



Licence

Licence number	L7910/2003/6
Licence holder	MacPhersons Resources Limited
ACN	139 357 967
Registered business address	109 Maritana St Kalgoorlie WA 6430
DWER file number	2012/006888
Duration	22/02/2021 to 10/10/2025
Date of amendment	20/01/2022
Premises details	Nimbus Silver-Zinc-Gold Project Mining tenement M26/490 and M26/598 KALGOORLIE WA 6430

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 annual period

This amended licence is granted to the licence holder, subject to the attached conditions, on 20 January 2022, by:

**A/MANAGER, RESOURCE INDUSTRIES
REGULATORY SERVICES**

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

Licence history

Date	Reference number	Summary of changes
18/02/2010	L7910/2003/3	Licence reissue
22/02/2013	L7910/2003/4	Licence reissue
13/02/2014	W5574/2013/1	Construction of a category 89 landfill
04/12/2014	W5726/2014/1	Construction of a new processing mill and TSF3
05/11/2015	L7910/2003/4	Conversion to new format, changes to monitoring conditions and early reissue
15/02/2016	L7910/2003/5	Licence reissue
19/03/2018	L7910/2003/5 Amendment Notice 1	Dates of annual period of licence amended to reflect financial year
18/02/2021	L7910/2003/6	Licence renewal. Converted to new format with administrative changes to remove redundancies. New condition added requiring notification of recommencement of ore processing activities.
20/01/2022	L7910/2003/6	DWER initiated amendment to extend the duration of the licence to 10 October 2025

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 shall ensure that all pipelines containing tailings, return water or saline water are either:
 - (a) equipped with telemetry systems and pressure sensors along pipelines to allow for the detection of leaks and failures; or
 - (b) equipped with automatic cut-outs in the event of a pipe failure; or
 - (c) provided with secondary containment sufficient to contain any spill for a period equal to the time between routine inspections.
2. The Licence holder shall ensure that tailings are only discharged into the vessels or compounds with the relevant infrastructure requirements and at the locations specified in Table 1 and identified in the map of storages in Schedule 1.

Table 1: Containment infrastructure

Storage vessel or compound	Material	Infrastructure requirements
TSF2	Tailings	Maintain a minimum vertical freeboard of 300 mm from the operational pond to lowest elevation of perimeter embankment.
Eastern pond	Saline dewater	Operate to avoid erosion of embankments from wave action.

3. The Licence holder shall:
 - (a) undertake inspections as detailed in Table 2;
 - (b) where any inspection identifies that an appropriate level of environmental protection is not being maintained, take corrective action to mitigate adverse environmental consequences as soon as practicable; and
 - (c) maintain a record of all inspections undertaken.

Table 2: Inspection of infrastructure

Scope of inspection	Type of inspection	Frequency of inspection ¹
Tailings pipelines	Visual integrity	Twice daily during operation of the plant and tailings storage facility'
Return water lines	Visual integrity	
Embankment freeboard	Visual to confirm required freeboard capacity is available	

Emissions and discharges

Fugitive emissions

4. The Licence holder must ensure fugitive emissions are managed in accordance with the documents, or parts of documents, specified in Table 3.

Table 3: Management plans

Management Plan Reference	Parts	Date of Document
Nimbus/Boorara Silver-Zinc-Gold Project –Mercury Management Plan	Section 6.9 – Dust Suppression	April 2019

Monitoring

General monitoring

5. The Licence holder shall ensure that:
 - (a) all water samples are collected and preserved in accordance with AS/NZS 5667.1;
 - (b) all groundwater sampling is conducted in accordance with AS/NZS 5667.11; and
 - (c) all laboratory samples are submitted to and tested by a laboratory with current NATA accreditation for the parameters being measured.
6. The Licence holder shall ensure that six monthly monitoring is undertaken at least 5 months apart.
7. 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.
8. 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.

Ambient environmental quality monitoring

9. The Licence holder shall undertake the monitoring in Table 4 according to the specifications in that table.

Table 4: Monitoring of ambient groundwater quality

Monitoring point reference and location	Parameter	Units	Averaging period	Frequency
HYD001	Standing water level ¹	mbgl	Spot sample	Six monthly
HYD002	pH ¹	N/A		
HYD003	Total Dissolved Solids	mg/L		
HYD004	Arsenic			
	Cadmium			
	Calcium			
	Chloride			
	Chromium			
	Copper			
	Iron			
	Lead			
	Magnesium			
	Manganese			
	Mercury			
	Nickel			
	Potassium			
	Sodium			
	Strontium			
	Zinc			
	Bicarbonate			
	Carbonate			
	Nitrate			
	Sulphate			
	WAD-CN			

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

Records and reporting

- 10.** The licence holder must, within 7 days of becoming aware of any non-compliance with condition 4 of this licence, notify the CEO in writing of that non-compliance and include in that notification the following information:

 - (a) which condition was not complied with;
 - (b) the time and date when the non-compliance occurred;
 - (c) if any environmental impact occurred as a result of the non-compliance and if so what that impact is and where the impact occurred;
 - (d) the details and result of any investigation undertaken into the cause of the non-compliance;
 - (e) what action has been taken and the date on which it was taken to prevent the non-compliance occurring again; and
 - (f) what action will be taken and the date by which it will be taken to prevent the non-compliance occurring again.
- 11.** 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.
- 12.** 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 no later than 60 days after the end of that annual period an Annual Audit Compliance Report in the approved form.
- 13.** 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 conditions 5, 7, 8 and 9 of this licence; and
 - (d) complaints received under condition 11 of this licence.

- 14.** The books specified under condition 13 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.
- 15.** The licence holder must submit to the CEO by no later than 60 days after the end of each annual period, an Annual Environmental Report for that annual period for the conditions listed in Table 5, and which provides information in accordance with the corresponding requirement set out in Table 5.

Table 5: Annual Environmental Report

Condition	Requirement
-	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
Table 4	Ambient groundwater quality monitoring
11	Complaints summary
16	Groundwater monitoring report

- 16.** The licence / works approval holder must submit to the CEO with the Annual Environmental Report required by condition 15, a groundwater monitoring report demonstrating compliance with conditions 5, 6, 7, 8 and 9 for the preceding annual period, and must include:
- (a) a clear statement of the scope of work carried out;
 - (b) a description of the field methodologies employed;
 - (c) a summary of the field and laboratory quality assurance / quality control (QA/QC) program;
 - (d) copies of the field monitoring records and field QA/QC documentation;
 - (e) an assessment of reliability of field procedures and laboratory results;
 - (f) a tabulated summary of results, as well as all raw data provided in an accompanying Microsoft Excel spreadsheet digital document/file (or a compatible equivalent digital document/file), with all results being clearly referenced to laboratory certificates of analysis;
 - (g) a diagram with aerial image overlay showing all monitoring locations and depicting groundwater level contours, flow direction and hydraulic gradient (relevant site features including discharge points and other potential sources of contamination must also be shown);
 - (h) an interpretive summary and assessment of the results against relevant assessment levels for water, as published in the Guideline Assessment and management of contaminated sites;
 - (i) an interpretive summary and assessment of results against previous monitoring results;

- (j) an interpretive summary and assessment of the results against relevant assessment levels for water, as published in the Guideline Assessment and management of contaminated sites; and
- (k) trend graphs to provide a graphical representation of historical results and to support the interpretive summary.

Note 1: General guidance on report presentation can be found in the Department's Guideline: Assessment and management of contaminated sites.

- 17.** The licence holder must notify the CEO six months in advance of recommencing activities under Category 5: processing or beneficiation of metallic or non-metallic ore at the Premises.

Definitions

In this licence, the terms in Table 6 have the meanings defined.

Table 6: 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 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 5667.11	means the Australian Standard AS/NZS 5667.11 <i>Water Quality – Sampling – Guidance on sampling of groundwaters</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
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</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)

Term	Definition
freeboard	means the distance between the maximum water surface elevations and the top of retaining banks or structures at their lowest point
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.
mbgl	means metres below ground level
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 in Schedule 1 (Figure 1) to this licence.
prescribed premises	has the same meaning given to that term under the EP Act.
six monthly	means the 2 inclusive periods from 1 April to 30 September and 1 October to 31 March in the following year
spot sample	means a discrete sample representative at the time and place at which the sample is taken
WAD-CN	means Weak Acid Dissociable Cyanide
waste	has the same meaning given to that term under the EP Act.

END OF CONDITIONS

Schedule 1: Maps

Premises map

The boundary of the prescribed premises is shown in the map below (Figure 1).



Figure 1: Map of the boundary of the prescribed premises

Map of monitoring locations

The locations of the monitoring points defined in Table 4 (Condition 9) are shown below (Figure 2).



Figure 2: Map of groundwater monitoring bores