# Licence

**Licence number** L8308/2008/3

**Licence holder** CITIC Pacific Mining Management Pty Ltd

**ACN** 119 578 371

**Registered business address** Level 7, 45 St Georges Terrace
PERTH WA 6000

**DWER file number** INS-0001508

**Duration** 01/06/2024 to 31/05/2044

**Date of amendment** 10/07/2025

**Premises details** Sino Iron Project Mine Site
Mining tenements M08/123, M08/124, M08/125, M08/264, M08/265, M08/266, G08/53, G08/54 and L08/126, MARDIE WA 6714

| **Prescribed premises category description (Schedule 1, *Environmental Protection Regulations 1987*)** | **Assessed production capacity** |
|---|---|
| Category 5: Processing or beneficiation of metallic or non-metallic ore | • Primary Crushers (1, 2, 3 and 4) 95,000,000 tonnes per annual period<br>• Concentrators (Mill Lines 1, 2, 3, 4, 5 and 6) 95,000,000 tonnes per annual period (producing 27,600,000 tonnes per annual period)<br>• Tailings Storage Facility (Stage 2) 67,400,000 tonnes per annual period |
| Category 6: Mine dewatering | 12,000,000 tonnes per annual period (12 gigalitres per annual period) |
| Category 12: Screening etc. of material | 2,700,000 tonnes per annual period |
| Category 52: Electric power generation | 480 megawatts |
| Category 54: Sewage facility | 160 cubic metres per day |
| Category 57: Used tyre storage (general) | No more than 500 tyres |
| Category 64: Class II putrescible landfill site | Landfill Facilities and Waste Rock Landforms 25,000 tonnes per annual period (excluding Clean Fill and Uncontaminated Fill used for cover material) |

This licence is granted to the licence holder, subject to the attached conditions, on 10 July 2025, by:

Jarrod Abrahams Digitally signed by Jarrod Abrahams
Date: 2025.07.10 12:38:40 +08'00'

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

# Licence history

| Date | Reference number | Summary of changes |
|---|---|---|
| 30/05/2014 | L8308/2008/2 | Licence renewed. |
| 24/03/2016 | L8308/2008/2 | Licence amended to increase the design capacity of category 5 (inclusion of PC3, PC4, ML2 to ML4 and TSF Stage 1) and category 64, inclusion of categories 12 and 57 and expansion of the premises boundary. |
| 28/07/2016 | L8308/2008/2 | Licence amended to increase the capacity of category 5 (inclusion of ML5 and 6). |
| 24/11/2016 | L8308/2008/2 | Licence amended to include category 6 mine dewatering discharge for 2 GL discharge. |
| 16/12/2016 | L8308/2008/2 | Amendment Notice 1<br>Licence amendment to change the date of completion for Improvement program IR1 from 31 December 2016 to 30 June 2018. |
| 09/06/2017 | L8308/2008/2 | Amendment Notice 2<br>Licence amendment to include controlled surface water discharge points, TSF1B lift and modifications to groundwater monitoring bores BH08-08 and BH08-16. |
| 11/08/2017 | L8308/2008/2 | Amendment Notice 3<br>Licence amendment to include the MBBR WWTP and transfer TSF Stage 2 construction conditions across from W4447/2008/1 onto the licence. |
| 12/01/2018 | L8308/2008/2 | Amendment Notice 4<br>Licence amendment to increase the category 6 design capacity from 2 GL/a to 8 GL/a. |
| 19/06/2018 | L8308/2008/2 | Amendment Notice 5<br>Licence amendment to change the date of completion for Improvement program IR1 from 30 June 2018 to 31 December 2018 and to allow for the disposal of other Inert Waste Type 2 (besides tyres) to be disposed of within sites landfill facility and waste rock landforms. |
| 06/11/2018 | L8308/2008/2 | Amendment Notice 6<br>Licence amendment to include a secondary emission point (AP1), to the current FR2 discharge point to the Fortescue River, on the existing dewatering pipelines to enable diversion of up to 6 GL/a of excess mine dewatering water to Pastoral Management Pty Ltd's algae ponds trial.<br>Relocation of current discharge location EC4 approximately 600 m upstream within the same remnant tributary of Edwards Creek, as the current discharge location is within the footprint for future TSF development.<br>Removal of Improvement program IR1 from the licence as point source air emissions have been confirmed.<br>Removal of Improvement program IR2 from the licence as replacement bore TSF_017 (17NC764) has been installed to replace BH08-16. |

| Date | Reference number | Summary of changes |
|---|---|---|
| 18/04/2019 | L8308/2008/2 | Amendment Notice 7<br>Licence amendment to include TSF Stage 2, Raise 3 up to 61 mRL.<br>Replacement of the pit dewatering staging ponds by constructing a HDPE lined dewatering staging facility to accommodate increased dewatering rates of up to 12GL/a permitted via Ministerial Statement 1066. A request to provide completion reports, for mine dewatering water discharges to the Fortescue River, in the Annual Environmental Report is also included. |
| 15/11/2019 | L8308/2008/2 | Amendment Notice 8<br>Licence amendment to:<br>• replace the third stage magnetic separator drums on ML6 with magnetic separation elutriation columns as a trial;<br>• relocate the laydown facility to the eastern side of the mine pit adjacent to the new mining operations/administration hub. This is outside of the future mine pit footprint; and<br>• include an interim landfill, which is proposed in the South East Waste Rock Landform. |
| 28/01/2020 | L8308/2008/2 | Amendment Report<br>Licence consolidated, with the following amendments:<br>• inclusion of tailings bypass pipeline;<br>• removal of Camp 123 WWTP; and<br>• disposal of inert waste to the TSF. |
| 01/02/2021 | L8308/2008/2 | Amendment Report<br>Licence amendment to increase the discharge of TSF decant and seepage waters from 1 GL/a to 2 GL/a via emission point DC2. During this amendment the licence was also updated to the current licensing format. |
| 23/03/2021 | L8308/2008/2 | Amendment Report<br>Licence amendment to include TSF2 Raise 4 up to 66 mRL (western embankment) and 70 mRL (eastern embankment); include bore 16NC750 for the TSF ambient groundwater monitoring; extension of the expiry date; and administrative updates. |
| 29/09/2021 | L8308/2008/2 | Amendment Report<br>Licence amendment to increase the mine dewatering discharge to the Fortescue River from 8 GL/a up to 12 GL/a, approved under Part IV. |
| 24/02/2022 | L8308/2008/2 | Amendment Report<br>Licence amendment for:<br>• extension of expiry date;<br>• reduced frequency CEMS RATA;<br>• decommissioning of the bulk fuel facility;<br>• disposal of waste within the North East Waste Rock Landform; and<br>• minor administrative changes. |

| Date | Reference number | Summary of changes |
|---|---|---|
| 30/05/2024 | L8308/2008/3 | Licence renewal granted with 20-year licence duration. |
| 10/07/2025 | L8308/2008/3 | Licence amendment for TSF2 to:<br>• change tailings deposition regime;<br>• supernatant pond relocation;<br>• construction of Y-shaped causeway connected to the southern embankment; and<br>• expansion of premises boundary to include G08/53. |

# 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 ensure that the site infrastructure and equipment listed in Table 1 and located at the corresponding infrastructure location is maintained and operated in accordance with the corresponding operational requirement set out in Table 1.

**Table 1: Infrastructure and equipment requirements**

| Site infrastructure and equipment | Operational requirement | Infrastructure location |
|---|---|---|
| TSF Stage Two | • 987 ha facility to a maximum height of:<br>- Western embankment 66 mRL; and<br>- Eastern embankment 70.5 mRL.<br>• Includes low permeability zones comprising highly weathered waste rock material along the upstream zone of the northern and the south-western embankments.<br>• Northern and western flanks include a liner system comprising of 2 mm thick textured Linear Low Density Polyethylene geomembrane underlain by a Geosynthetic Clay Liner installed on a compacted clayey material up to 39 mRL.<br>• Northern and western flanks include a liner system comprising of Elastomeric Bituminous Geomembrane Liner above 39 mRL up to 66 mRL.<br>• Tailings to be deposited from multiple discharge locations around the embankment perimeter.<br>• Tailings deposition rotated between discharge locations to keep the location of the decant pond at the centre of TSF2.<br>• Maintain an operational freeboard of 0.5 m.<br>• Maintain existing finger drains, seepage trenches / drains and pumps. | As shown in Schedule 1, Figure 1 |
| Process Water Dam | • Lined process water dam, which stores process water, return water from the TSF and treated wastewater from the Biomax WWTP and the MBBR WWTP prior to reuse (i.e. within the hoppers and mills). | |
| Camp 123 Turkey's nest | • Contain mine dewatering water.<br>• Lined with HDPE liner to meet a permeability of $<10^{-9}$ m/s.<br>• Maintain an operational freeboard of 0.5 m. | |
| Dewatering Staging Facility | • Contain mine dewatering water.<br>• Lined with HDPE liner to meet a permeability of $<10^{-9}$ m/s.<br>• Maintain an operational freeboard of 0.5 m. | |

**2.** The licence holder must ensure that the waste types specified in Table 2 are only subjected to the corresponding processes, subject to the corresponding process limits and/or specifications.

**Table 2: Waste processing**

| Waste type | Processes | Process limits and/or specifications[1,2] |
|---|---|---|
| Sewage | Biological, physical, and chemical treatment | • Biomax WWTP – 60 $m^3$/day.<br>• MBBR WWTP – 100 $m^3$/day.<br>• With disposal of treated effluent to the Process Water Dam prior to reuse of the wastewater within the Processing Plant. |
| All waste types (excluding Clean Fill and Uncontaminated Fill used for cover material) | Receipt, handling, and disposal of waste by landfilling or TSF disposal | No more than 25,000 tonnes per annual period of all waste types cumulatively shall be disposed of to the Landfill Facility, Waste Rock Landforms and to the TSF Stage Two shown in Schedule 1, Figure 1. |
| Inert Waste Type 1 | Receipt, handling, and disposal of waste by landfilling | • The active landfill area is managed such that at no time does landfilling result in an exposed face exceeding 2 m in vertical height.<br>• The separation distance between the base of the landfill and the highest groundwater level must not be less than 3 m.<br>• Maintain a minimum distance of at least 100 m between the previously filled areas of the landfill and the active tipping area and any surface water body.<br>• A fence or other physical barrier must be maintained around the active landfill area which is an effective barrier to cattle, horses, and stock.<br>• Undertake fortnightly inspections of the landfill fence or other physical barrier and ensure any damage to the fence is repaired within one working day of its discovery.<br>• Ensure that wind-blown waste is contained within the boundary of the landfill and that wind-blown waste is returned to the tipping area on at least a monthly basis.<br>• Ensure that no waste is burnt on the Premises.<br>• Ensure that any unauthorised fire at the landfill is promptly extinguished.<br><u>Non-green waste</u><br>• Tipping area is restricted to a maximum linear length of 30 m.<br><u>Special Waste Type 1</u><br>• Only to be disposed of into a designated asbestos disposal area within the landfill. |
| Inert Waste Type 2 | | |
| Special Waste Type 1 (cement bonded asbestos. No fibrous asbestos shall be accepted) | | |
| Special Waste Type 2 (waste consisting of certain types of biomedical waste which are regarded as hazardous but which, with the use of specific management techniques may be disposed of safely) | | |
| Clean Fill | | |
| Uncontaminated Fill | | |
| Contaminated Solid Waste (must meet the acceptance criteria for Class II landfills) | | |

| Waste type | Processes | Process limits and/or specifications[1,2] |
|---|---|---|
| Putrescible Waste | | • Not to be deposited within 2 m of the final tipping surface of the landfill.<br>• No works shall be carried out on the landfill that could lead to a release of asbestos fibers.<br><u>Special Waste Type 1 and Special Waste Type 2</u><br>• Material containing asbestos or clinical waste is disposed of at the landfill under the personal supervision of the licence holder or the personal supervision of a person nominated by the licence holder.<br>• Disposal of waste must only take place within TSF Stage Two shown in Schedule 1, Figure 1.<br>• No waste disposal should occur within the vicinity of the decant tower, northern and western lined embankments, or within the normal operating extent of the supernatant pond.<br>• Any pipes disposed of should be done so in a way to ensure they are filled with tailings.<br>• Details should be recorded of the location, surface elevation (RL), type and quantity of materials disposed of. |
| Other wastes (must comply with Class II criteria in the Landfill Definitions) | | |
| Inert Waste Type 1 and Inert Waste Type 2 (process consumables generated from within the TSF or Port Operations project areas) above<br><br>Disposal of waste must only take place within TSF Stage Two shown in Schedule 1, Figure 1 | | |
| Inert Waste Type 2 (tyres only) | Receipt, handling, and disposal of waste by landfilling | • Tyres must only be landfilled within the Landfill Facility, Waste Rock Landforms and TSF Stage Two shown in Schedule 1, Figure 1.<br>• Tyres must consist of batches of less than 100 whole tyres.<br>• Batches must be separated from each other by at least 100 mm of soil.<br>• The location of where tyres are buried will be surveyed and the latitude and longitude recorded. |
| Inert Waste Type 2 (Used tyres) | Storage | • Tyres must only be stored within the Used Tyre Laydown area shown in Schedule 1, Figure 1.<br>• Must only store a maximum of 500 tyres at any time. |

Note 1: Requirements for landfilling tyres are set out in Part 6 of the *Environmental Protection Regulations 1987*.
Note 2: Additional requirements for the acceptance and landfilling of controlled waste (including asbestos and tyres) are set out in the *Environmental Protection (Controlled Waste) Regulations 2004*.

**3.** The licence holder must ensure that cover is applied and maintained on landfilled waste types, with the exception of the TSF, in accordance with the corresponding cover requirements in Table 3 and that sufficient stockpiles or cover are maintained on the premises at all times.

**Table 3: Cover requirements**

| Waste Type[1] | Material | Depth | Timescales |
|---|---|---|---|
| Inert Waste Type 1 | No cover required. | | |
| Inert Waste Type 2 | Inert Waste Type 1 or soil | 100 mm | By the end of the working day in which the waste was deposited.<br>Plastic waste with the potential to become windblown must be covered as soon as practicable after deposit.<br>Tyre disposal: Within two (2) weeks of discontinuing each batch disposal location |
| | | 500 mm | As soon as practicable following the achievement of final waste levels in the area(s) where tyres and/or process consumables are disposed. |
| Special Waste Type 1 | | 300 mm | As soon as practicable after deposit and prior to compaction. |
| | | 300 mm | By the end of the working day in which the asbestos waste was deposited. |
| Special Waste Type 2 | | 300 mm | As soon as practicable after deposit and prior to compaction. |
| Putrescible Waste | | 300 mm | Fortnightly. |

Note 1: Additional requirements for the covering of tyres are set out in Part 6 of the *Environmental Protection Regulations 1987.*

**4.** The licence holder must manage the landfilling activities, with the exception of the TSF, to ensure:

(a) waste is levelled and compacted as soon as practicable after it is discharged and at a minimum of the end of the day;

(b) waste is placed and compacted to ensure all faces are stable and capable of retaining rehabilitation material; and

(c) rehabilitation of a cell or phase takes place within 6 months after disposal in that cell or phase has been completed.

**5.** The licence holder must manage the landfilling activities, with the exception of the TSF, to ensure:

(a) a supply of water, cover material and means of distribution of the water and cover material are available at all times to extinguish any fire on the premises;

(b) there is a stockpile of sufficient cover material to allow waste to be covered in accordance with condition 3 of this licence and to cover waste in the event of a fire;

(c) waste is totally covered, so that no waste is left exposed;

(d) except where trenches are used, waste is initially spread in layers not more than 500 mm thickness prior to being compacted with a minimum of 5 passes with the dedicated machine; and

(e) waste is covered with a final soil cover of at least 1 m.

**6.** The licence holder must ensure that standard vehicle refueling activities occur only on designated refueling areas at the premises.

**7.** The licence holder must ensure that sumps and bunds on the premises are maintained at all times and emptied prior to heavy rain or cyclonic weather.

**8.** The licence holder must prevent dust generation from the surface of the TSF.

**9.** The licence holder must:

(a) undertake inspections as detailed in Table 4;

(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 4: Inspection of infrastructure**

| Scope of inspection | Type of inspection | Frequency of inspection |
|---|---|---|
| Permanent tailings pipeline | Visual integrity | Daily while operational |
| Bypass tailings pipeline | | |
| Decant return water pipeline | | |
| Mine dewatering water pipeline | | |
| Seepage water discharge pipeline | | |

**10.** The licence holder must ensure that all pipelines containing tailings or tailings thickener overflow return water are operated with:

(a) telemetry and process alarm; and

(b) adequate diversion containment.

**11.** The licence holder must undertake an annual water balance for the TSF. The water balance must as a minimum consider the following:

(a) site rainfall;

(b) evaporation;

(c) combined decant water and seepage water recovery volumes; and

(d) volumes of tailings deposited.

**12.** The licence holder must construct the infrastructure listed in Table 5 in accordance with the corresponding design and construction requirements. The licence holder must not depart from the design and construction requirements specified in Table 5 except:

(a) where such departure is minor in nature and does not materially change or affect the infrastructure; or

(b) where such departure improves the functionality of the infrastructure and does not increase risks to public health, public amenity or the environment;

(c) and all other conditions in this licence are still satisfied.

**Table 5: Infrastructure requirements**

| Infrastructure | Design and construction requirements[1] |
|---|---|
| EC1 | • Discharge pipe to Edwards Creek located approximately 300 m north of the enviro dam to an existing rock armoured culvert that traverses the north-south infrastructure corridor.<br>• Layer of riprap installed at discharge point to protect the receiving water bank from erosion. |
| EC2 | • Discharge pipe to Edwards Creek to a rock armoured culvert that traverses the public Fortescue River Mouth access road.<br>• Layer of riprap installed at discharge point to protect the receiving water bank from erosion. |
| TSF2 | <u>Tailings deposition pipeline and spigots</u>:<br>• Pipework consisting of steel pipe up to the tailings distribution station, then HDPE pipes along the northern and western embankment of TSF2.<br>• Tailings deposition pipeline at the locations shown in Schedule 1, Figure 2.<br>• Bursting disc assembly installed on each tailings deposition pipeline.<br>• Each spigot equipped with a knife gate valve and a pinch valve. |
| | <u>Causeway construction</u>:<br>• Y-type causeway structure extended from the TSF2 southern embankment wall as shown in Schedule 1, Figures 3, 4 and 5.<br>• Three (3) floating decant systems (one for each of the two arms and one standby).<br>• Each pump intake equipped with a floating inlet. |

Note 1: Where the details and commitments of the documents listed in condition 12 are inconsistent with any other condition of this licence, the conditions of this licence shall prevail.

**13.** The licence holder must operate the infrastructure / equipment listed in Table 5 in accordance with the conditions of this licence, following submission of the compliance document required under condition 27.

## Emissions and discharges

### Authorised discharge points for emissions

**14.** The licence holder must ensure that the emissions specified in Table 6, are discharged only from the corresponding discharge point and only at the corresponding discharge point location.

**Table 6: Authorised discharge points – air emissions**

| Emission | Discharge point | Discharge point height (m) | Discharge point location |
|---|---|---|---|
| • Carbon monoxide<br>• Particulates<br>• Volatile Organic Carbons<br>• Oxides of nitrogen<br>• Sulphur oxides | GT1 – Bypass Stack | 29.85 m | As shown in Schedule 1, Figure 1 - 'GT1-B'. |
| | GT1 – Main Stack | 30.0 m | As shown in Schedule 1, Figure 1 - 'GT1'. |
| | GT2 – Bypass Stack | 29.85 m | As shown in Schedule 1, Figure 1 - 'GT2-B'. |
| | GT2 – Main Stack | 30.0 m | As shown in Schedule 1, Figure 1 - 'GT2'. |
| | GT3 – Bypass Stack | 29.85 m | As shown in Schedule 1, Figure 1 - 'GT3-B'. |
| | GT3 – Main Stack | 30.0 m | As shown in Schedule 1, Figure 1 - 'GT3'. |
| | GT4 – Bypass Stack | 29.85 m | As shown in Schedule 1, Figure 1 - 'GT4-B'. |
| | GT4 – Main Stack | 30.0 m | As shown in Schedule 1, Figure 1 - 'GT4'. |
| | GT5 – Bypass Stack | 29.85 m | As shown in Schedule 1, Figure 1 - 'GT5-B'. |
| | GT5 – Main Stack | 30.0 m | As shown in Schedule 1, Figure 1 - 'GT5'. |
| | GT6 – Bypass Stack | 29.85 m | As shown in Schedule 1, Figure 1 - 'GT6-B'. |
| | GT6 – Main Stack | 30.0 m | As shown in Schedule 1, Figure 1 - 'GT6'. |
| | GT7 – Main Stack | 29.85 m | As shown in Schedule 1, Figure 1 - 'GT7'. |

**15.** The licence holder must ensure that the emissions specified in Table 7, are discharged only from the corresponding discharge point and are subject to the corresponding operational requirements.

**Table 7: Authorised discharge points – surface water emissions**

| Emission | Discharge point | Operational requirements | Discharge point location |
|---|---|---|---|
| Mine dewatering water | Discharge pipe to Fortescue River Mouth | • Discharged through a diffuser.<br>• The diffuser must be submerged beneath the water.<br>• The diffuser must be offset approximately 25 m from the low water mark.<br>• Pipelines to be fitted with leak detection and flow meters';<br>• The discharge must be tidally aligned according to daily tidal analyses from measurements locations under the following conditions:<br>(a) discharge must only commence 60 minutes prior to the turning of the tide from incoming to outgoing; and<br>(b) discharge must cease 30 minutes prior to the turning of the tide from outgoing to incoming. | As shown in Schedule 1, Figure 1 - 'FR2'. |
| Stormwater and process water | Discharge pipe to Edwards Creek located approximately 300 m north of the enviro dam | Discharged in a controlled manner as a result of an uncontrollable event:<br>• Control the discharge rate so that erosion and scouring is minimised;<br>• Use multiple discharge points to spread the flow; and<br>• Maintain a layer of riprap to protect the receiving water bank from erosion. | As shown in Schedule 1, Figure 1 – 'EC1'. |
| | Discharge pipe to Edwards Creek | | As shown in Schedule 1, Figure 1 - 'EC2'. |
| | Discharge pipe to a tributary of Edwards Creek | | As shown in Schedule 1, Figure 1 - 'EC3'. |
| | Discharge pipe to a remnant tributary of Edwards Creek | | As shown in Schedule 1, Figure 1 - 'EC4'. |
| | Discharge pipe to a tributary of DuBoulay Creek | | As shown in Schedule 1, Figure 1 -- 'DC2'. |

| Emission | Discharge point | Operational requirements | Discharge point location |
|---|---|---|---|
| | with a width of 100 m | | |
| TSF decant and seepage water | Discharge pipe to a tributary of DuBoulay Creek with a width of 100 m | The pipeline is equipped with a flow meter. | As shown in Schedule 1, Figure 1 – 'DC2' |

## Emission limits

**16.** The licence holder must ensure that emissions from the discharge point listed in Table 8 for the corresponding parameter do not exceed the corresponding limit when monitored in accordance with condition 19.

**Table 8: Emission and discharge limits**

| Discharge point | Parameter | Limit (including units) |
|---|---|---|
| FR2 | Cumulative volume | 12 GL/a |
| | pH[1] | 6-9 pH units |
| | Temperature[1] | <65 $^{O}$C |
| | Total Dissolved Solids[1] | <70,000 mg/L |
| | Nitrate | <50 mg/L |
| | Cadmium | <0.1485 mg/L |
| | Chromium (VI) | <0.1188 mg/L |
| | Cobalt | <0.027 mg/L |
| | Copper | <0.0351 mg/L |
| | Lead | <0.1188 mg/L |
| | Mercury | <0.0108 mg/L |
| | Nickel | <1.89 mg/L |
| | Silver | <0.0378 mg/L |
| | Vanadium | <2.7 mg/L |
| | Zinc | <0.405 mg/L |
| | Total Recoverable Hydrocarbons | <15 mg/L |
| EC1<br>EC2<br>EC3<br>EC4 | pH[1] | 6.5-9 pH units |
| | Total Dissolved Solids[1] | <10,000 mg/L |
| DC2 | Cumulative volume | 2 GL/a |
| | pH[1] | 6.5-9 pH units |
| | Total Dissolved Solids[1] | <50,000 mg/L |

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

# Monitoring

## General monitoring

**17.** The licence holder must ensure that:

(a) monthly monitoring is undertaken at least 15 days apart;

(b) quarterly monitoring is undertaken at least 45 days apart; and

(c) six monthly monitoring is undertaken at least 5 months apart.

**18.** All sample analysis must be undertaken by laboratories with current accreditation from the National Association of Testing Authorities (NATA) for the relevant parameters, unless otherwise specified in conditions 19, 22 and 23.

## Discharge point monitoring

**19.** The licence holder must monitor emissions in accordance with the requirements specified in Table 9 and record the results of all such monitoring.

**Table 9: Emissions and discharges monitoring**

| Discharge point | Parameter | Units | Averaging period | Frequency | Method |
|---|---|---|---|---|---|
| **Emissions to air** | | | | | |
| GT1<br>GT1-B<br>GT2<br>GT2-B<br>GT3<br>GT3-B<br>GT4<br>GT4-B<br>GT5<br>GT5-B<br>GT6<br>GT6-B<br>GT7 | Nitrogen oxides | ppmv[1] | 10 minutes | Continuous during operation[2] | CEMS |
| | Carbon monoxide | | | | |
| **Emissions to surface water** | | | | | |
| FR2 – monitoring conducted in-pipe from a sampling tap | Volumetric flow rate | $m^3$/day | Annual | Daily | AS/NZS 5667.6 |
| | pH[3] | pH units | Spot sample | Monthly | AS/NZS 5667.1<br>AS/NZS 5667.6 |
| | Temperature[3] | °C | | | |
| | Electrical Conductivity[3] | µS/cm | | | |
| | Dissolved Oxygen[3] | mg/L | | | |
| | Total Dissolved Solids | | | | |
| | Total Suspended Solids | | | | |

| Discharge point | Parameter | Units | Averaging period | Frequency | Method |
|---|---|---|---|---|---|
| | Total Nitrogen | | | | |
| | Bioavailable Nitrogen | | | | |
| | Nitrate | | | | |
| | Ammonia | | | | |
| | Total Phosphorus | | | | |
| | Bioavailable Phosphorus | | | | |
| | Bioavailable Organic Carbon | | | | |
| | Chlorophyll a | | | | |
| | Aluminium | | | | |
| | Arsenic | | | | |
| | Boron | | | | |
| | Cadmium | | | | |
| | Chromium (III) | | | | |
| | Chromium (VI) | | | | |
| | Cobalt | | | | |
| | Copper | | | | |
| | Iron | | | | |
| | Lead | | | | |
| | Mercury | | | | |
| | Manganese | | | | |
| | Nickel | | | | |
| | Selenium | | | | |
| | Silver | | | | |
| | Strontium | | | | |
| | Vanadium | | | | |
| | Zinc | | | | |
| | Total Recoverable Hydrocarbons | | | | |
| Camp 123 Turkey's nest or Dewatering Staging Facility | pH[3] | pH units | Spot sample | Monthly | AS/NZS 5667.1 AS/NZS 5667.10 |
| | Temperature[3] | $^{o}C$ | | | |
| | Electrical Conductivity[3] | µS/cm | | | |
| | Dissolved Oxygen[3] | mg/L | | | |
| | Total Dissolved Solids | | | | |
| | Total Suspended Solids | | | | |
| | Total Nitrogen | | | | |

| Discharge point | Parameter | Units | Averaging period | Frequency | Method |
|---|---|---|---|---|---|
| | Bioavailable Nitrogen | | | | |
| | Nitrate | | | | |
| | Ammonia | | | | |
| | Total Phosphorus | | | | |
| | Bioavailable Phosphorus | | | | |
| | Bioavailable Organic Carbon | | | | |
| | Chlorophyll a | | | | |
| | Aluminium | | | | |
| | Arsenic | | | | |
| | Boron | | | | |
| | Cadmium | | | | |
| | Chromium (III) | | | | |
| | Chromium (VI) | | | | |
| | Cobalt | | | | |
| | Copper | | | | |
| | Iron | | | | |
| | Lead | | | | |
| | Mercury | | | | |
| | Manganese | | | | |
| | Nickel | | | | |
| | Selenium | | | | |
| | Silver | | | | |
| | Strontium | | | | |
| | Vanadium | | | | |
| | Zinc | | | | |
| | Total Recoverable Hydrocarbons | | | | |
| (Stormwater and/or Process Water)<br>EC1<br>EC2<br>EC3<br>EC4<br>DC2 | pH[3] | pH units | Spot sample | Prior to discharge | AS/NZS 5667.1<br>AS/NZS 5667.6 |
| | Total Dissolved Solids[3] | mg/L | | | |
| (TSF decant and seepage | Volumetric flow rate | $m^3$/day | Annual | Monthly | AS/NZS 5667.6 |
| | Oxidation Reduction | mV | Spot | Quarterly | AS/NZS 5667.1 |

| Discharge point | Parameter | Units | Averaging period | Frequency | Method |
|---|---|---|---|---|---|
| water)<br><br>DC2 in-pipe (or if discharges are not occurring at the time of sampling, samples can be collected directly from the TSF seepage sump)<br><br>500 m downstream of DC2 where it is safe to do so) | Potential[3] | | sample | | AS/NZS 5667.6 |
| | pH[3] | pH units | | | |
| | Temperature[3] | $^{o}C$ | | | |
| | Dissolved Oxygen[3] | mg/L | | | |
| | Electrical Conductivity[3] | µS/cm | | | |
| | Total Dissolved Solids | mg/L | | | |
| | Acrylamide | | | | |
| | Total Nitrogen | | | | |
| | Nitrate as N | | | | |
| | Nitrite as N | | | | |
| | Ammonia | | | | |
| | Calcium | | | | |
| | Chloride | | | | |
| | Potassium | | | | |
| | Magnesium | | | | |
| | Sodium | | | | |
| | Sulfate ($SO_4^{2-}$) | | | | |
| | Total Alkalinity | | | | |
| | Total Sulfur | | | | |
| | Bicarbonate ($HCO_3^-$) | | | | |
| | Carbonate ($CO_3^{2-}$) | | | | |
| | Aluminium | | | | |
| | Cadmium | | | | |
| | Chromium (hexavalent) | | | | |
| | Cobalt | | | | |
| | Copper | | | | |
| | Iron | | | | |
| | Lead | | | | |
| | Manganese | | | | |
| | Mercury | | | | |
| | Nickel | | | | |
| | Zinc | | | | |

Note 1: All units are referenced to STP dry at 15% $O_2$.
Note 2: Monitoring shall be undertaken to reflect normal operating conditions and any limits or conditions on inputs or production.
Note 3: In-field non-NATA accredited analysis permitted.

**20.** When utilising CEMS to monitor emissions pursuant to condition 19, the licence holder must ensure that:

(a) the CEMS is regularly operated, maintained and calibrated in accordance with the CEMS Code; and

(b) a minimum of one RATA and three CGA; or two RATA and two CGA shall be conducted per annual period.

**21.** The licence holder must record the commencement and cessation date and time for each discharge of mine dewatering from FR2 against local tidal data from the measurement locations.

### Waste input monitoring

**22.** The licence holder must record the total amount of waste accepted onto the premises, for each waste type listed in Table 10, in the corresponding unit, and for each corresponding time period, as set out in Table 10.

**Table 10: Waste input monitoring**

| Waste type | Units | Time period |
|---|---|---|
| • Inert Waste Type 1;<br>• Inert Waste Type 2;<br>• Special Waste Type 1;<br>• Special Waste Type 2;<br>• Clean Fill;<br>• Uncontaminated Fill;<br>• Putrescible Waste;<br>• Contaminated Solid Waste and<br>• Other wastes | Tonnes (where a weighbridge is present); or $m^3$ (where no weighbridge is present) | Monthly Estimate |

### Process monitoring

**23.** The licence holder must undertake the monitoring in Table 11 in accordance with the requirements specified in Table 11and record and investigate results that do not meet any limit specified.

**Table 11: Process monitoring**

| Monitoring point reference as depicted in Schedule 1, Figure 1 | Process description | Parameter | Limit | Units | Frequency | Method |
|---|---|---|---|---|---|---|
| OWS1 | Final effluent Tank OWS1 (Heavy Mobile Equipment Workshop) used for dust suppression onsite | Total Recoverable Hydrocarbons | 15 | mg/L | Quarterly where wastewater is available | None specified |
| OWS3 | Final effluent Tank OWS3 (Supply Base) used for dust suppression onsite | Total Recoverable Hydrocarbons | 15 | mg/L | | |
| TSF Stage Two | - | Combined decant water and seepage water recovery volumes | - | $m^3$ | Cumulative monthly total | |
| | - | Volume of tailings deposited | - | $m^3$ | | |
| | - | Volume of TSF decant water and seepage water disposed of into DC2 | - | $m^3$ | | |
| WWTP | Final treated effluent tank of the Biomax WWTP and the MBBR WWTP Treated effluent is stored in the process water dam, prior to recirculating it in the process plant for use in the hoppers and mills | pH[1] | - | pH units | Quarterly | |
| | | Biochemical Oxygen Demand | - | mg/L | | |
| | | Total Suspended Solids | - | mg/L | | |
| | | *E.coli* | - | cfu/100mL | | |
| | | Total Nitrogen | - | mg/L | | |
| | | Total Phosphorus | - | mg/L | | |

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

## Ambient monitoring

**24.** The licence holder must monitor the groundwater and surface water for concentrations of the parameters in accordance with Table 12.

**Table 12: Monitoring of ambient concentrations**

| Monitoring location as depicted in Schedule 1, Figure 1 | Parameter | Units | Averaging period | Frequency | Method |
|---|---|---|---|---|---|
| **Groundwater** | | | | | |
| • TSF_001<br>• BH08-06 (09DD598)<br>• BH08-07 (09DD599)<br>• TSF_009<br>• BH08-9 (09DD602)<br>• TSF_002<br>• TSF_017 (17NC764)<br>• 07WB002 (07NC256)<br>• 16NC750 | Standing Water Level[2] | mbgl | Spot sample | Monthly | AS/NZS 5667.1<br>AS/NZS 5667.11 |
| | Oxidation Reduction Potential[1] | mV | Spot sample | Quarterly | |
| | pH[1] | pH units | | | |
| | Dissolved Oxygen[1] | mg/L | | | |
| | Temperature[1] | $^{o}C$ | | | |
| | Electrical Conductivity[1] | µS/cm | | | |
| | Total Dissolved Solids | mg/L | | | |
| | Acrylamide | | | | |
| | Total Nitrogen | | | | |
| | Nitrate as N | | | | |
| | Nitrite as N | | | | |
| | Ammonia | | | | |
| | Total Sulfur | | | | |
| | Calcium | | | | |
| | Sodium | | | | |
| | Total Alkalinity | | | | |
| | Chloride | | | | |
| | Magnesium | | | | |
| | Potassium | | | | |
| | Sulfate ($SO_4^{2-}$) | | | | |
| | Bicarbonate (HCO3-) | | | | |
| | Carbonate ($CO_3^{2-}$) | | | | |
| | Aluminium | mg/L | Spot sample | Six monthly | AS/NZS 5667.1<br>AS/NZS 5667.11 |
| | Lead | | | | |
| | Mercury | | | | |
| | Copper | | | | |
| | Chromium | | | | |

| Monitoring location as depicted in Schedule 1, Figure 1 | Parameter | Units | Averaging period | Frequency | Method |
|---|---|---|---|---|---|
| | (hexavalent) | | | | |
| | Nickel | | | | |
| | Zinc | | | | |
| | Cadmium | | | | |
| | Cobalt | | | | |
| | Iron | | | | |
| | Manganese | | | | |
| **Surface water** | | | | | |
| • FR1 (1 km downstream of discharge point)<br>• FR2 (discharge point)<br>• FR3 (1 km upstream of discharge point)<br>• FR4 (18 m upstream of discharge point)<br>• FR5 (18 m downstream of discharge point) | pH[1] | pH units | Spot sample | Monthly | AS/NZS 5667.1<br>AS/NZS 5667.6 |
| | Temperature[1] | $^{o}$C | | | |
| | Dissolved Oxygen[1] | mg/L | | | |
| | Electrical Conductivity[1] | µS/cm | | | |
| | Total Dissolved Solids | mg/L | | | |
| | Total Suspended Solids | | | | |
| | Total Nitrogen | | | | |
| | Bioavailable Nitrogen | | | | |
| | Nitrate | | | | |
| | Ammonia | | | | |
| | Total Phosphorus | | | | |
| | Bioavailable Phosphorus | | | | |
| | Bioavailable Organic Carbon | | | | |
| | Chlorophyll a | | | | |
| | Aluminium | | | | |
| | Arsenic | | | | |
| | Boron | | | | |
| | Cadmium | | | | |
| | Chromium (III) | | | | |
| | Chromium (VI) | | | | |
| | Cobalt | | | | |
| | Copper | | | | |
| | Iron | | | | |
| | Lead | | | | |
| | Mercury | | | | |
| | Manganese | | | | |

| Monitoring location as depicted in Schedule 1, Figure 1 | Parameter | Units | Averaging period | Frequency | Method |
|---|---|---|---|---|---|
| | Nickel | | | | |
| | Selenium | | | | |
| | Silver | | | | |
| | Strontium | | | | |
| | Vanadium | | | | |
| | Zinc | | | | |
| | Total Recoverable Hydrocarbons | | | | |
| 500 m downstream of the discharge points:<br>EC1 (ambient)<br>EC2 (ambient)<br>EC3 (ambient)<br>EC4 (ambient)<br>DC2 (ambient) | pH[1] | pH units | Spot sample | During the discharge where it is safe to do so | AS/NZS 5667.1<br>AS/NZS 5667.6 |
| | Total Dissolved Solids[1] | mg/L | | In the event that it is not safe to do so, comparison should be made to historic data with reason justified | |

Note 1: In-field non-NATA accredited analysis permitted.
Note 2: Standing Water Level should be determined prior to collection of other water samples.

**25.** The licence holder must conduct a vegetation monitoring program in accordance with the requirements specified in Table 13 and record the results of all monitoring activity conducted under the program.

**Table 13: Monitoring of ambient vegetation health**

| Monitoring location as depicted in Schedule 1, Figure 1 | Parameter | Averaging period | Frequency |
|---|---|---|---|
| FR2 (discharge point) | Visually estimate the average foliage cover | Visual inspection | Annually |
| | Score the health condition | | |
| | General environmental description of the site and record any changes since previous monitoring | | |
| | Take replicate photographs of foliage density and shadow areas beneath trees. | | |

| Monitoring location as depicted in Schedule 1, Figure 1 | Parameter | Averaging period | Frequency |
|---|---|---|---|
| Areas of stream discharge:<br>EC1<br>EC2<br>EC3<br>EC4<br>DC2 | Signs of stress on native flora and fauna | Visual inspection | Within three months of discharge |

## Records and reporting

**26.** 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.

**27.** The licence holder must within 60 days of each item of infrastructure required by condition 12 being constructed:

(a) undertake an audit of their compliance with the requirements of condition 12; and

(b) prepare and submit to the CEO an audit report on that compliance.

**28.** The report required by condition 27, must:

(a) be certified by a suitably qualified engineer and certify that the works were constructed in accordance with the construction requirements specified in condition 12;

(b) provide a list of departures from the specified works certified by a suitably qualified engineer; and

(c) be signed by a person authorised to represent the licence holder and contain the printed name and position of that person within the company.

**29.** The licence holder must within 14 days notify the CEO of an unauthorised fire at the Landfill Facility, South East Waste Rock Landform and North East Waste Rock Landform.

**30.** 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 an Annual Audit Compliance Report for that period in the approved form by 28 October each year.

**31.** The licence holder must:

(a) prepare an Environmental Report that provides information in accordance with Table 14 for the preceding annual period; and

(b) submit that Environmental Report to the CEO by 28 October each year.

**Table 14: Environmental reporting requirements**

| Condition | Requirement |
|---|---|
| 11 | Annual water balance for the TSF |
| 19 | Emissions to air<br>CEMS results as tabulated data and time series graphs including:<br>(a) times and dates; and<br>(b) an assessment of the information contained within the report against previous monitoring results and/or background data. |
| 19 | Emissions to surface water<br>The results to be provided to the CEO must include, but need not be limited to the following:<br>(a) the dates at which monitoring was undertaken for each location;<br>(b) the raw monitoring data from each location, for each parameter in a tabulated form; and<br>(c) an interpretation of monitoring data results including a comparison to previous monitoring results, licence limits and any impacts detected as a result of activities on the premises. |
| 21 | Discharge commencement and cessation date and times recorded, along with tidal data from measurement locations. |
| 22 | Tabulated waste input data including a discussion of options for stabilising and/or reducing the amount of waste to landfills. |
| 23 | Tabulated process monitoring data including a summary of the data including a comparison to previous monitoring results, licence limits and any impacts detected as a result of activities on the premises. |
| 24 | The results to be provided to the CEO must include, but need not be limited to the following:<br>(a) the dates at which monitoring was undertaken for each location;<br>(b) the raw monitoring data from each location, for each parameter in a tabulated form; and<br>(c) an interpretation of monitoring data results including a comparison to previous and/or baseline monitoring results and any impacts detected as a result of activities on the premises.<br>The data obtained for the increase in mine dewatering discharge (FR2) up to 8 GL/a during discharge to obtain dilution data and to verify dilution modelling, including a comparison against the initial modelling. |

| Condition | Requirement |
|---|---|
| 25 | Ambient vegetation health monitoring report to include:<br>(a) aerial image review – transects;<br>(b) visual inspection forms which estimate the average foliage cover; score the health condition and provide a general environmental description of the site and record any changes since previous monitoring;<br>(c) replicate photographs of foliage density and shadow areas beneath trees; and<br>(d) signs of stress on native flora and fauna at areas of stream discharge: EC1, EC2, EC3, EC4, and DC2. |
| 26 | Complaints summary |
| - | 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. |

**32.** 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) the works conducted in accordance with condition 12 of this licence;

(c) any maintenance of infrastructure that is performed in the course of complying with condition 1 of this licence;

(d) monitoring programmes undertaken in accordance with conditions 19, 22, 23, 24 and 25 of this licence; and

(e) complaints received under condition 26 of this licence.

**33.** The books specified under condition 32 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.

# Definitions

In this licence, the terms in Table 15 have the meanings defined.

**Table 15: 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 are available on the Department's website). |
| annual period | a 12 month period commencing from 1 July until 30 June of the immediately following year. |
| asbestos | means the asbestiform variety of mineral silicates belonging to the serpentine or amphibole groups of rock-forming minerals and includes actinolite, amosite, anthophyllite, chrysolite, crocidolite, tremolite and any mixture containing 2 or more of those. |
| asbestos fibres | has the meaning defined in the Guidelines for the Assessment, Remediation and Management of Asbestos-Contaminated Sites in Western Australia (Department of Health 2009). |
| AS/NZS 5667.1 | means the Australian Standard AS/NZS 5667.1 Water Quality – Sampling – Guidance of the Design of sampling programs, sampling techniques and the preservation and handling of samples. |
| AS/NZS 5667.6 | means the Australian Standard AS/NZS 5667.6 Water Quality – Sampling – Guidance on sampling of rivers and streams. |
| AS/NZS 5667.10 | means the Australian Standard AS/NZS 5667.10 Water Quality – Sampling – Guidance on sampling of waste waters. |
| AS/NZS 5667.11 | means the Australian Standard AS/NZS 5667.11 Water Quality – Sampling – Guidance on sampling of groundwaters. |
| 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. |
| CEMS | means continuous emissions monitoring system. |
| CEMS Code | means the current version of the Continuous Emission Monitoring System (CEMS) Code for Stationary Source Air Emissions, Department of Environment Regulation, Government of Western Australia. |

| Term | Definition |
|---|---|
| CEO | means Chief Executive Officer of the department.<br>"submit to / notify the CEO" (or similar), means either:<br>Director General<br>Department administering the *Environmental Protection Act 1986*<br>Locked Bag 10<br>Joondalup DC WA 6919<br>or:<br>info@dwer.wa.gov.au |
| cfu/100mL | means colony forming units per 100 millilitres. |
| CGA | means Cylinder Gas Audit as defined in the CEMS Code. |
| Clean Fill | has the meaning defined in Landfill Definitions. |
| Concentrator Facility | means six mill lines, concentrate thickeners, concentrate pumping infrastructure, process water containment infrastructure, process water pumping infrastructure, and any associated equipment. |
| Contaminated solid waste | has the meaning defined in Landfill Definitions. |
| controlled waste | has the definition in *Environmental Protection (Controlled Waste) Regulations 2004.* |
| department; DWER | means the department established under section 35 of the *Public Sector Management Act 1994* (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 | *Environmental Protection Act 1986* (WA). |
| EP Regulations | *Environmental Protection Regulations 1987* (WA). |
| GL/a | means gigalitres per annum. |
| HDPE | high density polyethylene. |
| 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 (as amended 2019)" published by the Chief Executive Officer of the Department of Water and Environmental Regulation 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. |

| Term | Definition |
|---|---|
| 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. |
| Mill Line | means a pebble crushing / grinding circuit, primary autogenous (ag) mill, first stage magnetic separator, secondary ball mill, second stage magnetic separator, elutriation column and any associated equipment. |
| MBBR | means moving bed bio-reactor. |
| mbgl | means metres below ground level. |
| measurement locations | means tidal data collected from the CITIC Tug Pen and CITIC MOF Wharf and Australian Hydrographic Service site Fortescue Road. |
| 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. |
| mRL | means metres Reduced Level. |
| mV | means millivolts. |
| operational freeboard | means the vertical height between the lowest elevation of the dam wall and the tailings beach immediately inside the dam wall. |
| 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. |
| OWS | means oily water separator. |
| Power Station | means three turbine units, each turbine unit consisting of two gas turbine generators (GT1-6) with two heat recovery steam generators and steam turbine attached and any associated equipment, a standalone gas turbine (GT7), seven CEMS, three cooling towers, a water treatment plant, gas conditioning system, a settling pond (HDPE lined), black start generators, a diesel storage tank, and any associated equipment. |
| Primary Crushing Facility | means four in-pit primary crushers, two in-pit overland conveyors, coarse ore stockpile and any associated equipment. |
| ppmv | means parts per million by volume. |
| 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 | has the meaning defined in Landfill Definitions. |

| Term | Definition |
|---|---|
| Quarterly | means the 4 inclusive periods from 1 July to 30 September, 1 October to 31 December and in the following year, 1 January to 31 March and 1 April to 30 June. |
| RATA | means Relative Accuracy Test Audit as defined in the CEMS Code. |
| Rehabilitation | means the completion of the engineering of a landfill cell and includes capping and/or final cover. |
| Six monthly | means the 2 inclusive periods from 1 July to 31 December and 1 January to 30 June in the following year. |
| Special Waste Type 1 | has the meaning defined in Landfill Definitions. |
| Special Waste Type 2 | has the meaning defined in Landfill Definitions. |
| Spot sample | means a discrete sample representative at the time and place at which the sample is taken. |
| STP dry | means standard temperature and pressure ($0^{o}$Celsius and 101.325 kilopascals respectively), dry. |
| TSF | means Tailings Storage Facility. |
| TSF Stage 2 | means Tailings Storage Facility Stage 2 (66mRL), primary & secondary tailings thickeners, primary & bypass tailings discharge pipelines, seepage containment infrastructure (inc seepage collection pond), seepage pumping & discharge infrastructure, decant return water containment infrastructure (inc decant return staging pond), decant return water pumping infrastructure, tailings seepage management bores, emergency tailings containment infrastructure and any associated equipment. |
| Uncontaminated Fill | has the meaning defined in Landfill Definitions. |
| µS/cm | means micro-Siemens per centimetre. |
| waste | has the same meaning given to that term under the EP Act. |
| WWTP | means wastewater treatment plant. |

**END OF CONDITIONS**

# Schedule 1: Maps

## Premises map

**The boundary of the prescribed premises, facilities locations and emissions/discharges points are shown in the map below (Figure 1).**

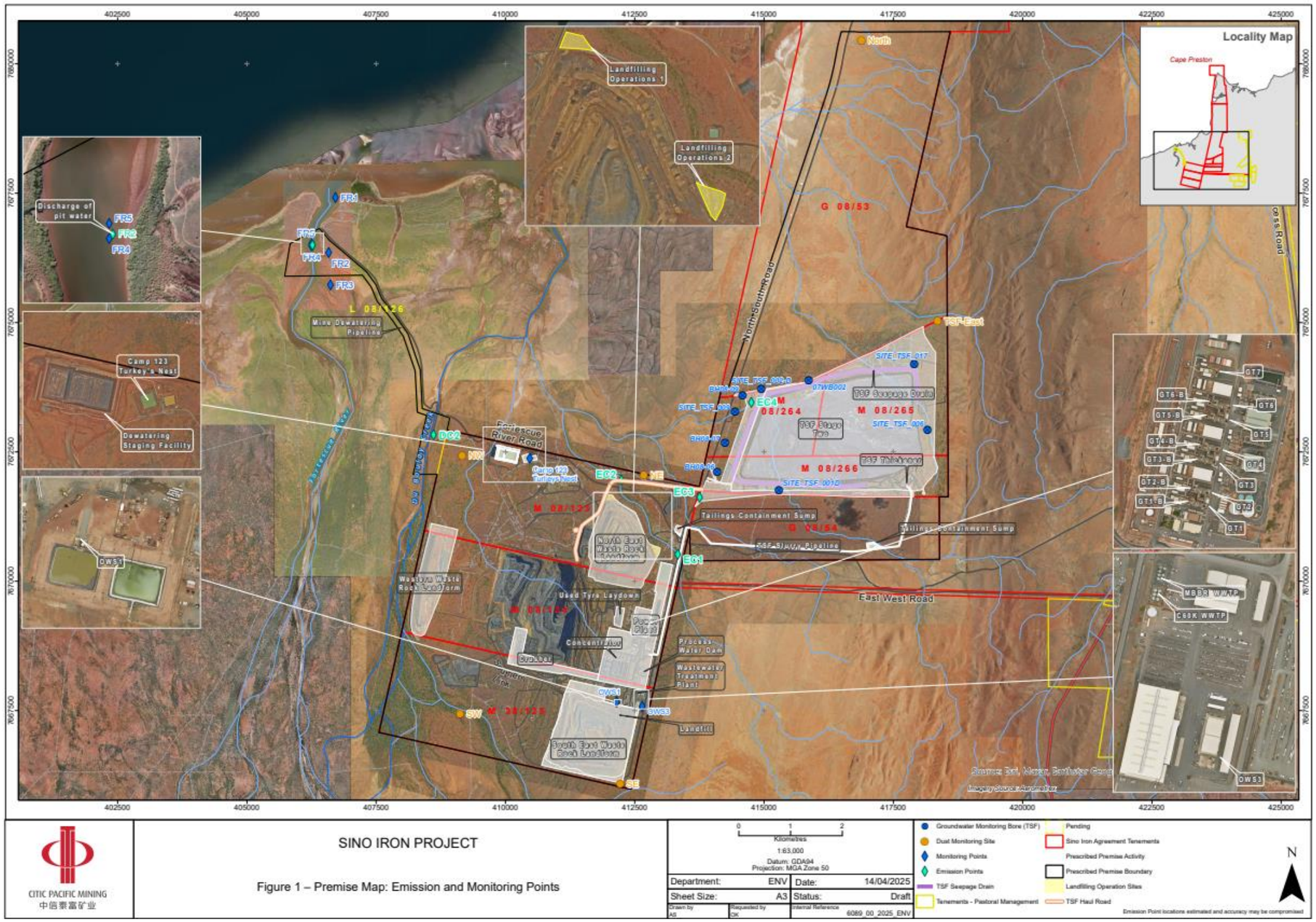


**Figure 1: Map of the boundary of the prescribed premises**

## Infrastructure

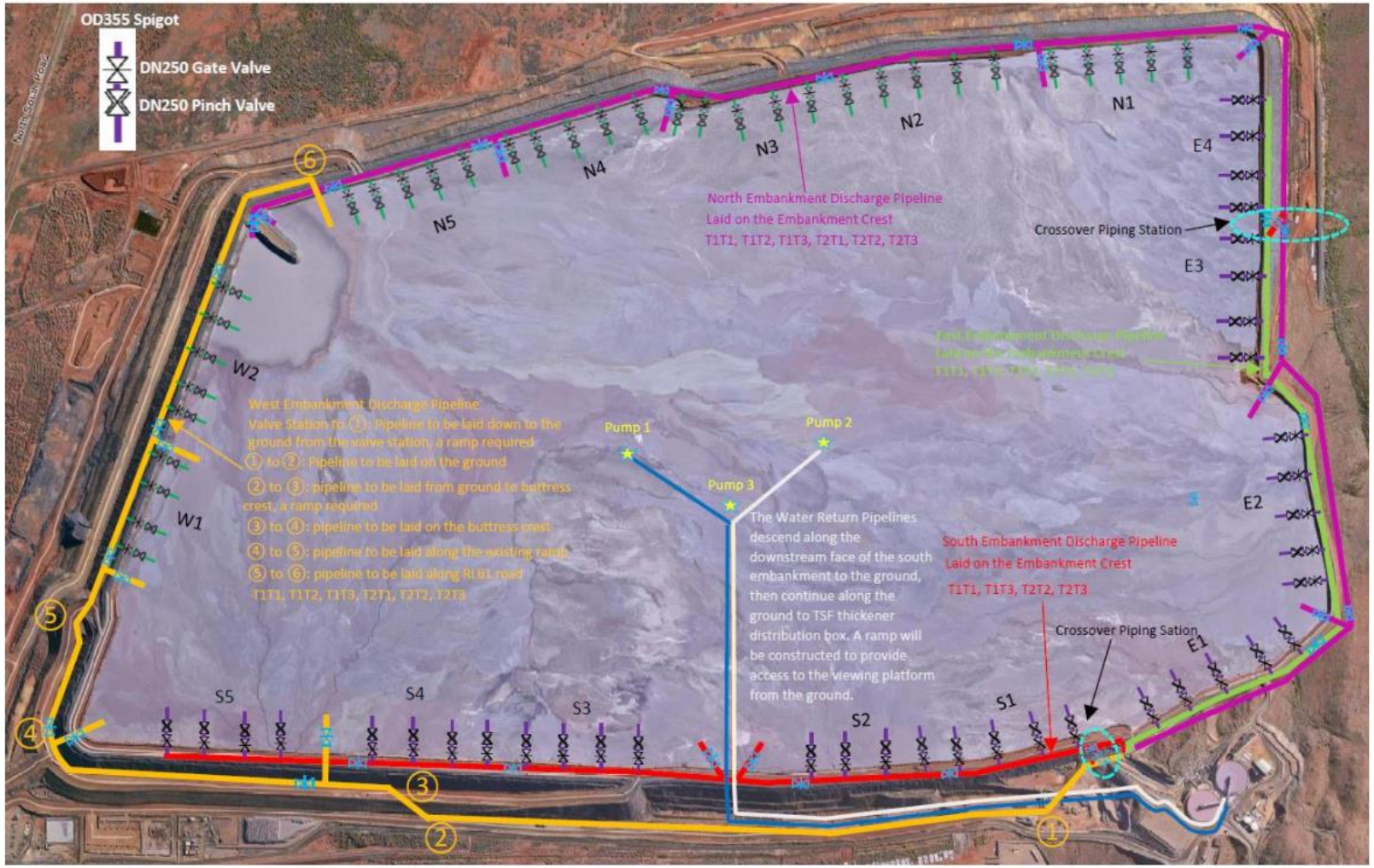


**Figure 2: TSF2 Decant Return and Perimeter Tailings Pipelines**

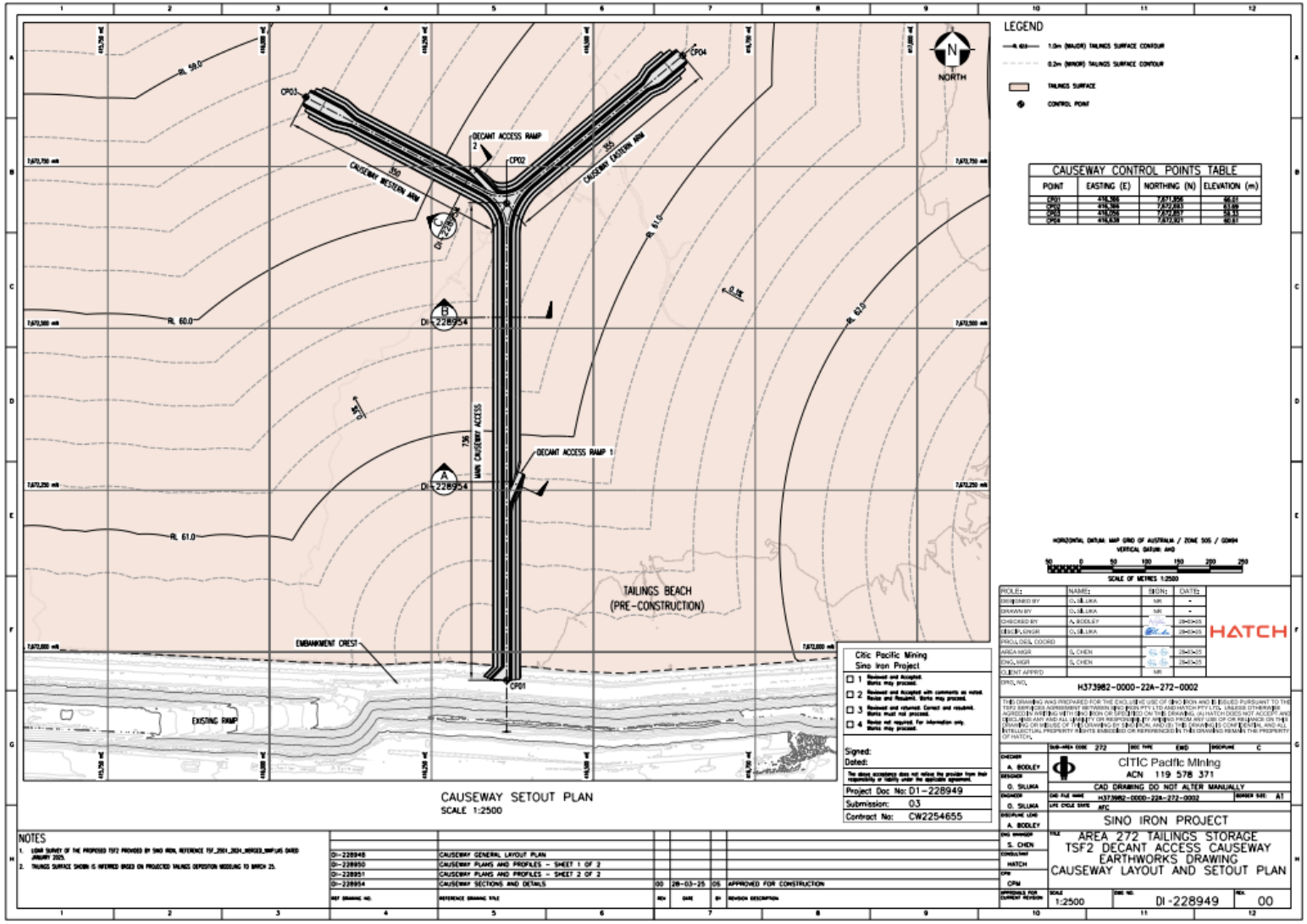


**Figure 3:TSF2 Causeway Layout and Setout Plan**

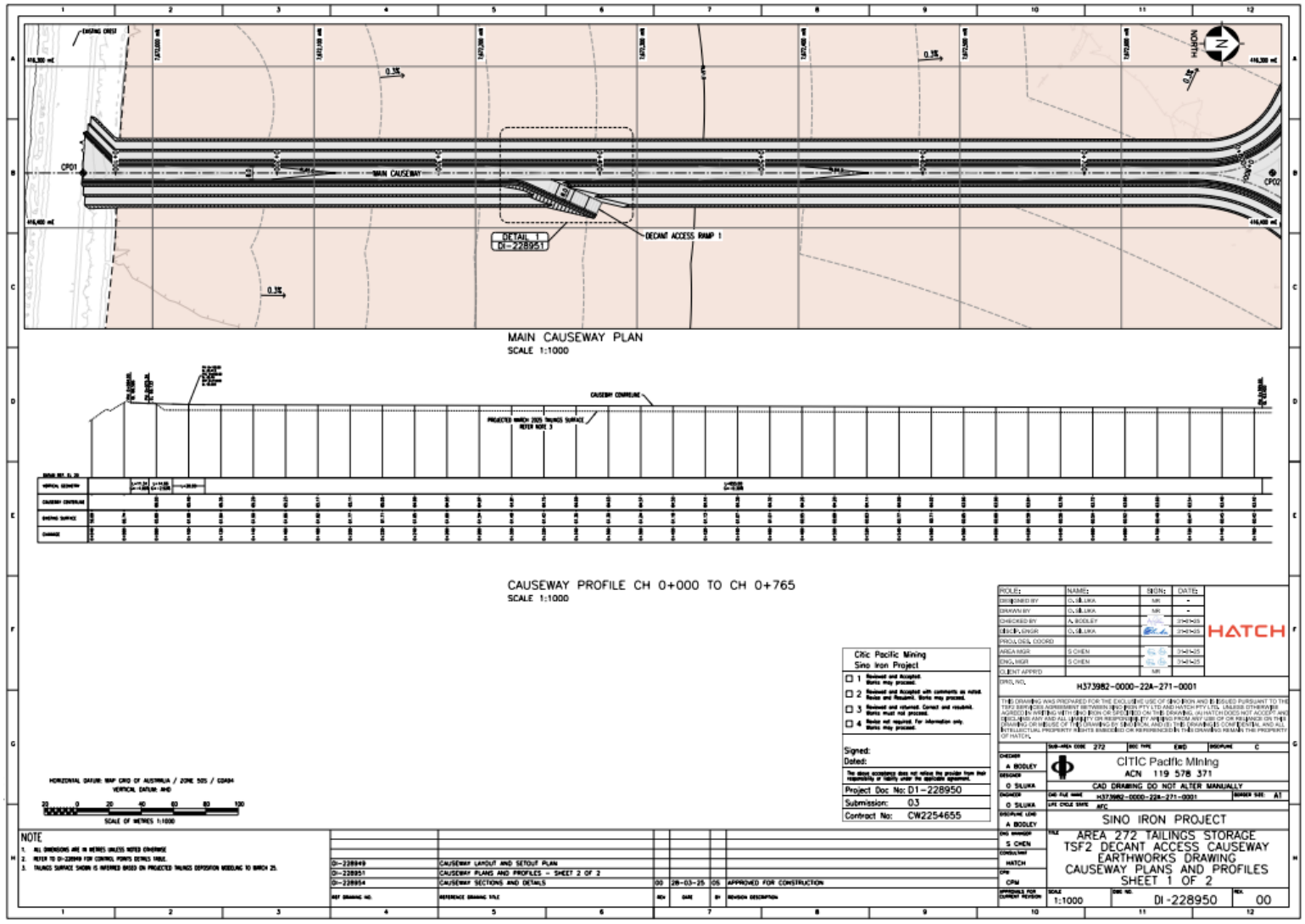


**Figure 4: TSF2 Causeway Plans and Profiles – Sheet 1 of 2**

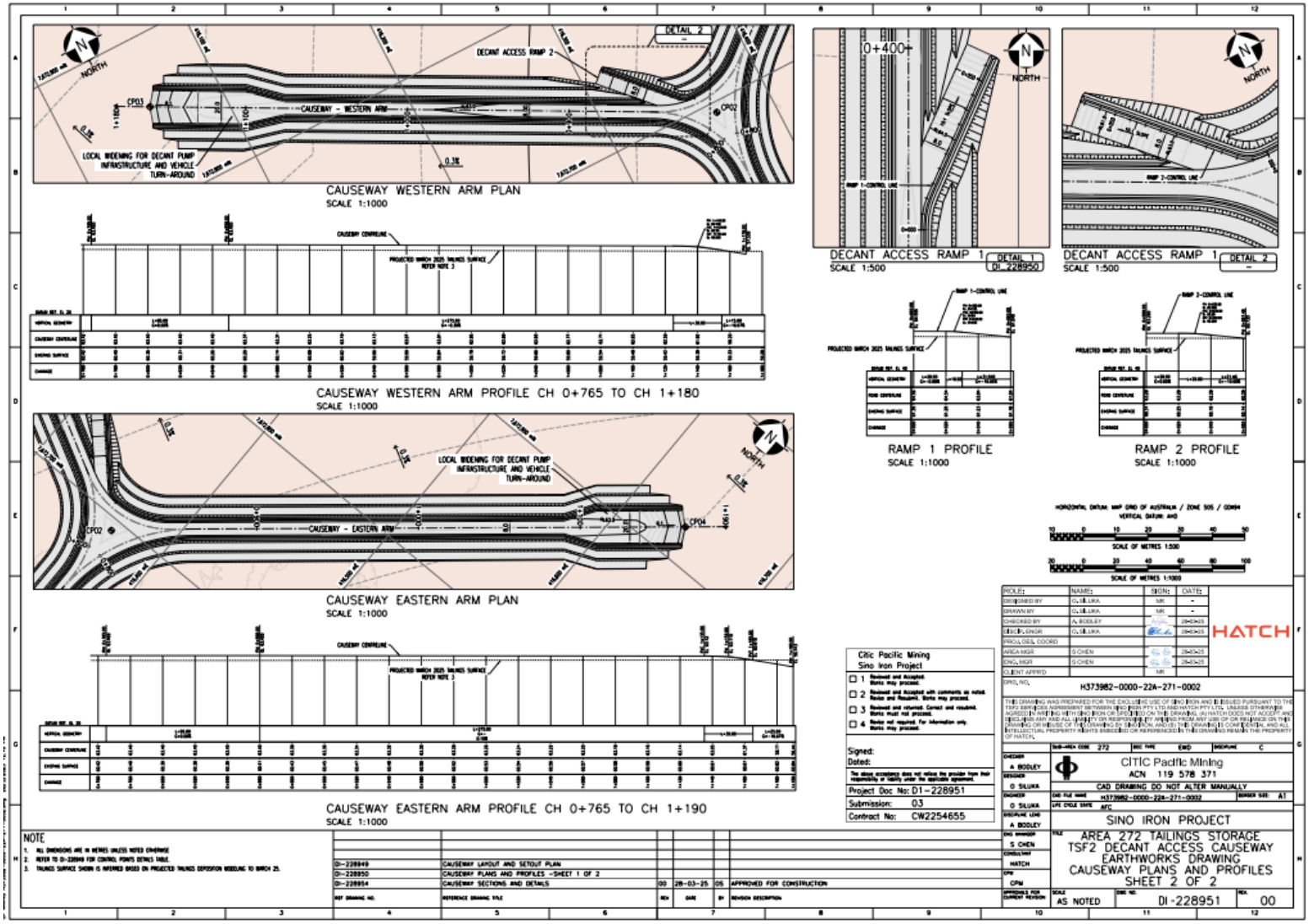


**Figure 5: TSF2 Causeway Plans and Profiles – Sheet 2 of 2**