008/1	Amendment to extend the expiry date initially until 20 August 2018. DER allowed the extension for this works approval for an additional 3 years, as per the standard works approval timeframe, to 20 August 2016. The periods of commissioning were modified in line with the Licensee's most recent commissioning schedule.
Withdrawn	L8722/2013/1	New licence application for BLF and DWP. The Licensee originally planned to operate the BLF first so a Licence was drafted for this. This Licence was then withdrawn to apply for a Licence for the Plant first (L8758/2013/1).
21/11/2013	L8758/2013/1	Licence for the east train of the Plant.
31/07/2014	L8758/2013/1	Licence amendment to include the BLF and DWP onto the Plant Licence.
10/12/2015	L8758/2013/1	Amendment to the Licence to rectify administrative errors and update in line with the latest version of the Licence template; premises boundary has been expanded.
18/07/2016	L8758/2013/1	Licence amendment to transfer commissioning conditions for the Plant's West Train from the works approval W4482/2008/1 across to the licence.

Date	Reference number	Summary of changes
19/12/2017	L8758/2013/1	Licence amendment to remove point source emission limits to surface water for nitrate-nitrite and reactive phosphorus; and remove the commissioning conditions associated with the Plant's West Train.
18/07/2018	L8758/2013/1	Licence amendment to include process monitoring associated with the oily water separator at the Stockyard Wash Down Facility.
22/11/2024	L8758/2013/1	Licence amendment due to Ministerial Statement 822 modifications by issuing Ministerial Statement 1169: <ul style="list-style-type: none"> • Modification of Condition 4, Table 3 for Point source emission limits to surface water to ensure that the 90% species protection trigger levels would be met at the boundary of the low and moderate levels of ecological protection; and • Update into the new Licence format.
22/11/2024	L8758/2013/2	Licence renewal with 20-year duration.

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 in this licence:
 - (i) if dated, refers to that particular version; and
 - (ii) if not dated, refers to the latest version and therefore may be subject to change over time;
- (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:

Infrastructure and equipment

1. The licence holder must minimise spillages of materials entering the marine environment during barge loading operations.
2. The licence holder must ensure that waste material is only stored and/or treated within vessels or compounds provided with the infrastructure detailed in Table 1.

Table 1: Containment infrastructure

Containment cell or dam number(s) as depicted in Schedule 1	Material	Infrastructure requirements
Environmental Pond #1 (Dewatering)	Stormwater collected from the Dewatering Plant area	Lined with high density polyethylene liner to meet a permeability of $<1.0 \times 10^{-9}$ metres per second. Maintain an operational freeboard of 0.5 m.
Environmental Pond #2 (Stockyard)	Stormwater collected from the ore stockyards and treated water from the Stockyard Wash Down Facility	

Emissions and discharges

Authorised discharge points

3. The licence holder must ensure that where waste is emitted to surface water from the emission point in Table 2 and identified on the map of emission points in Schedule 1 it is done so in accordance with the conditions of this Licence.

Table 2: Emission points to surface water

Emission point reference and location on Map of emission points	Description	Source including abatement
Brine outfall	Discharge pipe at north western end of the port breakwater to the marine environment	Brine from the Desalination Plant

Emission Limits

4. The licence holder must not cause or allow point source emissions to surface water that do not meet the limits in Table 3

Table 3: Point source emission limits to surface water

Emission point reference and location on Map of emission points	Parameter	Limit (including units)	Averaging period
Brine Outfall in Schedule 1: Maps, Premises map	Brine outflow volume	< 64 GL/a	Annual
	Conductivity	>75.9 and <96.5 mS/cm	1 month
	Temperature	10 – 45°C	30 minutes
	pH	6 - 9	
	Turbidity	< 40 NTU	
	Dissolved Oxygen	> 4 mg/L	
	Oxygen Reduction Potential	< 800 mV	
	Ammonia	< 14.3 mg/L	Spot sample
	Cadmium	< 0.17 mg/L	
	Chromium	< 0.24 mg/L	
	Cobalt	< 0.17 mg/L	
	Copper	< 0.03 mg/L	
	Lead	< 0.08 mg/L	
	Mercury (inorganic)	< 0.008 mg/L	
	Nickel	< 2.39 mg/L	
	Silver	< 0.024 mg/L	
Vanadium	< 1.89 mg/L		
Zinc	< 0.27 mg/L		

Monitoring

5. The licence holder must ensure that:
- all water samples are collected and preserved in accordance with AS/NZS 5667.1 unless indicated otherwise in the relevant table;
 - all surface water sampling is conducted in accordance with AS/NZS 5667.9; and
 - 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.

6. The licence holder must ensure that:
 - (a) Monitoring is undertaken in each weekly period such that there are at least 4 days in between the days on which samples are taken in successive weeks;
 - (b) Monitoring is undertaken in each monthly period such that there are at least 15 days in between the days on which samples are taken in successive months;
 - (c) Monitoring is undertaken in each quarterly period such that there are at least 45 days in between the days on which samples are taken in successive quarters;
 - (d) Monitoring is undertaken in each six-monthly period such that there are at least 5 months in between the days on which samples are taken in successive periods of six months; and
 - (e) Monitoring is undertaken in each annual period such that there are at least 9 months in between the days on which samples are taken in successive years.
7. The licence holder must ensure that all monitoring equipment is operated and calibrated in accordance with the manufacturer’s specifications.
8. The licence holder must undertake the monitoring in Table 4 according to the specifications in that table.

Table 4: Monitoring of point source emissions to surface water

Emission point reference	Parameter	Units	Frequency
Brine Outfall in Schedule 1: Monitoring points	Brine outflow volume ¹	GL/a	Continuous, whilst in operation
	Conductivity ¹	mS/cm	
	Temperature ¹	°C	
	pH ¹	-	
	Turbidity ¹	NTU	
	Dissolved Oxygen ¹	mg/L	
	Oxygen Reduction Potential ¹	mV	
	Ammonia	mg/L	Six monthly
	Cadmium		
	Chromium		
	Cobalt		
	Copper		
	Lead		
	Mercury (inorganic)		
Nickel			
Silver			
Vanadium			
Zinc			

Note 1: In-field non-NATA accredited analysis permitted

The licence holder must undertake the monitoring in Table 5 according to the specifications in that table.

Table 5: Process monitoring

Monitoring point reference and location as depicted in Schedule 1	Process description	Parameter	Limit	Frequency	Method
OWS1 – Schedule 1 Monitoring Points	Final effluent sampling point OWS1 (Stockyard Wash Down Facility)	Total Recoverable Hydrocarbons	15 mg/L	Quarterly when wastewater is present	None specified

Records

9. The licence holder must record the following information in relation to complaints received by the licence holder (whether received directly from a complainant or forwarded to them by the Department or another party) about any alleged emissions from the premises:
 - (a) the name and contact details of the complainant, (if provided);
 - (b) the time and date of the complaint;
 - (c) the complete details of the complaint and any other concerns or other issues raised; and
 - (d) the complete details and dates of any action taken by the licence holder to investigate or respond to any complaint.

10. The licence holder must:
 - (a) undertake an audit of their compliance with the conditions of this licence during the preceding annual period; and
 - (b) prepare and submit to the CEO by 31 October each year an Annual Audit Compliance Report in the approved form.

11. The licence holder must maintain accurate and auditable books including the following records, information, reports, and data required by this licence:
 - (a) the calculation of fees payable in respect of this licence;
 - (b) any maintenance of infrastructure that is performed in the course of complying with condition 2 of this licence;
 - (c) monitoring programmes undertaken in accordance with condition 8 - Table 4 and condition 0 - Table 5 of this licence; and
 - (d) complaints received under condition 9 of this licence.

12. The books specified under condition 11 must:
- (a) be legible;
 - (b) if amended, be amended in such a way that the original version(s) and any subsequent amendments remain legible and are capable of retrieval;
 - (c) be retained by the licence holder for the duration of the licence; and
 - (d) be available to be produced to an inspector or the CEO as required.

Reporting

13. The licence holder must:
- (a) prepare an Environmental Report that provides information in accordance with Table 6 for the preceding annual period, and
 - (b) submit that Environmental Report to the CEO by 31 October each year.

Table 6: Annual Environmental Report

Condition or table (if relevant)	Requirement	Format or form ¹
-	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
Condition 8, Table 4	Brine outflow volume, conductivity, temperature, pH, turbidity, dissolved oxygen, oxygen reduction potential, ammonia, nitrate-nitrite, reactive phosphorus, cadmium, chromium, cobalt, copper, lead, mercury (inorganic), nickel, silver, vanadium, zinc	None specified
Condition 0, Table 5	Total Recoverable Hydrocarbons	None specified
Condition 9	Complaints summary	None specified
Condition 10	Compliance	None specified

14. The licence holder must ensure that the Annual Environmental Report also contains an assessment of the information contained within the report against previous monitoring results, Licence limits and any impacts detected as a result of activities on the Premises.
15. The licence holder must ensure that the parameters listed in Table 7 are notified to the CEO in accordance with the notification requirements of the table.

Table 7: Notification requirements

Condition or table (if relevant)	Parameter	Notification requirement ¹
Condition 4, Table 3 Condition 9, Table 5	Breach of any limit specified in the Licence	As soon as practicable but no later than 5pm of the next usual working day

Note 1: Notification requirements in the Licence must not negate the requirement to comply with s72 of the Act

Definitions

In this licence, the terms in Table 8 have the meanings defined.

Table 8: 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 01 July until 30 June of the immediately following 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 5667.9	means the Australian Standard AS/NZS 5667.9 <i>Water Quality – Sampling – Guidance on sampling from marine 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
Department	means the department established under section 35 of the <i>Public Sector Management Act 1994</i> (WA) 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</i> (WA)
EP Regulations	<i>Environmental Protection Regulations 1987</i> (WA)
freeboard	means the distance between the maximum water surface elevations and the top of retaining banks or structures at their lowest point
GL/a	means gigalitres per annum
licence	refers to this document, which evidences the grant of a licence by the CEO under section 57 of EP Act, subject to the conditions 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.
monthly period	means a one-month period commencing from the first calendar day of a month until the final calendar day of the same month.
mS/cm	means millisemens per centimeter
mV	means millivolts

Term	Definition
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
NTU	means Nephelometric Turbidity Units
OWS	means oil/water separator
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 in Schedule 1 to this licence.
prescribed premises	has the same meaning given to that term under the EP Act.
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.

END OF CONDITIONS

Schedule 1: Maps

Premises map

Premises map, map of containment infrastructure and emission points overview

The Premises is shown in the map below. The black dotted line depicts the Premises boundary.



Schedule 1: Maps

Monitoring Points

The locations of the infrastructure and monitoring points including Brine outfall and OWS1 as defined in Condition 2 Table 1, Condition 3 Table 2, Condition 4 Table 3, and Condition 8, Table 4 and Condition 9 Table 5 are shown below.

