



# Balranald Mineral Sands Mine

## Rehabilitation Management Plan

May 2024

Document reference:	MWB00005-H-PLN-0001		
Approved date:	22 May 2024		
Author/s:	Brendan Isaacs		
Approved by:	Dave Wright	Signed:	 <small>Dave Wright (May 27, 2024 10:32 GMT+10)</small>
Document owner:	Brendan Isaacs		
Publish date:	22 May 2024		

## Contents

Summary Table .....	5
1.....Part 1 – Introduction to mining project .....	5
1.1 History of operations .....	5
Intent of Rehabilitation Management Plan (RMP).....	5
1.2 Current development consents, leases, and licences.....	6
1.3 Land ownership and land use.....	6
1.3.1 Land ownership and land use figures.....	7
2.....Part 2 - Final land use .....	12
2.1 Regulatory requirements for rehabilitation .....	12
2.2 Final land use options assessment .....	12
2.3 Final land use statement.....	12
2.4 Final land use and mining domains .....	12
2.4.1 Final Land Use Domains .....	12
2.4.2 Mining domains .....	12
3.....Part 3 - Rehabilitation risk assessment .....	18
4.....Part 4 - Rehabilitation objectives and rehabilitation completion criteria .....	20
4.1 Rehabilitation objectives and rehabilitation completion criteria .....	20
4.2 Rehabilitation objectives and rehabilitation completion criteria – stakeholder consultation.....	25
5.....Part 5 - Final landform and rehabilitation plan .....	25
5.1 Final landform and rehabilitation plans .....	25
6.....Part 6 - Rehabilitation implementation .....	29
6.1 Life of mine rehabilitation schedule.....	29
6.2 Phases of rehabilitation and general methodologies .....	30
6.2.1 Active mining phase .....	30
6.2.2 Decommissioning.....	38
6.2.3 Landform establishment .....	40
6.2.4 Growth medium development.....	41
6.2.5 Ecosystem and land use establishment .....	41
6.2.6 Ecosystem and land use development.....	41
6.3 Rehabilitation of areas affected by subsidence.....	42

7.....	Part 7 – Rehabilitation quality assurance process	42
8.....	Part 8 - Rehabilitation monitoring program	44
8.1	Analogue site baseline monitoring.....	44
8.2	Rehabilitation establishment monitoring.....	44
8.2.1	Landform survey .....	44
8.2.2	Rehabilitation inspections.....	44
8.3	Measuring performance against rehabilitation objectives and rehabilitation completion criteria .....	45
9.....	Part 9 - Rehabilitation research, modelling and trials	46
9.1	Current rehabilitation research, modelling and trials .....	46
9.2	Future rehabilitation research, modelling, and trials .....	46
10.....	Part 10 - Intervention and adaptive management	46
10.1	Trigger action response plan (TARP) .....	46
11.....	Part 11 - Review, revision, and implementation	47

## Tables

Table 1	Summary Table .....	5
Table 2	Consents, authorisations, and licences.....	6
Table 3	Landownership .....	6
Table 4	Regulatory requirements.....	13
Table 5	Site mining domains .....	18
Table 6	Summary of rehabilitation risks and controls .....	18
Table 7	Approved Rehabilitation objectives and proposed completion criteria.....	22
Table 8	Stakeholder consultation.....	25
Table 9	Rehabilitation quality assurance .....	42
Table 10	Statutory triggers to review RMP .....	47

## Figures

Figure 1	Plan 1A Pre-Mining Environment- Regional location.....	8
Figure 2	Plan 1B Pre-Mining Environment – Site layout.....	9
Figure 3	Plan 1C Pre-Mining Environment – Natural environment .....	10
Figure 4	Land ownership .....	11
Figure 5	Final landform features .....	26
Figure 6	Plan2A Final landform contours .....	27
Figure 7	Plan 2B Final landform contours (Underground Mining Trial).....	28
Figure 8	Backfill sequencing of mining pits .....	31
Figure 9	Topsoil stripping depths .....	33

**Appendices**

Appendix 1- Trigger Action Response Plan

Appendix 2- Life of mine rehabilitation plan

## Document Control

Version	Date	Author	Description	Authorised
1	12/08/2022	B.Isaacs	Initial document development	A.Porter
2	22/05/2024	B.Isaacs	Update for MOD1 approval	D.Wright

# Summary Table

Table 1 Summary Table

Name of Mine	Balranald Mineral Sands Mine
Rehabilitation Management Plan Commencement Date	1 August 2022
Rehabilitation Management Plan Revision Date and Version numbers	v.2
Mining Leases	ML1736 (Expires 9 May 2037), ML1855 (Expires 13 June 2044)
Name of Lease Holder	Iluka Resources Limited
Date Published	28 May 2024

## 1 Part 1 – Introduction to mining project

### 1.1 History of operations

Iluka have approval to develop a mineral sands mine in south-western New South Wales (NSW), known as the Balranald Mineral Sands Mine. It includes construction, open-cut mining, primary processing, and rehabilitation of two linear mineral sand deposits, known as the West Balranald and Nepean deposits, located approximately 12 kilometres (km) and 66 km north-west of the town of Balranald, respectively. The Balranald Mine also included undertaking an approved bulk sampling activity at the West Balranald deposit with the removal of up to 100,000 tonnes (t) of mineral ore to trial the use of underground mining methods.

Development consent (SSD-5285) was granted for the Balranald Project by a delegate of the NSW Minister for Planning under the EP&A Act on 5 April 2016 (herein referred to as the consent). Approval was also granted under the EPBC Act (EPBC 2012/6509) by a delegate of the Commonwealth Minister for the Environment on 6 January 2017 (herein referred to as the Commonwealth approval).

Iluka has undertaken some of the approved bulk sampling activity involving the extraction of the mineral ore from depth using trial underground mining within the approved disturbance area of the West Balranald deposit.

The outcome of the bulk sampling activity confirmed the effectiveness of the underground mining method, validated key elements of the mining unit design and have been used to help guide future life-of-mine (LOM) operational conditions and inform the potential suitability (commerciality and potential reduced environmental impacts) of underground mining as an alternative method for resource extraction.

On 21 December 2022, Iluka were granted approval to modify the consent (MOD1) to expand the underground mining trial which includes an additional area of disturbance to the approved Balranald Project area to enable primary processing of the ore into heavy mineral concentrate (HMC) and transport of HMC offsite for secondary processing at Iluka's facilities in Victoria and/or Western Australia (WA).

Iluka intend to construct and operate the underground mining trial for up to six years as approved, at the completion of the underground mining trial Iluka would either seek a life of mine approval for underground mining, cease operations and rehabilitate or develop the open cut mining method to extract the remainder of the ore deposit.

#### *Intent of Rehabilitation Management Plan (RMP)*

This Rehabilitation Management Plan (RMP) is to satisfy Division 3, Condition 10 of Mining Amendment (Standard Conditions of Mining Leases – Rehabilitation) regulation 2021 under the NSW Mining Act 1992.

This RMP covers the following:

1. Activities associated with the bulk sampling activity at the Balranald West Mine T3 Area, including, decommissioning and rehabilitation works;
2. Progressive rehabilitation of surface disturbance associated with the Underground Mining Trial; and
3. Exploration activities including the establishment of drill sites and access tracks, drilling, sampling and rehabilitation of drill sites and access tracks.

## 1.2 Current development consents, leases, and licences

The Balranald Mine is a Level 1 mine and has been assessed as a State Significant Development (SSD) under Part 4 of the Environmental Planning and Assessment Act 1979 (EP&A Act). The relevant consents, authorisations, and licences for the Balranald Project, are outlined in Table 2 below.

*Table 2 Consents, authorisations, and licences*

Type	ID	Date of grant	Duration/Expiry
Exploration Lease	EL7450	February 2010	8 February 2028
Development Consent	SSD-5285	April 2016	16 years (From commencement of construction of West Balranald)
EPBC Approval	2012-6509	January 2017	1 January 2046
Mining Lease	ML1736	May 2016	9 May 2037
Mining Lease	ML1855	June 2023	13 June 2044
Environment Protection Licence	EPL20795	June 2016	9 June Annually

## 1.3 Land ownership and land use

Table 3 summarises land ownership within the Balranald Project approval area. Land affected by previous bulk sampling activities is limited to the Karra property.

*Table 3 Landownership*

Property	Lot/DP	Land Tenure (i.e. WLL)	Owner
Karra	1175/762586, 1/751182	WLL	Iluka
Pine Lodge	88/760470, 102/751214	WLL	Iluka
Boxdale	102/751214	WLL	Private landholder
Hugh Dale	1223/762708, 1224/762709, 1225/762710, 1226/762711, 1227/762712, 1229/762714	WLL	Iluka
Nanda	43/751217, 31/75121740/751217, 41/751217	WLL	Iluka
Pt Tin Tin	4/751182, 5/751182	WLL	Iluka
Bramah	4809/762298	WLL	Private landholder

Property	Lot/DP	Land Tenure (i.e. WLL)	Owner
Upton Downs	5325/768236, 5332/768243	WLL	Iluka
Bidura	5501/768410, 6615/769405 115/760764, 5291/768206 5290/768205	WLL	Iluka
Tin Tin	20/751232, 1/75123239/751217, 1174/762585	WLL	Private landholder
The Oaks	5326/768237	WLL	Private landholder
Turlee	4812/769046	WLL	Private landholder
Wampo	2/1198290	WLL	Private landholder
Wintong	128/760747, 5331768242	WLL	Private landholder
Other	98/751245, 99/751245100/751245, 103/751245 73/751245, 104/751245 4864/769099, 6654/769427 1184/7623595	WLL	Private landholders/Crown land

Properties in the local area are typically large western lands lease rural land holdings, and homesteads where dwellings are sparsely located.

The West Balranald Mine site and surrounding land is zoned for primary production under the Balranald Local Environment Plan 2010 (Balranald LEP). Land uses surrounding the site are agricultural, the majority being for grazing.

There are currently no Biodiversity Stewardship Agreements established for the project, there is however a requirement to enter into a Biodiversity Stewardship Agreement and retire the required amount of offset credits for stage 1 (Table 7 of the Consent) within two years of commencing disturbance within stage 1 (Figure 18 in Appendix 10 of the Consent).

### *1.3.1 Land ownership and land use figures*

The following land ownership and land use figures are provided:

Figure 1 Plan 1A Pre-Mining Environment – Regional location

Figure 2 Plan 1B Pre-Mining Environment – Site layout

Figure 3 Plan 1C Pre-Mining Environment – Natural environment

Figure 4 Land ownership

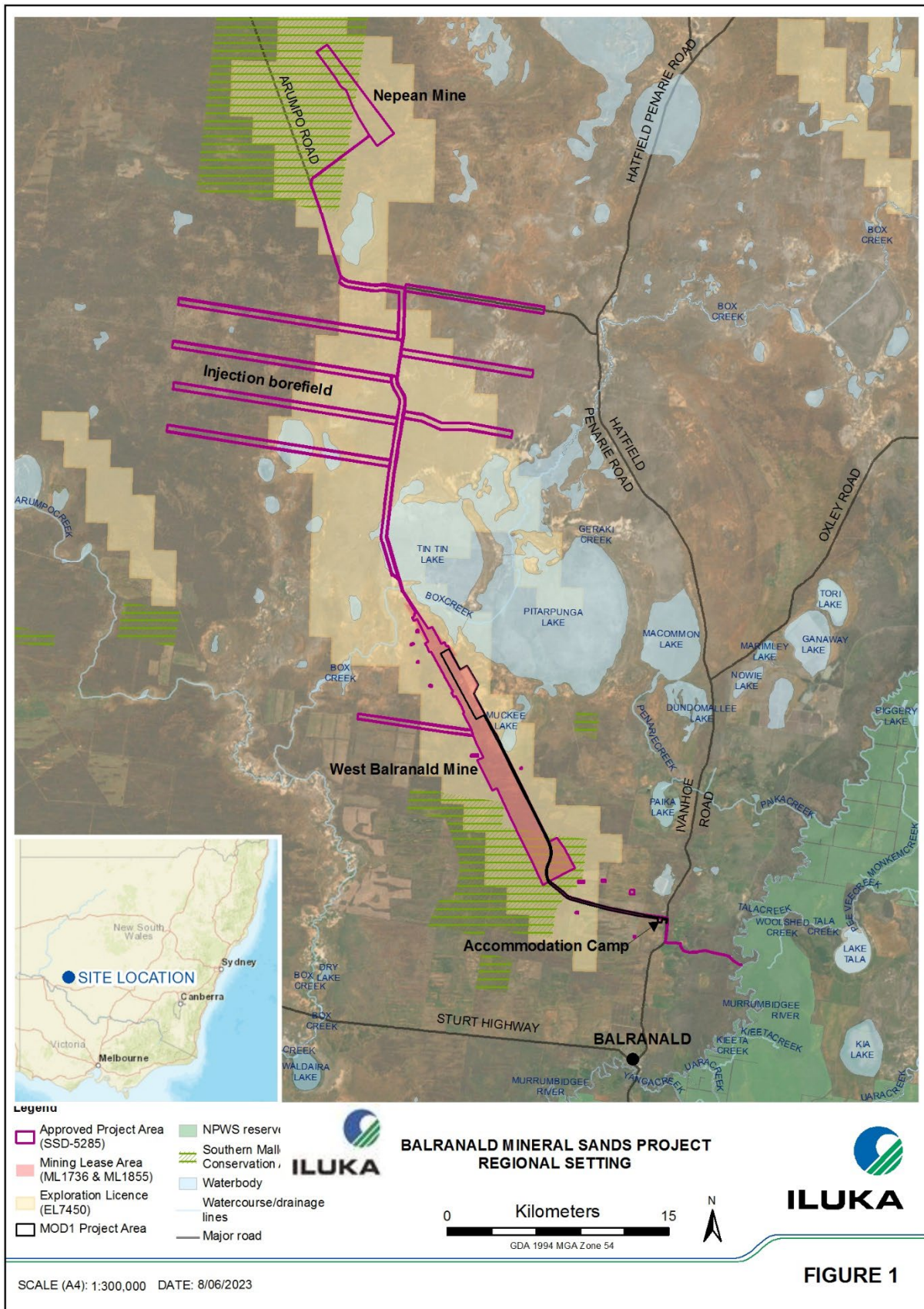


Figure 1 Plan 1A Pre-Mining Environment- Regional location



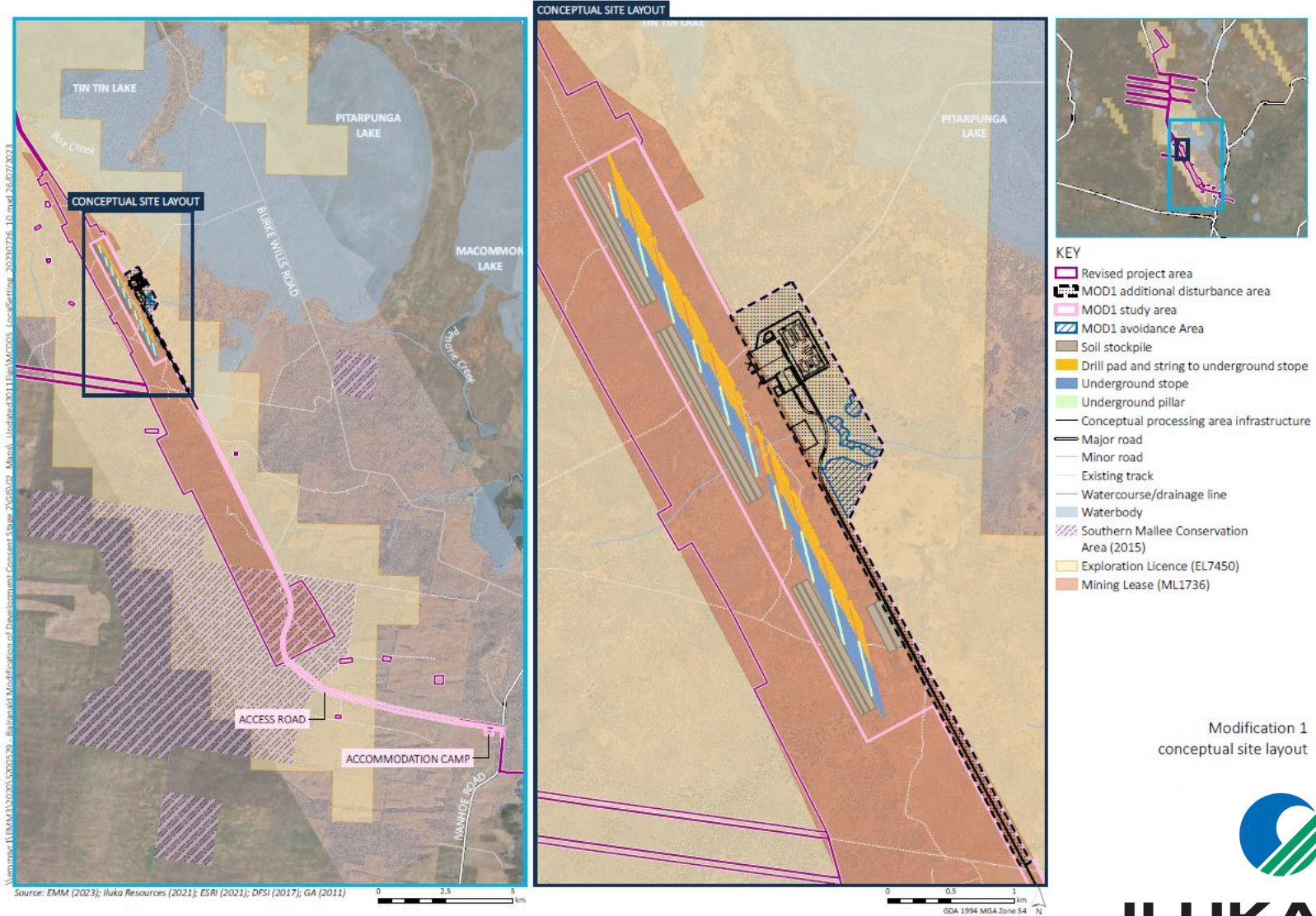


Figure 2 Plan 1B Pre-Mining Environment – Site layout

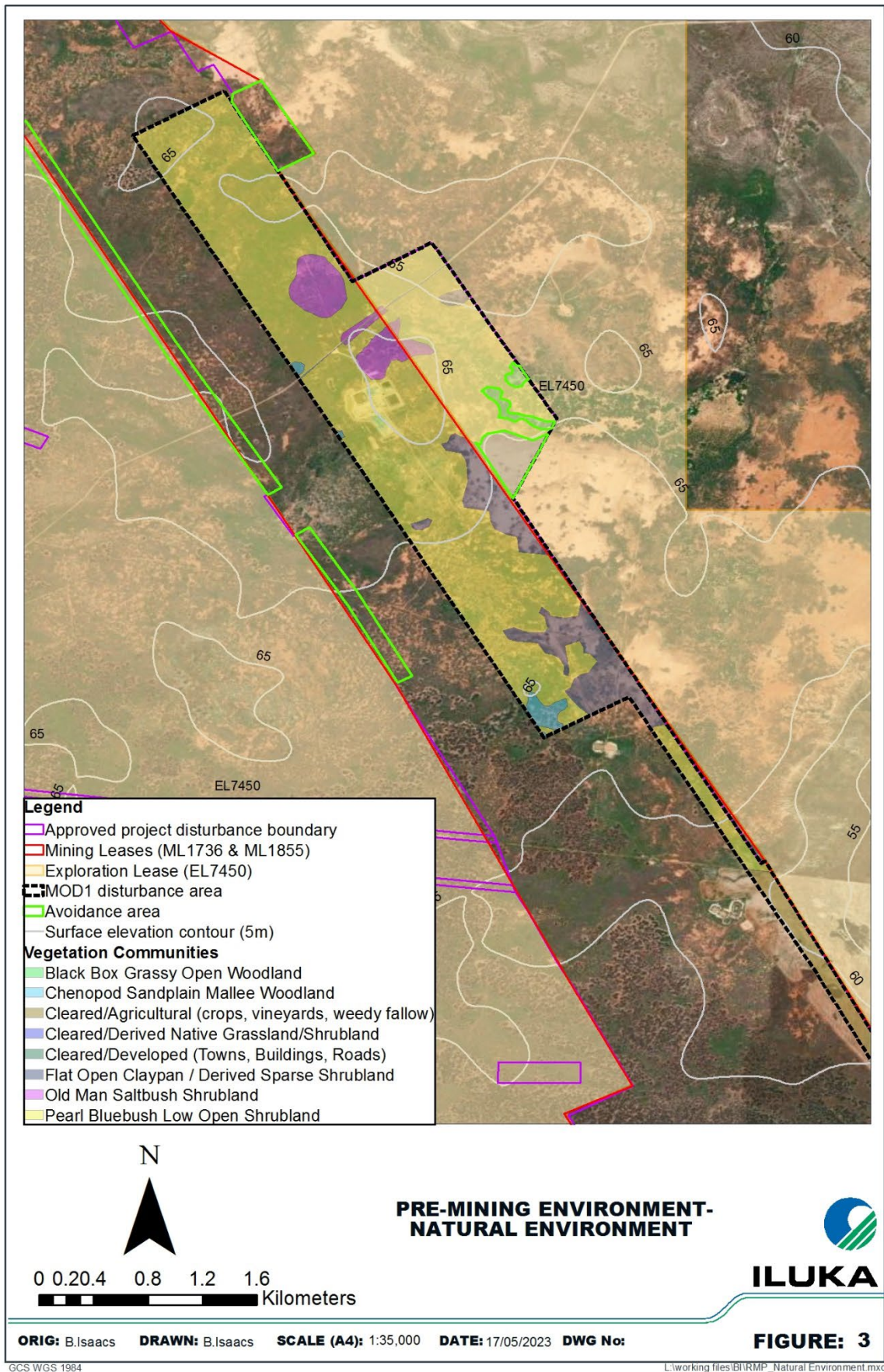


Figure 3 Plan 1C Pre-Mining Environment – Natural environment

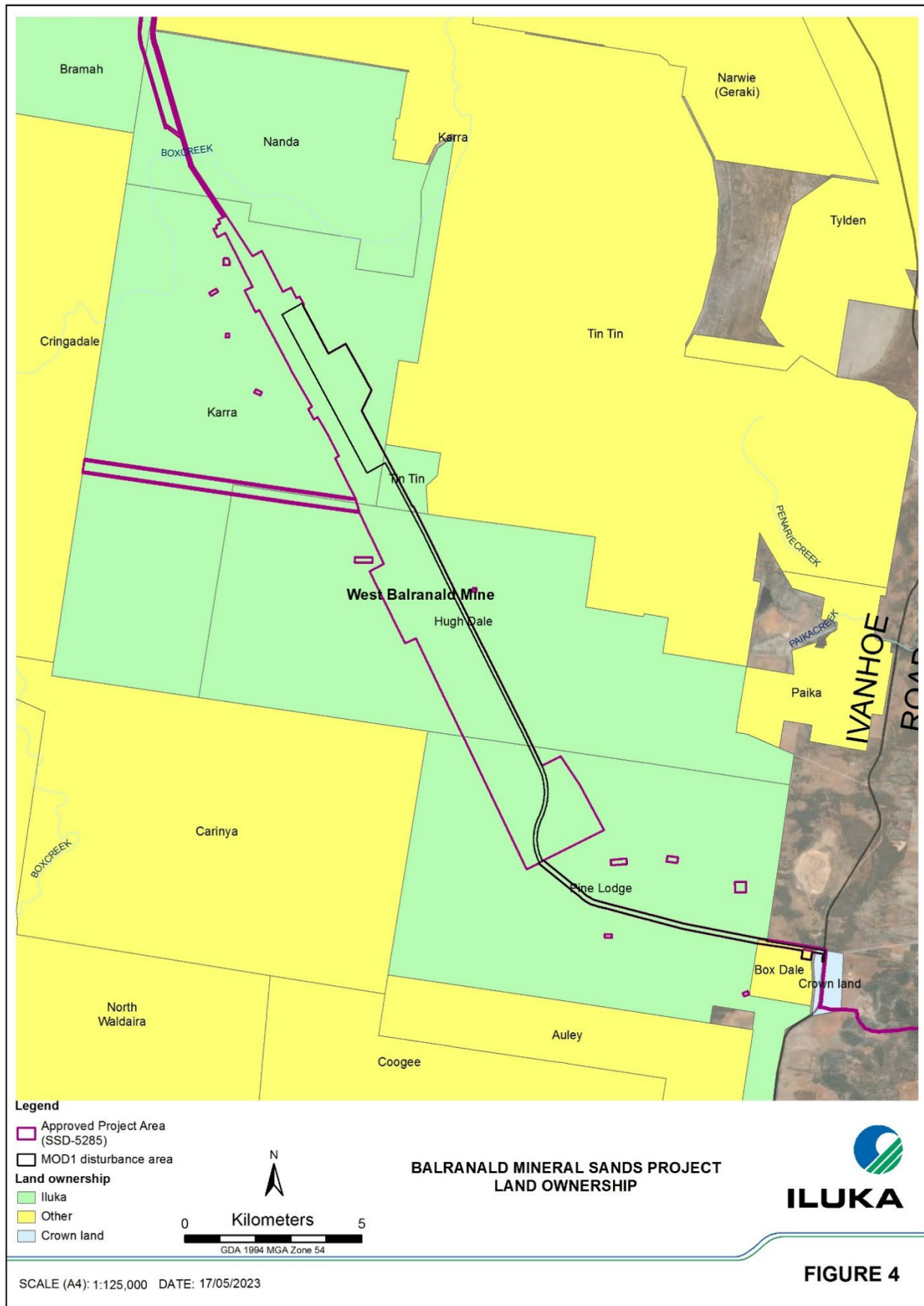


Figure 4 Land ownership

## 2 Part 2 - Final land use

### 2.1 Regulatory requirements for rehabilitation

This RMP has been prepared in consideration of regulatory requirements that apply to the MOD1 Underground Mining Trial, as summarised in Table 4.

### 2.2 Final land use options assessment

As the final land use for the site is described in the Balranald Project EIS and Development Consent (described in section 2.3), this section of the RMP is not required.

### 2.3 Final land use statement

The proposed final land use for the project area is Native Ecosystem and Agricultural Cropping. (grazing native vegetation & cropping). The final land uses described are applicable to the approved MOD1 disturbance area only (Refer Figure 2), should Iluka undertake approved development outside the MOD1 disturbance area then this RMP and any final land use plans will be revised.

### 2.4 Final land use and mining domains

#### *2.4.1 Final Land Use Domains*

The final land use domains defined for the MOD1 Underground Mining Trial are:

- Native Ecosystem (A) (native vegetation subject to light or intermittent grazing), and
- Agricultural – Cropping (C).

#### *2.4.2 Mining domains*

Mining Domains have been defined based on similar disturbance and geomorphological features and are defined in Table 5, in accordance with the NSW Resources Regulator Guideline *Rehabilitation objectives and rehabilitation completion criteria guideline* (Version 2, NSW RR 2023).

Table 4 Regulatory requirements

Approval/ Condition	Act		
ML1736 & ML1855	Mining Act 1992 – Mining Amendment (Standard Conditions of Mining Leases – Rehabilitation) regulation 2021		
Part 2 Standard Conditions – Division 1 Protection of the Environment and rehabilitation		Timing/Scope	Relevant Section(s) in RMP
Condition 4	Must prevent or minimise harm to the environment (1) The holder of a mining lease must take all reasonable measures to prevent, or if that is not reasonably practicable, to minimise harm to the environment caused by activities under the mining lease.	Life of development-mining lease.	Section 10 & Appendix 1 (TARP)
Condition 5	Rehabilitation to occur as soon as reasonably practicable after disturbance The holder of a mining lease must rehabilitate land and water in the mining area that is disturbed by activities under the mining lease as soon as reasonably practicable after the disturbance occurs.	As soon as practicable-mining lease.	Section 6.2
Condition 6	Rehabilitation must achieve final land use (1) The holder of a mining lease must ensure that rehabilitation of the mining area achieves the final land use for the mining area (2) The holder of the mining lease must ensure any planning approval has been obtained that is necessary to enable the holder to comply with the subclause (1) (3) The holder of the mining lease must identify and record any reasonably foreseeable hazard that presents as a risk to the holder’s ability to comply with subclause (1) (4) In this clause final land use for the mining area means the final landform and land uses to be achieved for the mining area – a) As set out in the rehabilitation objectives statement and rehabilitation completion criteria, and b) For a large mine – as spatially depicted in the final landform and rehabilitation plan, and c) If the final land use for the mining area is required by a condition of development consent for activities under a mining lease – as stated in the condition	Post mining-mining lease.  Before grant of mining lease.  Ongoing- mining lease.  Post mining-mining lease.	Sections 2.2, 2.3 & 2.4.1  Section 1.2  Section 10 & Appendix 1 (TARP)  Sections 2.2, 2.3 & 2.4.1
Division 2 Risk Assessment			
Condition 7	Rehabilitation risk assessment (1) The holder of a mining lease must conduct a risk assessment (a rehabilitation risk assessment) that –		Sections 3 & 10

	<p>a) identifies, assesses, and evaluates the risks that need to be addressed to achieve the following in relation to the mining lease –</p> <ul style="list-style-type: none"> <li>i) the rehabilitation objectives,</li> <li>ii) the rehabilitation completion criteria,</li> <li>iii) for large mines – the final land use as spatially depicted in the final landform and rehabilitation plan</li> </ul> <p>b) identifies the measures that need to be implemented to eliminate, minimise or mitigate the risks</p> <p>(2) The holder of the mining lease must implement the measures identified.</p> <p>(3) The holder of a mining lease must conduct a rehabilitation risk assessment –</p> <ul style="list-style-type: none"> <li>a) For a large mine – before preparing a rehabilitation management plan, and</li> <li>c) Whenever a hazard is identified under clause 6(3) – as soon as reasonably practicable after it is identified, and</li> <li>d) Whenever given a written direction to do so by the secretary</li> </ul>	<p>Pre-development-mining lease.</p> <p>Life of development-mining lease.</p> <p>Prior to rehabilitation or as necessary-mining lease.</p>	<p>Sections 3 &amp; 10</p> <p>Section 10 &amp; Table 11</p>
SSD-5285	Environmental and Planning Assessment Act 1979 (EP&A Act)		
Schedule 3			
Condition 32	<p>Rehabilitation Objectives</p> <p>The Applicant must rehabilitate the site in accordance with the conditions imposed on the mining lease(s) associated with the development under the Mining Act 1992. This rehabilitation must be generally consistent with the proposed rehabilitation strategy described in the EIS (and depicted conceptually in the figure in Appendix 9), and comply with the objectives in Table 11.</p>	Post mining-approved project area.	Section 4.1 & Table 6

Table 11- Rehabilitation Objectives			
Feature	Objective		
Mine site (as a whole)	<ul style="list-style-type: none"> <li>• Safe, stable &amp; non-polluting</li> <li>• Materials (including topsoils, substrates and seeds of the disturbed areas) are recovered, appropriately managed and used effectively as resources in the rehabilitation of the site</li> <li>• Final landforms to:               <ul style="list-style-type: none"> <li>○ restore native vegetation communities and ecosystem function (in the applicable domains);</li> <li>○ sustain the intended land use for the post-mining domains;</li> <li>○ minimise the visual impacts of the development;</li> <li>○ be generally in keeping with the natural terrain features of the area;</li> <li>○ incorporate micro-relief; and</li> </ul> </li> <li>• incorporate drainage lines consistent with topography and natural drainage where reasonable and feasible</li> </ul>		
Water quality	<ul style="list-style-type: none"> <li>• Water retained on site is fit for the intended land use(s) for the post-mining domains</li> </ul>		

		<ul style="list-style-type: none"> <li>Water discharged from site is consistent with the baseline ecological, hydrological and geomorphic conditions of the creeks prior to mining disturbance</li> <li>Water management is consistent with the applicable regional catchment strategy</li> </ul>			
	Final void	<ul style="list-style-type: none"> <li>Minimise:               <ul style="list-style-type: none"> <li>the size and depth of the final void</li> <li>the drainage catchment of the final void</li> <li>risk of flood interaction for all flood events up to and including the 1% AEP</li> </ul> </li> </ul>			
	Surface infrastructure	<ul style="list-style-type: none"> <li>To be decommissioned and removed, unless <a href="#">the Resources Regulator</a> agrees otherwise</li> </ul>			
	Agriculture	<ul style="list-style-type: none"> <li>Land capability classification for the relevant nominated agricultural pursuit for each domain is established and self-sustaining within a reasonable timeframe</li> </ul>			
	Community	<ul style="list-style-type: none"> <li>Ensure public safety</li> <li>Minimise the adverse socio-economic effects of mine closure</li> </ul>			



Condition 34	Rehabilitation Management Plan  The Applicant must prepare a Rehabilitation Management Plan for the development, in accordance with the provisions under the Mining Act 1992.	1 August 2022	This RMP
Condition 35	1. The Applicant must: <ul style="list-style-type: none"> <li>(a) ensure that there are no measurable subsidence impacts caused by the Underground Mining Trial in areas outside the West Balranald Mine;</li> <li>(b) monitor subsidence impacts of the underground mining trial and report against predictions in the EIS in the Annual Review required under condition 4 of Schedule 5; and</li> <li>(c) remediate subsidence impacts to ensure compliance with the long-term rehabilitation objectives in Table 11.</li> </ul>	Post Mining-Outside Mining Lease Post Mining-Subsidence zones Post Mining-Subsidence zones	Section 6.2.1 (I)   Section 6.3

Table 5 Site mining domains

Code	Domain	Description
Mining domains for Underground Mining Trial (operational)		
1	Infrastructure area	Comprises the hardstand areas, ore pad, processing infrastructure, site buildings, haul road, access tracks, site compound, fencing, groundwater monitoring bores, production bores, diesel fuel storage and dispensing area and other plant and equipment.
4	Overburden Emplacement	Comprises the underground mining area and temporary stockpiles of ore, MBP, NSOB, topsoil and subsoil.

### 3 Part 3 - Rehabilitation risk assessment

Iluka has undertaken risk assessment workshops to identify the risks associated with the rehabilitation of the site.

A review and update of this risk assessment to comply with the NSW Resources Regulator, *Guideline - Rehabilitation Risk Assessment (2021)* has been undertaken by Iluka personnel from a range of disciplines. The updated risk assessment (conducted July/August 2022) specifically addresses risks to achieving specified rehabilitation objectives.

The Iluka team members consisted of specialist in the industry who have extensive knowledge in rehabilitation, environmental management, community engagement, mine closure planning, mine planning and mining operations.

A summary of key threats to rehabilitation and controls that may be used if appropriate is shown in Table 6 below.

Table 6 Summary of rehabilitation risks and controls

Rehabilitation Risk	Controls and Management Measures in RMP
Surface subsidence	Subsidence monitoring Backfilling with sand tails and NSOB prior to placement of growth medium Subsidence Management Plan
Biological resource salvage – topsoil and timber	Native seed collection Stockpiling of felled vegetation Soil surveys prior to topsoil stripping Direct return of materials where possible Stockpiling materials separately and records kept with details Limit stockpile heights to 2m for topsoil and 10m for subsoil Fit for purpose equipment and competent operators for handling topsoil Weed control of stockpiles Erosion control of stockpiles Addition of ameliorates if required
Landform stability Erosion and sedimentation control	Landforms shaped to design parameters Landform surveys and erosion monitoring Design and maintenance of drainage structures Subsidence monitoring Erosion modelling

Rehabilitation Risk	Controls and Management Measures in RMP
	Maintenance of any developing erosion Spreading of stockpiled vegetation on slopes Contour ripping of slopes if required
Acid Mine Drainage	Capping of sand tails below natural ground level Re-injection of slimes underground back into mined stopes Stockpile Management Plan Lime amendment for acid neutralisation
Ground disturbance and heritage items	Salvage of heritage items prior to disturbance activities Aboriginal Cultural Heritage Management Plan (ACHMP) Awareness training and inductions Rehabilitate as soon as practical after disturbance Site disturbance and clearance protocols Site Disturbance Permit (SDP)
Infrastructure	Soil contamination testing and remediation Regular inspections (leaks, integrity) Ripping of compacted areas prior to growth medium placement (hardstands, roads, processing areas) Decommissioning of water infrastructure
Hazardous material / saline material	Correct storage, handling and disposal of hazardous materials as per SDS Regular inspections of water infrastructure Testing soil for contamination prior to rehabilitation Disposal or remediation of contaminated soils Allow water storages to evaporate prior to decommissioning Pollution Incident Response Management Plan
Vegetation establishment	Growth medium spread according to plan and at required depths Seed collection Seed viability testing Seeding requirements informed by monitoring Soil testing Addition of ameliorants if required Annual revegetation monitoring Maintain exclusion fences Control grazing animals Weed management
Weeds	Regular inspections for environmental weeds (un-disturbed, rehabilitation and stockpiles) Control of weed infestations by herbicide or mechanical methods Weed and seed check of vehicles and equipment accessing the site Vehicle washdown facility
Feral fauna	Maintain exclusion fences Pest animal monitoring Annual baiting for rabbits and/or fumigation of rabbit burrows

Rehabilitation Risk	Controls and Management Measures in RMP
	Mustering and/or trapping of goats Annual baiting for foxes and other feral predators (i.e. cats and pigs) Restrict access to artificial water points Annual rehabilitation monitoring reports
Weather and climate influences	Progressive rehabilitation Soil stripping and replacement to be conducted during conducive conditions where possible (Late autumn to early winter) Avoid stripping dry and powdery soil

Environmental and rehabilitation risks will also be managed in accordance with the overarching Environmental Management Strategy and the following Environmental Management Plans (EMPs):

- Aboriginal Cultural Heritage Management Plan (ACHMP);
- Air Quality Management Plan (AQMP);
- Biodiversity Management Plan (BMP);
- Noise Management Plan (NMP);
- Water Management Plan (WMP);
- Traffic Management Plan (TMP);
- Radiation Management Plan (Radiation MP);
- Subsidence Management Plan (SMP); and
- Pollution Incident Response Management Plan (PIRMP)

## 4 Part 4 - Rehabilitation objectives and rehabilitation completion criteria

### 4.1 Rehabilitation objectives and rehabilitation completion criteria

The rehabilitation objectives and proposed completion criteria for each domain are outlined in Table 7. The rehabilitation objectives are generally consistent with those specified in Table 11 of Development Consent SSD-5285 for the Balranald Project. Rehabilitation Objectives are required to be submitted to the NSW Resources Regulator for approval in accordance with Division 3, Condition 12 (a) of the Mining Amendment (Standard Conditions of Mining Leases—Rehabilitation) Regulation 2021 under the NSW Mining Act 1992.

The rehabilitation objectives for the underground mining trial MOD1 area were approved by the Resources Regulator on 23 September 2023 (Ref# ROBJ0001212). Should Iluka propose to conduct approved

disturbance outside the MOD1 area then the rehabilitation objectives and associated special data will be re-submitted to the Resources Regulator for approval.

Iluka uses a risk-based approach in developing completion criteria, which considers regulatory obligations and stakeholder engagement outcomes. For some objectives, further technical information and data is required to enable the relevant, achievable completion criteria to be developed. In these cases, completion criteria are noted as 'Further refinement of this rehabilitation completion criteria is required before an amended rehabilitation completion criteria statement can be approved'.

The completion criteria listed in this RMP are 'proposed' and have not yet been submitted to NSW Resources Regulator for approval. Iluka will continue to review and refine completion criteria over the life of the project as operations progress, to consider learnings from operations and progressive rehabilitation, evaluation of monitoring data, and any new technical information. Completion criteria for all relevant objectives will be submitted to the NSW Resources Regulator for approval in accordance with timelines defined in the Mining Amendment (Standard Conditions of Mining Leases—Rehabilitation) Regulation 2021.

Table 7 Approved Rehabilitation objectives and proposed completion criteria.

Final land use domain	Mining domain	Aspect	Closure objective (approved)	Completion criteria (proposed)	Monitoring Regime (Indicator)	Evidence required to demonstrate achievement (Justification Validation Methods)
Native Ecosystem (A) (native vegetation subject to light or intermittent grazing)  Agricultural – Cropping (C).	1 – Infrastructure  4 - Overburden emplacement area	Landform stability	Ensure public safety	CC01: Visual - no signs of land instability that would post a hazard or constraint for the intended final land use.	One off visual inspection to be completed three years following completion of topsoil replacement.	Photographs and drone footage of final landforms.
			Final landforms to be generally in keeping with the natural terrain features of the area.	CC02: Land surface is visually comparable to the surrounding landscape.	One off visual inspection	Photographs and drone footage of final landforms.
			Final landforms to incorporate micro-relief.	CC03: Survey verifies final landform is within specified limits of the final landform design in accordance with Final Landform and Rehabilitation Plan.	Topographic survey to be completed any time following completion of topsoil replacement.	As constructed' survey of rehabilitated landform compared with design.
			Final landforms to minimise the visual impacts of the development.	Apply CC02: Land surface is visually comparable to the surrounding landscape.	One off visual inspection	Photographs and drone footage of final landforms.
			The final landform is stable for the long-term and does not present a risk of environmental harm downstream / downslope of the site or a safety risk to the public/stock/native fauna.	Apply CC01: Visual - no signs of land instability that would post a hazard or constraint for the intended final land use.	One off visual inspection to be completed three years following completion of topsoil replacement.	Photographs and drone footage of final landforms.
			The site is safe, stable & non-polluting.	CC04: Land surface is stable with minimal erosion: Erosion features (gutters, rills) greater than 300mm deep occupy less than 0.5% of the rehabilitated surface and none greater than 500mm deep	Topographic survey to be completed three years following completion of topsoil replacement.	As constructed' survey of rehabilitated landform to assess extent of erosion features.
Native Ecosystem (A) (native vegetation subject to light or intermittent grazing)  Agricultural – Cropping (C).	1 – Infrastructure  4 - Overburden emplacement area	Groundwater	Groundwater quality is similar to, or better than the pre disturbance water quality	Not applicable: Any groundwater contamination arising from Iluka's mining activities is managed in accordance with the: - Protection of Environment Operations Act 1997 (POEO); and - Contaminated Land Management Act 1997 (CLM Act)		
			Impacts to groundwater regime are within range as per the development consent(s) / pre-mining environmental assessment.	CC05: Groundwater levels are within $\pm 2$ Standard Deviations of mean regional background levels.*	Standing groundwater level measurements at specified monitoring points until criterion met.	Groundwater assessment report.
			Water management is consistent with the applicable regional catchment strategy.	Not applicable: Water is managed in accordance with the approved Development Consent and the NSW Water Management Act 2000.		
Native Ecosystem (A) (native vegetation)	1 – Infrastructure	Water quality	Water discharged from site is consistent with the baseline ecological,	CC06: Water quality discharged from rehabilitated areas meets specifications in ANZECC guidelines for specific environment.	Monitoring conducted in accordance with Environment Protection Licence or selected	Water quality results and monitoring report.

Final land use domain	Mining domain	Aspect	Closure objective (approved)	Completion criteria (proposed)	Monitoring Regime (Indicator)	Evidence required to demonstrate achievement (Justification Validation Methods)
subject to light or intermittent grazing)  Agricultural – Cropping (C).	4 - Overburden emplacement area		hydrological and geomorphic conditions of the creeks prior to mining disturbance		water quality parameters from ANZECC 2000 guidelines.	
			Water retained on site is fit for the intended land use(s) for the post-mining domains. (Native Vegetation Grazing).	CC07: Water quality in retained dams and/or voids meets specifications in ANZECC guidelines for livestock drinking water quality.	Monitoring selected water quality parameters from the ANZECC 2000 guidelines for livestock drinking water.	Water quality results and monitoring report.
Native Ecosystem (A) (native vegetation subject to light or intermittent grazing)  Agricultural – Cropping (C).	1 – Infrastructure  4 - Overburden emplacement area	Land and water contamination	There is no residual soil contamination on site that is incompatible with the final land use or that poses a threat of environmental harm.	Not applicable: Soil contamination (where present) is managed in accordance with the NSW Contaminated Land Management Act 1997.		
Native Ecosystem (A) (native vegetation subject to light or intermittent grazing)  Agricultural – Cropping (C).	1 – Infrastructure  4 - Overburden emplacement area	Management of waste and process materials	Residual waste materials stored on site (e.g. tailings, coarse rejects and other wastes) will be appropriately contained / encapsulated so it does not pose any hazards or constraints for intended final land use.	CC08: Tailings are capped with non-saline overburden above underground mining areas.	Monitoring and quality assurance records of: Capping depth; Capping material type	Quality assurance records verify capping constructed in accordance with design.
Agricultural – Cropping (C).	1 - Infrastructure	Agricultural revegetation	Land use capability is capable of supporting the target agricultural land use.	CC09: Crop yields from rehabilitated areas are similar to adjacent or surrounding cropping land.	Annual crop yield data for three years or until criterion met.	Third party agronomist report.
			Revegetation is sustainable for the long-term, and only requires maintenance that is consistent with the intended final land use.	CC10: Maintenance required is consistent with farming practises typical of the region for the nominated final land use.	Agronomic assessment confirms management and maintenance is consistent with the region.	Third party agronomist report.
Native Ecosystem (A) (native vegetation subject to light or intermittent grazing)	1 – Infrastructure  4 - Overburden emplacement area	Native revegetation (light intensity Grazing)	Levels of ecosystem function have been established that demonstrate the rehabilitation is self sustainable.	CC11: Revegetation is characteristic of the target vegetation community(s) when compared to analogue sites*.	Revegetation monitoring to consider litter cover, presence of second-generation trees and weed cover.	Third party rehabilitation monitoring reports that validate rehabilitation completion criteria have been met.
			Revegetation is sustainable for the long-term, and only requires maintenance that is consistent with the intended final land use.	Apply: CC10 Maintenance required is consistent with farming practises typical of the region for the nominated post land use	Land Capability Assessment confirms revegetation supports light intensity grazing	Third party report to demonstrate revegetation can support and maintain the final land use – light intensity grazing.

Final land use domain	Mining domain	Aspect	Closure objective (approved)	Completion criteria (proposed)	Monitoring Regime (Indicator)	Evidence required to demonstrate achievement (Justification Validation Methods)
			The vegetation composition of the rehabilitation is recognisable as the target vegetation community Chenopod Shrubland, Sandplain Mallee and Dune Mallee.	CC12: Native plant species are characteristic of the target vegetation community(s) when compared to analogue sites*.	Monitoring of native plant species present and assessment of species present compared to analogue sites.	Third party rehabilitation monitoring reports that validate rehabilitation completion criteria have been met.
			The vegetation structure of the rehabilitation is recognisable as, or is trending towards (based on ongoing monitoring data) the target vegetation community Chenopod Shrubland, Sandplain Mallee and Dune Mallee.	CC13: Cover, abundance and height range of native plant growth forms are characteristic of, or trending towards, the target vegetation community type(s). *	Monitoring of plant cover, abundance and height range and assessment compared to the target vegetation type(s).	Third party rehabilitation monitoring reports that validate rehabilitation completion criteria have been met.
Native Ecosystem (A) (native vegetation subject to light or intermittent grazing)  Agricultural – Cropping (C).	1 – Infrastructure  4 - Overburden emplacement area	Removal of infrastructure	All infrastructure that is not to be used as part of the final land use is removed to ensure the site is safe and free of hazardous materials.  Surface infrastructure to be decommissioned and removed, unless the Resources Regulator agrees otherwise.	CC14: All infrastructure will be removed unless otherwise agreed with the landowner. Any retained infrastructure will be made safe.	One off inspection of infrastructure.	Records of site inspections Copy of Landowner acceptance for any retained infrastructure
Native Ecosystem (A) (native vegetation subject to light or intermittent grazing)  Agricultural – Cropping (C).	1 – Infrastructure  4 - Overburden emplacement area	Retention of infrastructure	All infrastructure that is to remain as part of the final land use benefits from the relevant approvals (e.g. development consent and/or licence/lease/binding agreement, etc).  All infrastructure that is to remain as part of the final land use is safe, does not pose any hazard to the community.			

\*Further refinement of this rehabilitation completion criteria is required before an amended rehabilitation completion criteria statement can be approved.



## 4.2 Rehabilitation objectives and rehabilitation completion criteria – stakeholder consultation

Extensive consultation has been undertaken for the Balranald Project, including liaison with government agencies, the community, and indigenous groups. Iluka’s approach to stakeholder consultation is established in the Balranald Community and Stakeholder Engagement Plan.

*Table 8 Stakeholder consultation*

Stakeholder	Consultation Type	Matters discussed/Actions
DPE	Meetings/Email	Approvals Process Environmental Management Plans
Resources Regulator	Meetings/Email	Development and approval of rehabilitation objectives
DPE-Water	Meetings/Email	Approval process, project update and groundwater monitoring results Groundwater approvals and licences
EPA	Meetings/Email	Licence variation for changes to scheduled activities and monitoring requirements
Community	Newsletter, Webpage	Project updates
Affected Landholders	Formal	Entered into compensation agreements with affected landholders for loss of any potential income due to the project
Registered Aboriginal Parties (RAP’s)	Face to face- Field work Face to face- Aboriginal Cultural Heritage Working Group	Site salvage programs over the bulk sampling activity site and MOD1 area. Due diligence and cultural heritage surveys Cultural heritage findings and report overviews
Government, community and indigenous	Environmental Impact Statement (2011-2015) Modification Report (MOD1- 2022)	Political, regulatory approvals, land access, land use and logistics, land management, water, emissions, social impacts, economic development and social licence to operate.

## 5 Part 5 - Final landform and rehabilitation plan

### 5.1 Final landform and rehabilitation plans

Final landform features and final landform contour plans are presented in Figure 5, Figure 6 and Figure 7. These contour plans provided are indicative as the extent of subsidence at surface will not be fully known for some time post mining. The final landform and rehabilitation plan (FLRP) (Ref# FLRP0001156) was approved by the Resources Regulator on 23 September 2023. The FLRP is approved for the underground mining trial MOD1 disturbance area. Should Iluka propose to conduct approved disturbance outside this area a revised FLRP will be submitted to the Resources Regulator for approval.

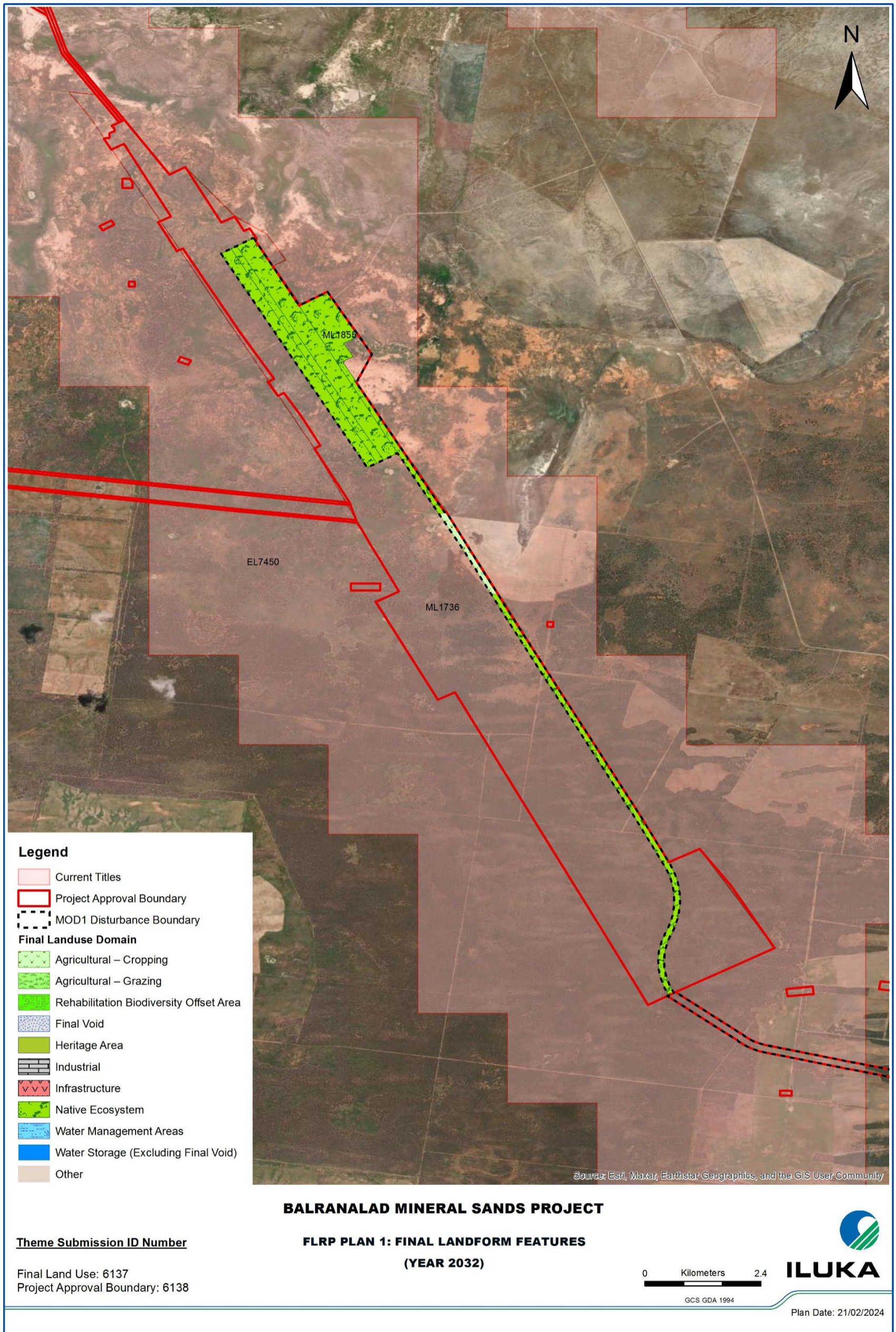


Figure 5 Final landform features

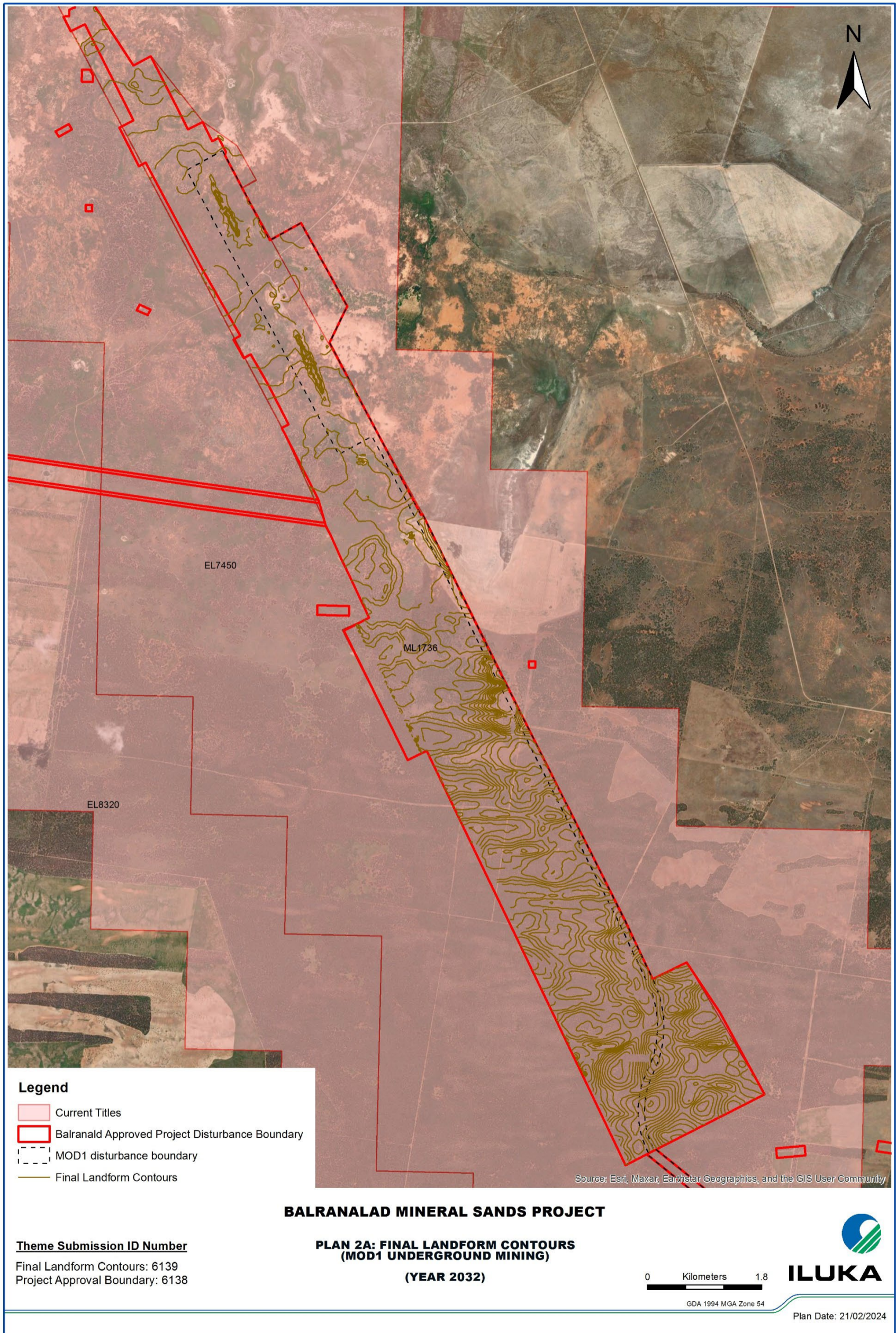


Figure 6 Plan2A Final landform contours  
 27

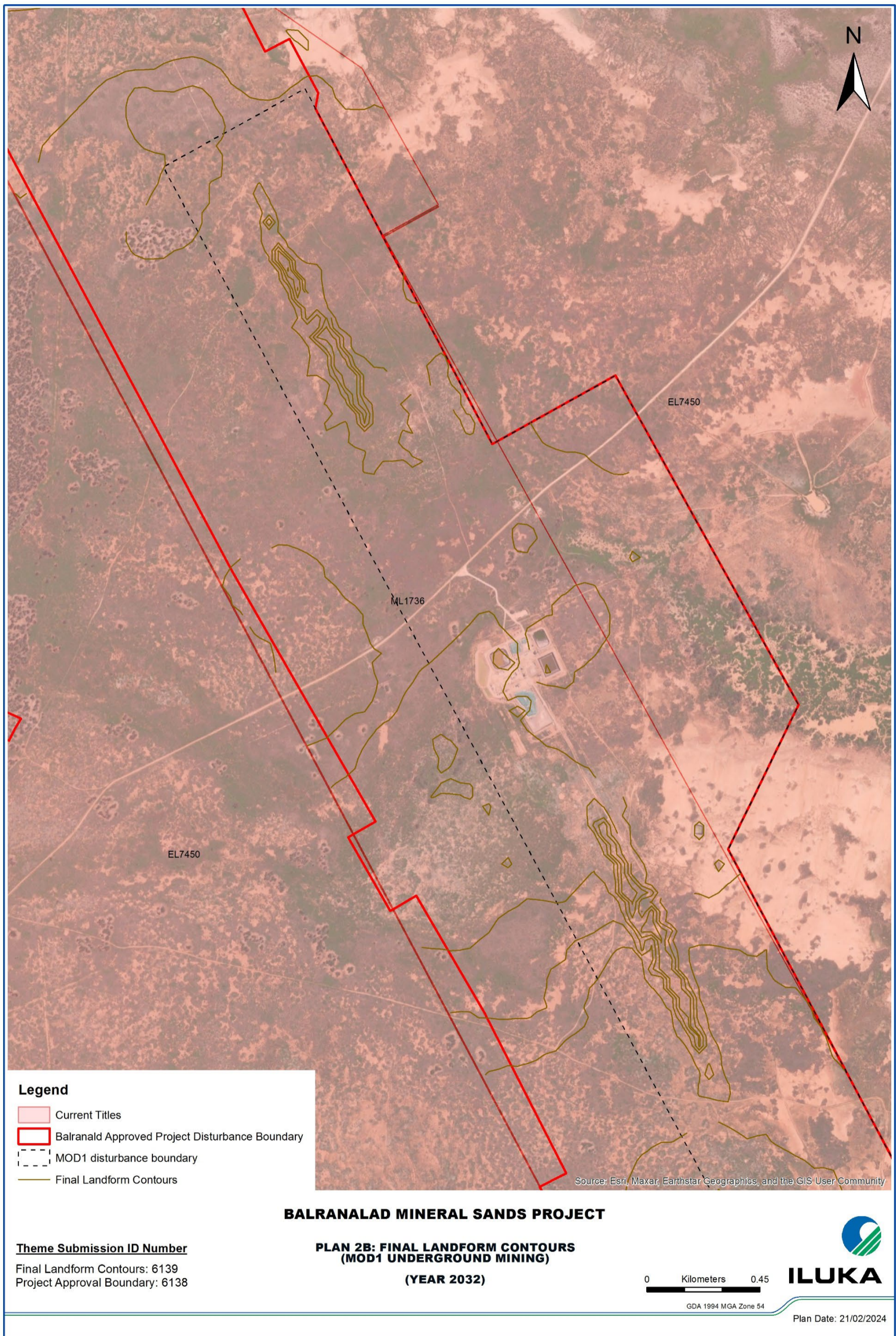


Figure 7 Plan 2B Final landform contours (Underground Mining Trial)

## 6 Part 6 - Rehabilitation implementation

### 6.1 Life of mine rehabilitation schedule

The life of Mine (LOM) schedule that is currently proposed is to construct the Underground Mining Trial at the West Balranald Mine within the approved MOD1 disturbance boundary, with the following infrastructure to be located within this area:

- processing plant infrastructure, comprising WCP, flotation plant and WHIMS plant;
- product and tails pad(s);
- process water, potassium amyl xanthate (PAX) and fines dams;
- underground mining infrastructure;
- temporary stockpiles (topsoil, subsoil and overburden);
- timber stockpiles (felled vegetation);
- hardstand and laydown areas;
- site offices, warehousing, workshops, amenities and carparking;
- services and utilities infrastructure;
- fuel storage and dispensing area;
- telecommunications tower;
- mine access road and accommodation camp; and
- internal access tracks and roadways.

Construction commenced in August 2023, with an estimated construction period of 18 months. Operations are scheduled to commence late 2025 with an operating period of up to six (6) years as approved.

The general assumptions and principals adopted for the LOM rehabilitation schedule and to ensure rehabilitation is undertaken progressively as soon as reasonably practical are:

- Temporary storage of growth media and biological material salvaged from infrastructure areas for future use in rehabilitation phases;
- Temporary storage of overburden, growth media and biological material salvaged from mine start-up areas for future use in rehabilitation phases;

- Progressive placement of coarse tailings into pre-prepared mining pits (voids) within the subsidence zone ahead of underground mining activities;
- Direct stripping and replacement of overburden and sub-soil to a height approximately 1-2m above natural ground level, encapsulating the sand tailings within mining pits ahead of underground mining activities (Referred to as prehab);
- Final landform establishment of subsidence zones when geotechnical stability monitoring informs it is safe to do so;
- Collection and storage of native seed from local provenance for use in seasonal revegetation programs; and
- Annual rehabilitation monitoring to track trajectory towards rehabilitation objectives and completion criteria.

The LOM rehabilitation plan for the Underground Mining Trial (MOD1) is attached in Appendix 2.

## 6.2 Phases of rehabilitation and general methodologies

Rehabilitation techniques will be further developed and refined over the life of the operation through a continual process of research, trialling, monitoring and improvement. As such, the information provided in this section does not constrain the operation in adopting alternative practices to achieve the nominated outcomes.

### *6.2.1 Active mining phase*

Environmental mitigation and management strategies will be implemented during the active phases of the Balranald project that will minimise the potential impacts on the environment. These include ensuring preclearance techniques are implemented, including heritage, fauna and flora, materials such as topsoil, substrates and native seed resources are recovered, collected and are appropriately managed and used effectively as resources for the rehabilitation of the site.

Rehabilitation during the active mining phase will be progressive and at a rate similar to that of underground mining operations. Some initial temporary stockpiling of overburden, sub-soil and topsoil is required to develop the start-up mining pits and associated stopes. Once mining commences, areas in front of underground mining activities will be prepared by direct stripping and placement of overburden and sub-soil to encapsulate coarse sand tailings within the mining pits. This process is referred to as "Prehab". Growth media will be placed once final landform contouring is completed after subsidence occurs. A conceptual cross section of the mining pits is shown in Figure 8.

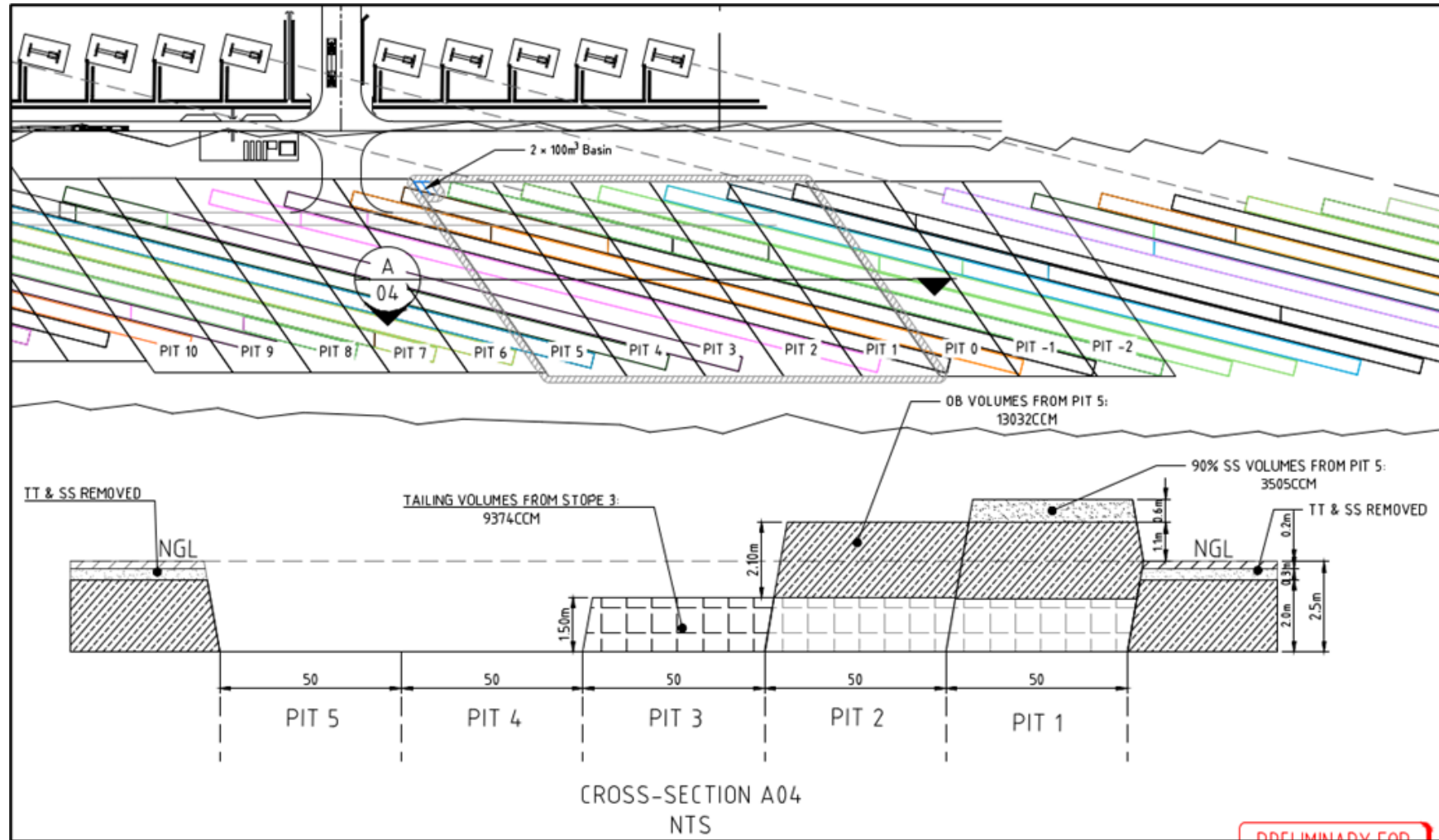


Figure 8 Backfill sequencing of mining pits

a) Soils and materials

Soil assessments have been undertaken throughout both the feasibility stages and EIS. The results of the pre-mining Land and Soil Capability (LSC) assessment range from class 5 to (predominantly) class 6 land that has severe to very severe limitations to agriculture. The results suggest that land use is best suited to grazing, some horticulture, forestry and nature conservation.

An assessment of the suitability of the topsoil and subsoil resources has found that most soils on the site would not be suitable for stripping or reuse (based on standard criteria), however it is considered that most soils can be stripped to pre-determined depths and reinstated for final landforms given appropriate stripping, handling and re-establishment techniques. The soils described in the West Balranald mine area will provide suitable growth medium for the predominant chenopod (saltbush and bluebush) and mallee vegetation. No deficit of soil resources is anticipated for life of mine rehabilitation. Figure 9 shows the proposed topsoil stripping depths for the West Balranald Mine.

General rehabilitation processes relating to soil and material management include:

- Installing appropriate erosion control measures.
- Soil stripping and clearing campaigns to be planned in advance to avoid extremes of weather (i.e. hot and windy).
- Optimising recovery of topsoil and subsoil separately by use of appropriate surface mobile equipment selection to limit mixing of the layers.
- Soil stockpiles to be constructed as to minimise erosion and sediment dispersion, ripping, seeding, drainage, soil binders)
- Herbicide spraying or scalping of weeds from topsoil stockpiles prior to re-spreading.
- The topsoil layer will be stripped to a nominal depth of between 100mm and 400mm depending on soil quality and topsoil depth mapping (Figure 9).
- Subsoil layers will be stripped to a depth of 100mm to 300mm depending on depth of topsoil stripped and soil conditions.
- On the mine path areas (above the mining pits) approximately a further 1.9m of Non-Saline Overburden (NSOB) will be stripped, to be used as capping over sand tails.
- Where stockpiling of soil is required, then topsoil will be stockpiled to a height of no more than 2m, whilst subsoil will be stockpiled to 10m.
- Topsoil, sub-soil and overburden will be progressively stripped and stockpiled separately or direct replaced where possible.





Figure 9 Topsoil stripping depths

## b) Flora

- Biological material (i.e. plant material and seeds) will be salvaged with topsoil to preserve the soil seed bank and enhance the organic properties of the topsoil.
- Vegetation cleared for construction and mining operations will be stockpiled for later use in rehabilitation (i.e. surface treatments and habitat enhancement).
- Native seed will be collected from local provenance and stored in a purpose built seed storage facility to maximise seed viability.
- Flora species selection will be based on monitoring of analogue sites within the applicable plant community type (PCT).
- Inspections for weed incursions will be undertaken biannually (in winter and summer), with high threat weeds controlled by application of herbicide and/or mechanical removal.

## c) Fauna

Management of fauna including threatened species is managed under Iluka's Biodiversity Management Plan (BMP). The BMP specifies the management measures that must be implemented to minimise impacts on habitat, targeted threatened species and other fauna during construction and operations.

Rabbit warrens have been identified within the West Balranald Mine disturbance area, and other feral animals such as goats, foxes and pigs are known to occur within the locality.

The following techniques will be employed by a suitably qualified and licensed operator/s when pest animal monitoring identifies a need for control:

- annual baiting for rabbits using 1080 (sodium fluoroacetate) and/or fumigation of rabbit burrows;
- mustering, trapping of goats; and
- annual baiting using 1080 (sodium fluoroacetate) for foxes and other feral predators (i.e. cats and pigs).

The above pest management measures will be carried out within areas under Iluka's control in conjunction with surrounding landowners and/or lessees where possible to increase the effectiveness of such programs.

Baiting is to be carried out in accordance with the NSW EPA Pesticide Control (1080 Bait Products) Order 2020 issued under section 38 of the NSW Pesticides Act 1999.

During the active mining phase, some cleared timber will be stockpiled for reuse in revegetation, including for use as fauna habitat (see section 6.2.5 for details on replacement of timber during rehabilitation).

## d) Overburden emplacement

Typical overburden for the site comprises of sands, clayey sands and clay layers with minimal rock.

Temporary overburden stockpiles will be constructed off the mine path during the initial development of the start-up mining pits, overburden will later be used for capping remaining course sand tails within the mining pits.

Once underground mining commences, approximately two (2) meters of overburden will be stripped from mining pits in advance of underground mining activities and direct replaced onto preceding mining pits to encapsulate course sand tails (Refer Figure 8).

No stockpiles or waste dumps are planned to remain on site once rehabilitation is complete.

e) Waste management

Putrescible waste generation will be disposed of in onsite skip bins, bins will remain covered at all times and replaced on a regular basis. Waste will ultimately be disposed at an appropriately licenced waste facility.

Liquid hydrocarbons will be stored within purpose built bunds to fully contain any leakage. Other hydrocarbon waste such as oil filters, fuel filters, oily rags and spill absorbents will be stored separately in plastic bins to prevent leakage of hydrocarbons. Hydrocarbon waste will be collected by a licenced third party contractor and disposed of at an appropriately licenced waste facility.

Soils contaminated with hydrocarbons will be collected by a licenced third party contractor and disposal to an appropriately licenced waste facility or an onsite hydrocarbon landfarm may be used to temporarily store contaminated soil for either onsite remediation and disposal in pit below the overburden layer or disposal offsite to an appropriately licenced facility.

f) Geology and geochemistry

The primary geochemical risks for stockpiling of ore and sand tails is the residual Potassium amyl xanthate (PAX) contained in these materials from the mineral separation process and Acid Mine Drainage (AMD), which have potential to runoff from stockpiles or seep into groundwater.

The PAX concentration in tails is expected to be low (5 mg/L) and the seepage water volume is limited. PAX is readily depleted by sorption and degradation during seepage, potential impacts to groundwater are therefore negligible.

The risk for AMD during temporary storage of ore and tails is moderate, but tails will be amended with lime to prevent and neutralise AMD. Slimes will be stored and maintained water saturated in a lined and engineered pond prior to reinjection.

Results of geochemical testing and industry standards will be used to inform the lime dosing rate. Amending sand tailings with lime will neutralise generated acid.

Course sand tails will be capped with approximately 2m of non-saline overburden, sub-soil and topsoil which will provide sufficient cover and provide a suitable growth medium for vegetation.

g) Material prone to spontaneous combustion

Not Applicable

h) Material prone to generating acid mine drainage

Geochemical assessments were undertaken as part of the EIS and MOD1 requirements and were based mainly around the potential for Acid Mine Drainage (AMD). The results of the assessment indicate that the

NSOB (non-Saline Overburden) and the SOB (Saline Overburden) are both NAF (Non-acid Forming), but the OOB (Organic Overburden) is PAF (Potential acid Forming) and must be managed as such.

Mining by-products do contain some sulphide minerals which may generate AMD during storage or permanent placement above ground. For instance, sand tails will be placed above mined stopes to raise the ground surface prior to expected subsidence and ground settlement. To minimise the risk of AMD generation and to neutralise potentially generated acid, these materials will be amended with lime sand and capped with approximately 2m of non PAF overburden. Geochemical testing has been performed on these materials and lime dosing will be designed to neutralise acidity. After implementation of AMD mitigation techniques, the presence of sulphide minerals in ore and mining by-products is not considered to pose risk to groundwater quality or rehabilitation outcomes.

The underground mining method reduces the risk of AMD considerably. In the underground mining method, sulphide minerals within the slimes and other minor tails streams will be reinjected into the mined strata. The ore naturally contains sulphides but the neutral pH of the aquifer indicates that in-situ oxidation is not occurring. The geochemical conditions in the LPS aquifer are therefore not conducive to further oxidation of sulphide minerals and AMD is not expected to occur once the materials have been reinjected into the aquifer. During processing and storage, tailings will be maintained water saturated to reduce sulphide oxidation and the water quality will be monitored. The pH will be adjusted if required prior to re-injection into the aquifer.

i) Ore beneficiation waste management (reject and tailings disposal)

Tailings generally consist of sand, slimes and flotation tails. The majority of tailings is course sand tailings and float tail and will be used to remediate areas of subsidence. Tailings will be placed in the mining pits to a thickness of approximately 0.5-1.5m and capped with approximately 2m of overburden material, sub-soil and topsoil.

The slimes are to be backfilled underground via re-injection, therefore pose no threat to rehabilitation.

j) Erosion and sediment control

Erosion and sediment controls will be implemented for the mine development area, designed generally in accordance with the principles described in the series Managing Urban Stormwater: Soils and Construction including Volume 1 (Landcom, 2004) and Volume 2E Mines and Quarries (DECC, 2008) and Volume 2A – Installation of Services and Volume 2C – Unsealed Roads, including the following measures:

- minimising surface disturbance and restricting access to undisturbed areas;
- use of Iluka's Site Disturbance Permit process that includes specification of area specific erosion and sediment controls;
- installing appropriate erosion and sediment controls prior to disturbance of any land and around soil stockpile areas;
- progressive rehabilitation/stabilisation of disturbance areas;
- storing soil stockpiles at appropriate distances from watercourses;

- stabilise soil stockpile surfaces with vegetation or commercial soil binder as soon as practicably possible if required;
  - separation of runoff from disturbed and undisturbed areas, where practicable;
  - construction of surface drains to control and manage surface runoff;
  - reducing the flow rate of water across exposed surfaces and in areas where water concentrates (e.g., through use of coir logs or cross ripping);
  - construction of sediment dams to contain runoff up to a specified design criteria; and
  - treating rehabilitation areas to promote infiltration (e.g. cross ripping ripping)
- k) Ongoing management of biological resources

Biological resources will be managed throughout the mining and production phases to maintain their integrity by the following techniques:

- The topsoil and subsoil from different vegetation communities will be stockpiled separately where practicable, with records maintained.
- Topsoil stripping principal aim is to maintain or retain biological activity in the topsoil.
- Handling equipment and contractors to be both fit for purpose .
- Care not to mix soil layers whilst stripping- depths may change unexpectedly – poorer quality material to go as subsoil, so as not to contaminate topsoil.
- Stockpiling of cleared vegetation for use in rehabilitation (i.e. surface treatment and/or habitat enhancement).

Topsoil management measures that are to be used to maintain the viability of the topsoil seedbank.

- Topsoil stockpiles to be no more than 2m high and subsoil no more than 10m high
- Vehicle access to stockpiles controlled
- Weeds to be monitored and controlled
- Erosion control to be put in place
- Stockpiles or soil that is direct replaced to be recorded in an inventory to include time of placement, material depth, soil type, condition and volumes to ensure known history.
- Apply an ameliorant as required to minimise erosion.

Required depth of topsoil replacement for optimal germination and growth.

- A minimum of 100mm of topsoil is required to be replaced as any less there is a risk of mixing with the soil below and losing its quality.

- Topsoil is planned to be replaced at 100mm-400mm, dependent on stripping depths.
- Subsoil is planned to be replaced at 100-300mm, dependent on stripping depths.

l) Mine subsidence

Subsidence is managed in accordance with Iluka's Subsidence Management Plan.

It is estimated that the subsidence trough may extend up to approximately 200 m-wide laterally across the deposit.

The subsidence prediction relating to the new underground mining method is complex and that the observed subsidence is likely to exhibit variability (over both space and time) and is therefore difficult to quantify to a high level of accuracy.

To account for the predicated subsidence, a constructed landform approximately 0.5-2m above natural ground level will mitigate the majority of surface subsidence and ensure a stable landform can be achieved for a successful rehabilitation outcome.

Subsidence monitoring and geotechnical investigations will inform when it is safe to traverse SME for final landform establishment and top soil replacement. Ongoing monitoring will inform any required changes to operations to mitigate subsidence risk. Subsidence monitoring results will be included in the Annual Review and comparisons against predictions in the EIS discussed.

m) Management of potential cultural and heritage issues

The management of Aboriginal cultural heritage is undertaken in accordance with the Aboriginal Cultural Heritage Management Plan (ACHMP). Salvage activities have been undertaken within the proposed MOD1 disturbance area.

If an unknown Aboriginal site is discovered, the Trigger Action Response Plan described in the ACHMP will be implemented.

There are no rehabilitation obligations arising from the ACHMP.

n) Exploration activities

Iluka has a standard work instruction for the rehabilitation of drill sites. Drill holes will be rehabilitated upon completion of any drilling program in accordance with the *Exploration Code of Practice: Rehabilitation* (NSW Resources Regulator).

### 6.2.2 Decommissioning

Decommissioning will include the disconnection of services, demolition and/or removal of all surface infrastructure including water infrastructure.

Water storage infrastructure, including the ponds and dams, will be decommissioned and rehabilitated as follows:

- HDPE liners, geofabric and ancillary infrastructure will be removed from site and disposed to an appropriately licenced waste facility.

- Earthen walls will be contoured

Other site infrastructure will be removed as follows:

- Redundant buildings and large infrastructure (including the hardstand area and drill pad) will be decommissioned and removed from site.
- Redundant internal access road material will be rehabilitated
- Redundant fences and gates will be rehabilitated
- Overburden and Mining by-products will be used to backfill the cavities as much as possible.

#### **a) Site security**

The site is currently fully fenced and locked to prevent any inadvertent or public access. There are signs on the boundary fence indicating that the site is a mine site and no unauthorised access allowed. The site is inspected regularly by Iluka staff and accessed regularly. The subsidence zone is fenced separately, gates locked and signposted.

Once rehabilitation is adequately progressed and safety risks have been reduced to acceptable levels, site fencing may be removed or amended, in accordance with the final land use.

#### **b) Infrastructure to be removed or demolished**

Redundant infrastructure will be decommissioned and removed during rehabilitation. Generally, decommissioning activities will include:

- purging and disconnecting services (e.g. air, water);
- removal of fuel, lubricants and other chemicals from storage facilities, pumps and pipelines;
- disconnect, dismantle and relocation of plant and equipment nominated for sale or re-use;
- demolition and removal of redundant fixed plant and infrastructure;
- decommission bores and water tanks;
- removal of concrete hardstands, bitumen and footings;
- removal of pumps, pipes and liners from redundant dams and drains;
- removal of power poles and associated infrastructure;
- removal of redundant major underground services; and
- removal of any rubbish and scrap.

#### **c) Buildings, structures, and fixed plant to be retained**

Some infrastructure may be retained post closure if it is compatible with the final land use and approval has been obtained for infrastructure to remain. Examples of infrastructure that could be retained include:

- roads;
- utility infrastructure such as powerlines, railway and the gas pipeline;

- surface water management infrastructure; and
- sheds or workshops.

**d) Management of carbonaceous / contaminated material**

Carbonaceous material is not relevant to the Balranald Project (for information on management of hydrocarbons, refer to subsection e)).

Potential contamination will be managed in accordance with the *Contaminated Land Management Act, 1997*.

Stockpile storage areas during decommissioning will be tested for potential contamination and the ability to form acid and be treated accordingly with lime or removed and buried on the mine path.

**e) Hazardous materials management**

Any unused hazardous substances will be removed and disposed of in accordance with regulatory requirements.

**f) Underground infrastructure**

Underground infrastructure includes mining stopes access holes, concrete footings and pipes.

Mining equipment used for directional drilling will be removed. Underground pipes will be dug up and removed, where practicable. Bores will be decommissioned in accordance with Minimum Construction Requirements for Water Bores in Australia 2020.

Any concrete footings will be removed to 0.5 meter below the ground surface and disposed of at a lawful location.

### *6.2.3 Landform establishment*

For future works once the required infrastructure is removed, the land surface will be reprofiled to be relatively consistent with adjacent landforms.

**a) Water management infrastructure**

The water management system will be maintained, where necessary to reinstate the natural drainage as much as possible to convey large rainfall run off events.

**b) Final landform construction: general requirements**

The final landform will replicate the original landform as much as possible and be compatible with the surrounding environment.

- Areas reprofiled to manage surface water drainage and to tie in with surrounding natural ground levels.
- Natural drainage lines to be incorporated into final landforms
- Drainage structures designed to minimise erosion potential, if necessary.

**c) Final landform construction: reject emplacement areas and tailings dams**



- Tailings emplacements ahead of underground mining will be amended with lime prior to placement to neutralise any acidity.
- Tailings will be capped with a minimum of 2m of non-saline overburden material.

**d) Final landform construction: final voids, highwalls and low walls**

Not applicable to the MOD1 underground mining trial. Should an open cut method be adopted in the future this RMP will be revised to address rehabilitation of any final voids.

**e) Construction of creek/river diversion works**

Not applicable to the MOD1 underground mining trial. Should an open cut method be adopted in the future this RMP will be revised to address rehabilitation of any affected significant waterways.

#### ***6.2.4 Growth medium development***

Once the landform profile has been established, the following temporary stabilisation works will commence:

- Subsoil that was removed during construction will be replaced from stockpiles or direct returned
- Topsoil will be replaced from stockpiles or direct returned.
- Dry and/or compacted soils will be ripped to improve water infiltration, if required.
- Batter slopes will be contour ripped to minimise erosion. If available, felled vegetation may also be spread across batters to aid in erosion control and trap seed.
- Weed and pest animal management will be undertaken as required.
- Soil binders or stabilisation agents will be investigated and used if required.

#### ***6.2.5 Ecosystem and land use establishment***

Due to the novel underground mining method there will be subsidence at surface within the mining zone. It is proposed that the following revegetation methods will be used to minimise risks associated with subsidence.

- Native seed from local provenance will be collected and stored in a purpose built seed store for seasonal seeding programs.
- Direct replacement of overburden and subsoil on areas ahead of underground mining.
- Contour shaping and ripping of surface post mining and subsidence.
- Direct seeding of areas after topsoil placement.
- Direct tree seeding or tube stock planting in applicable vegetation communities.

#### ***6.2.6 Ecosystem and land use development***

Activities in this phase are generally ongoing maintenance and land management activities. Maintenance activities may include:

- Weeds and feral animal control activities

- Maintenance of exclusion fencing
- Management of bushfire risks
- Erosion management or repair and water management
- Re-planting or re-seeding failed revegetation areas
- Watering trees

### 6.3 Rehabilitation of areas affected by subsidence

Subsidence monitoring is undertaken in accordance with the Subsidence Management Plan. Whilst there have been several known subsidence events during the bulk sampling trials (2015-2020), there have been no subsidence events outside of the potential known impact areas.

It is anticipated that there will be subsidence at surface associated with MOD1 underground mining within the constructed landform. When safe to do so, reshaping may be required to achieve the final landform design. Subsidence will be monitored to ensure the proposed rehabilitation methods are adequate long term in achieving the final land use. Should subsidence be less impactful than predicted, opportunities for direct replacement of topsoil prior to underground mining subsidence will be investigated.

## 7 Part 7 – Rehabilitation quality assurance process

A rehabilitation quality assurance process is to be implemented throughout all stages of the Balranald Project. Table 9.

The aim of the rehabilitation quality assurance process is to ensure that:

- Rehabilitation materials are identified, collected and preserved as required for rehabilitation use.
- Rehabilitation is being implemented and rehabilitation techniques are being followed per current methodologies and schedules.
- Rehabilitation risks are being monitored and addressed as required, and any new risks identified and controlled as required.

*Table 9 Rehabilitation quality assurance*

Phase	Quality assurance action or process	Responsible person	Documentation	Review
Active Mining	Develop and maintain a materials and soils balance	Rehabilitation Advisor/Surveyor	GIS or alternative mine planning software;	Annual Rehabilitation Report

Phase	Quality assurance action or process	Responsible person	Documentation	Review
	Implement environmental monitoring program	Environmental Advisor	Environmental monitoring database (e.g. Monitor Pro); Analysis reports; Inspection records; Loss control system.	Annual Rehabilitation Report
Decommissioning	Inspections and decommissioning reports	Rehabilitation Advisor	Closure reports	Annual Rehabilitation Report
	Contaminated soils testing post decommissioning	Environmental Advisor	Soil sample results	Annual Rehabilitation Report
Landform Establishment	Prepare 'as-built' drawings to verify that the landform has been completed in accordance with design	Surveyor	GIS or alternative mine planning software;	Annual Rehabilitation Report
	A subsidence monitoring program will be implemented as per approved subsidence management plan	Geotechnical Engineer/Surveyor	Subsidence monitoring report	Annual Rehabilitation Report
Growth Medium Development	Site records and survey of re spread of topsoil, subsoil, soil ameliorants, any ripping or compaction undertaken, Soil testing results for application of lime or other ameliorants	Rehabilitation Advisor/ Surveyor	GIS or alternative mine planning software;	Annual Rehabilitation Report
Ecosystem and Land Use Establishment	As per section 8.2	Rehabilitation Advisor	As per section 8.2	Annual Rehabilitation Report
Ecosystem and Land Use Development	As per section 8.3	Rehabilitation Advisor	As per section 8.3	Annual Rehabilitation Report

## 8 Part 8 - Rehabilitation monitoring program

During mine site rehabilitation, environmental monitoring will continue as required by environmental approvals and conditions. The monitoring program will be implemented to collect the data required to assess rehabilitation success against completion criteria. The monitoring program also outlines remedial actions that may be required if rehabilitation and closure performance is not on track, or completion criteria cannot be met. If at this time it is found that areas or aspects of rehabilitation do not meet the specified criteria, a risk assessment will be undertaken. This risk assessment will determine:

- if the closure objective has been achieved;
- the level of residual risk; and
- what (if any) additional work is required to manage the residual risk.

### 8.1 Analogue site baseline monitoring

Vegetation surveys were conducted on the Balranald Project site to inform the environmental impact and future approval applications application. The need for any further analogue sites will be determined when completion criteria for revegetation are confirmed.

Comparison of rehabilitation success indicators against analogue sites is the preferred method of monitoring. Analogue sites will be selected based on the following criteria:

- appropriate representation of the final land use;
- accessibility to site staff;
- unlikely to be impacted by mining operations or other land use for the life of the mine.

Once established, analogue monitoring sites will be shown on a map in future RMP versions.

### 8.2 Rehabilitation establishment monitoring

Monitoring during the rehabilitation establishment period will be conducted to identify if any early intervention measures are required. Requirements for rehabilitation establishment monitoring is developed in consideration of the TARP and the proposed completion criteria.

#### *8.2.1 Landform survey*

After landform establishment and post subsidence, the area is surveyed to confirm it is built to the design. Landforms are to be relatively commensurate with the surrounding landscape. The survey data will be used to guide topsoil placement to ensure the correct soil profile is established.

#### *8.2.2 Rehabilitation inspections*

Monthly inspections of the rehabilitation areas by the Rehabilitation Advisor. The purpose of the monthly inspections is to maintain regular oversight of the rehabilitation areas and activities and provide an early

indication of issues present within one or more of the areas. Observations of the following rehabilitation properties will be made, recorded and actioned in accordance with the TARP:

- visual signs of vegetation stress (e.g. discoloration and die-back);
- weed presence;
- pest fauna presence (e.g. direct observations, scats, evidence of grazing);
- subsidence, erosion, slumping and surface water management;
- fencing condition;
- soil contamination; and
- rehabilitation resources (stockpiles, seed, felled vegetation)

### 8.3 Measuring performance against rehabilitation objectives and rehabilitation completion criteria

Completion criteria provide the evidence that indicates the rehabilitation has successfully been completed or is at a stage that has been recognised as per the completion criteria. Completion criteria need to be appropriate for the level of disturbance and surrounding environment, they need to be achievable with what resources are readily available and they must make sense whilst having some sort of specific or scientific target that can be measured or accounted for.

Measuring completion criteria for the site as a whole will be further refined as the project matures and mining methodologies are further investigated and confirmed. The complete set of objectives and proposed completion criteria for the site is outlined in Table 7.

Completion criteria are not required to be approved by the NSW Resources Regulator until no later than three years before rehabilitation of the whole (or an identified part) of the mining area is proposed to be completed.

## 9 Part 9 - Rehabilitation research, modelling and trials

### 9.1 Current rehabilitation research, modelling and trials

A key risk is the potential for acid and metalliferous drainage (AMD) from the tailings within the containment cells and migration of contaminants and acidity into the groundwater system. As part of the Pre-feasibility Study (PFS) and Definitive Feasibility Study (DFS), the use of limestone was proposed to mitigate the effects of AMD (Earth Systems, 2015).

A suitably qualified third party has been engaged to provide technical advice on limestone blending methodology and ratios to ensure the acid neutralisation capacity (ANC) is greater than the maximum potential acidity (MPA), which can be supported by an adaptive management approach using Trigger Action Response Plans (TARP) to ensure water quality remains in compliance and risk of AMD is negligible.

### 9.2 Future rehabilitation research, modelling, and trials

Literature review and research to assist in the definition of site specific, achievable completion criteria for landform stability and revegetation.

Native seed germination trials in different growth mediums (NSOB, subsoil and topsoil) may be undertaken to determine the suitability of different soil resources to support plant growth and identify any mediums that are recalcitrant for seed germination. This will inform if mixing of topsoil, subsoil and OB during subsidence will have any implications on vegetation establishment.

Modelling of final landforms may be undertaken using specialised software to ensure long term stability can be achieved.

## 10 Part 10 - Intervention and adaptive management

### 10.1 Trigger action response plan (TARP)

A Trigger Action Response Plan (APPENDIX 1) has been developed to provide for adaptive management that can be implemented in the event of poor performance or unexpected results from the rehabilitation effort.

The TARP takes a risk assessment-based approach to the identification of issues, proposed contingency measures and their trigger values when unexpected impacts to stabilisation and rehabilitation activities or variations to the care and maintenance phase occur.

The rehabilitation monitoring program will allow for adaptive management by reviewing performance from the stabilised area, evaluating substandard performance, the probability of an event occurring; evaluating the consequence; and using a risk-based approach to determine trigger levels action may be required. The TARP can be reviewed in response to the ongoing monitoring data and identification of substandard performance.

The TARP addresses the following risks to rehabilitation:

- Surface subsidence
- Biological resource salvage
- Landform stability and erosion and sediment control
- Ground disturbance and heritage items
- Infrastructure
- Hazardous material/ saline material
- Acid Mine Drainage
- Vegetation establishment
- Weed
- Feral fauna
- Weather and climate influences

## 11 Part 11 - Review, revision, and implementation

This Plan will be reviewed and updated in accordance with relevant statutory triggers, as summarised in Table 10.

*Table 10 Statutory triggers to review RMP*

Statutory triggers to reviewing the rehabilitation management plan	
SSD-5285 Schedule 5 Condition 4	<p>Revision of Strategies, Plans and Programs</p> <p>5. Within 3 months of the submission of:</p> <ul style="list-style-type: none"> <li>(a) annual review under condition 4 above.</li> <li>(b) incident report under condition 6 below.</li> <li>(c) audit under condition 8 below; or</li> <li>(d) any modification to the conditions of this consent (unless the conditions require otherwise),</li> </ul> <p>The Applicant shall review and, and if necessary, revise the strategies, plans and programs required under this consent to the satisfaction of the Secretary.</p> <p>Where this review leads to revisions in any such document, then within 4 weeks of the review of the revised document must be submitted to the Secretary for approval</p>
Mining Regulation 2016 Schedule 8A Clause 11.	<p>11 Amendment of rehabilitation management plans</p> <p>The holder of a mining lease must amend the rehabilitation management plan for the mining lease as follows –</p> <ul style="list-style-type: none"> <li>(a) To substitute the proposed version of a rehabilitation outcome document with the version approved by the Secretary – within 30 days after the document is approved</li> <li>(b) As a consequence of an amendment made under clause 14 to a rehabilitation outcome document – within 30 days after the amendment is made,</li> </ul>

	<p>(c) To reflect any changes to the risk control measures in the prepared plan that are identified in a rehabilitation risk assessment – as soon as practicable after the rehabilitation risk assessment is conducted</p> <p>(d) Whenever given written direction to do so by the Secretary – in accordance with the direction</p>
Process for ensuring mining and rehabilitation activities are being conducted in accordance with the rehabilitation management plan	
SSD-5285 Schedule 5 Condition 8 - Auditing	<p>Auditing</p> <p>8. Within 1 year of the commencement of construction, and every 3 years thereafter, unless the Secretary directs otherwise, the Applicant shall commission and pay the full cost of an Independent Environmental Audit of the development. This audit must;</p> <p>(a) Be conducted by a suitably qualified, experienced and independent team of experts whose appointment has been endorsed by the Secretary;</p> <p>(b) Include consultation with the relevant agencies;</p> <p>(c) Assess the environmental performance of the development and assess whether it is complying with the requirements in this consent, and any other relevant approvals, EPL's; and/or mining lease/s;</p> <p>(d) Review the adequacy of any approved strategy, plan or program required under the abovementioned approvals; and</p> <p>(e) Recommend measures and actions to improve the environmental performance of the development, and/or any strategy, plan or program required under these approvals</p>



## APPENDIX 1- Trigger Action Response Plan

This TARP has been developed to respond to occurring or emerging threats to rehabilitation and includes a number of contingency responses that will be implemented if appropriate to mitigate possible impacts to successful rehabilitation.

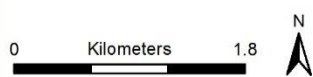
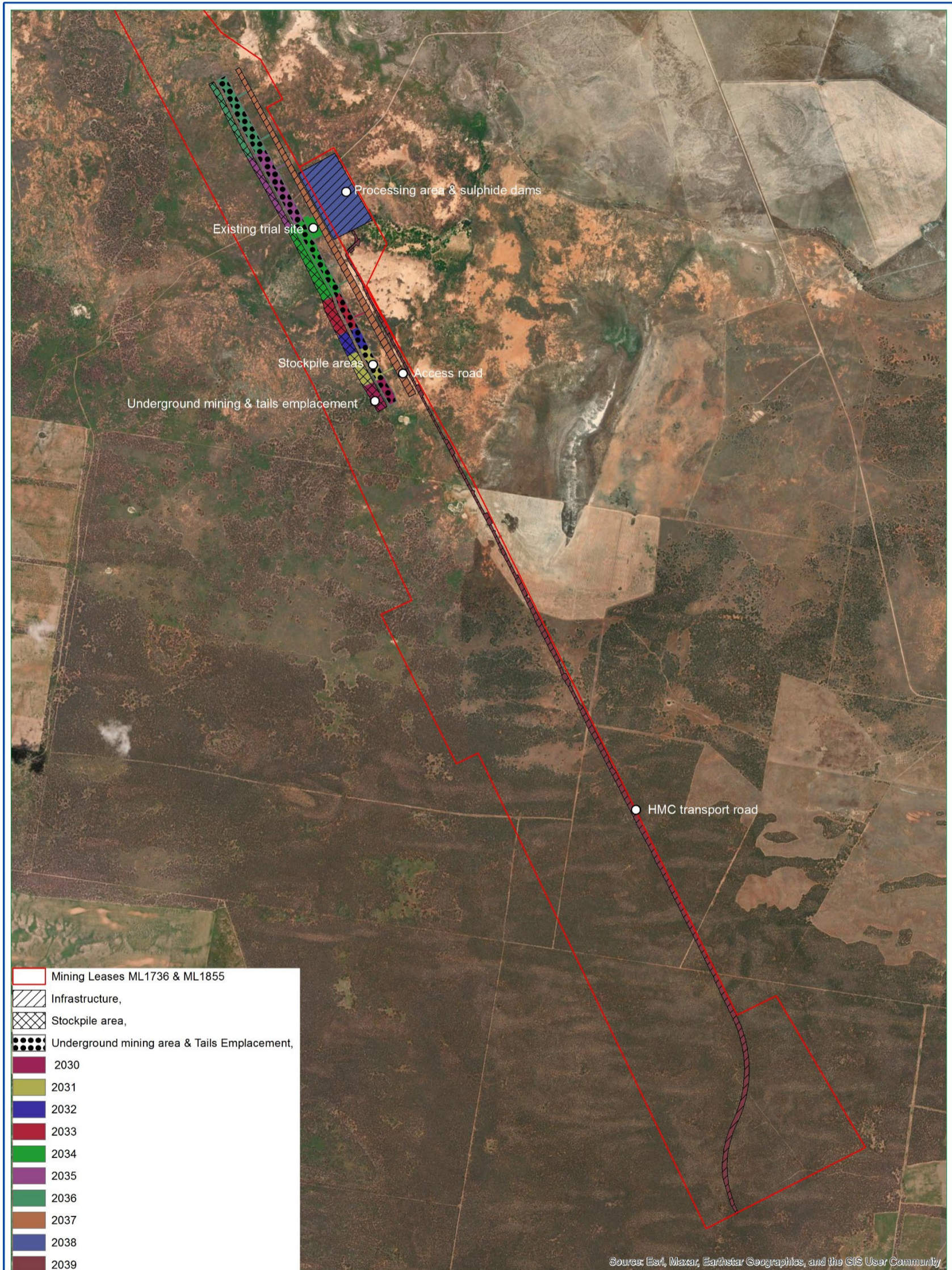
Rehabilitation Risk	Consequence/Hazard	TARP	Contingency Response
Surface subsidence	Erosion of landform	Trigger	<ul style="list-style-type: none"> <li>Subsidence greater than anticipated</li> <li>Sinkholes develop</li> </ul>
		Action	<ul style="list-style-type: none"> <li>Regrade/reshape area to backfill voids or sink holes using remote operated SME.</li> <li>Monitor for erosion</li> </ul>
Biological resource salvage – topsoil and timber	Insufficient topsoil	Trigger	<ul style="list-style-type: none"> <li>Quality control monitoring confirms desired topsoil replacements cannot be met</li> <li>Topsoil materials volumes are less than required for closure and capping</li> </ul>
		Action	<ul style="list-style-type: none"> <li>Review mine planning calculations especially volume accounting</li> <li>Review topsoil management procedure to allocate stripping more at the changed requirements if possible or review capping requirements based on stockpiled volume</li> </ul>
	Loss of topsoil or damage to topsoil in stockpiles	Trigger	<ul style="list-style-type: none"> <li>Quality control monitoring identifies topsoil stockpiles damaged due to saline water use, or compacted from trafficking of vehicles, or weed incursion</li> </ul>
		Action	<ul style="list-style-type: none"> <li>Undertake investigation including soil sampling if required</li> <li>Scalp contaminated area off and use as subsoil or OB depending on soil tests</li> </ul>

Rehabilitation Risk	Consequence/Hazard	TARP	Contingency Response
			<ul style="list-style-type: none"> <li>Ameliorate with lime, ripping or spray weeds as required</li> </ul>
	Timber resource not collected	Trigger	<ul style="list-style-type: none"> <li>Timber resources damaged (burnt) or not sufficient for rehabilitation</li> </ul>
		Action	<ul style="list-style-type: none"> <li>Ensure timber resources are collected and stored appropriately</li> <li>Timber resource management to be included in a Procedure</li> </ul>
Landform stability Erosion and sedimentation control	Stabilisation fails and erosion/ sedimentation occurs	Trigger	<ul style="list-style-type: none"> <li>Landform design parameters are inadequate allowing run off to cause erosion</li> <li>Erosion monitoring indicates lack of stability with gully erosion or rill erosion &gt;200mm occurring</li> </ul>
		Action	<ul style="list-style-type: none"> <li>Review quality control procedures to ensure landforms built to design</li> <li>Review landform design parameters</li> <li>Repair areas of erosion &gt;200mm</li> <li>Review water management and structures, implement water management diversions or structures</li> </ul>
Infrastructure	Material or hydrocarbon spill	Trigger	<ul style="list-style-type: none"> <li>Material spill from remaining infrastructure</li> </ul>
		Action	<ul style="list-style-type: none"> <li>Clean up any spillage and make area safe</li> <li>Check quality control to ensure area was made safe and stable for care and maintenance period</li> <li>Undertake regular site inspections</li> </ul>

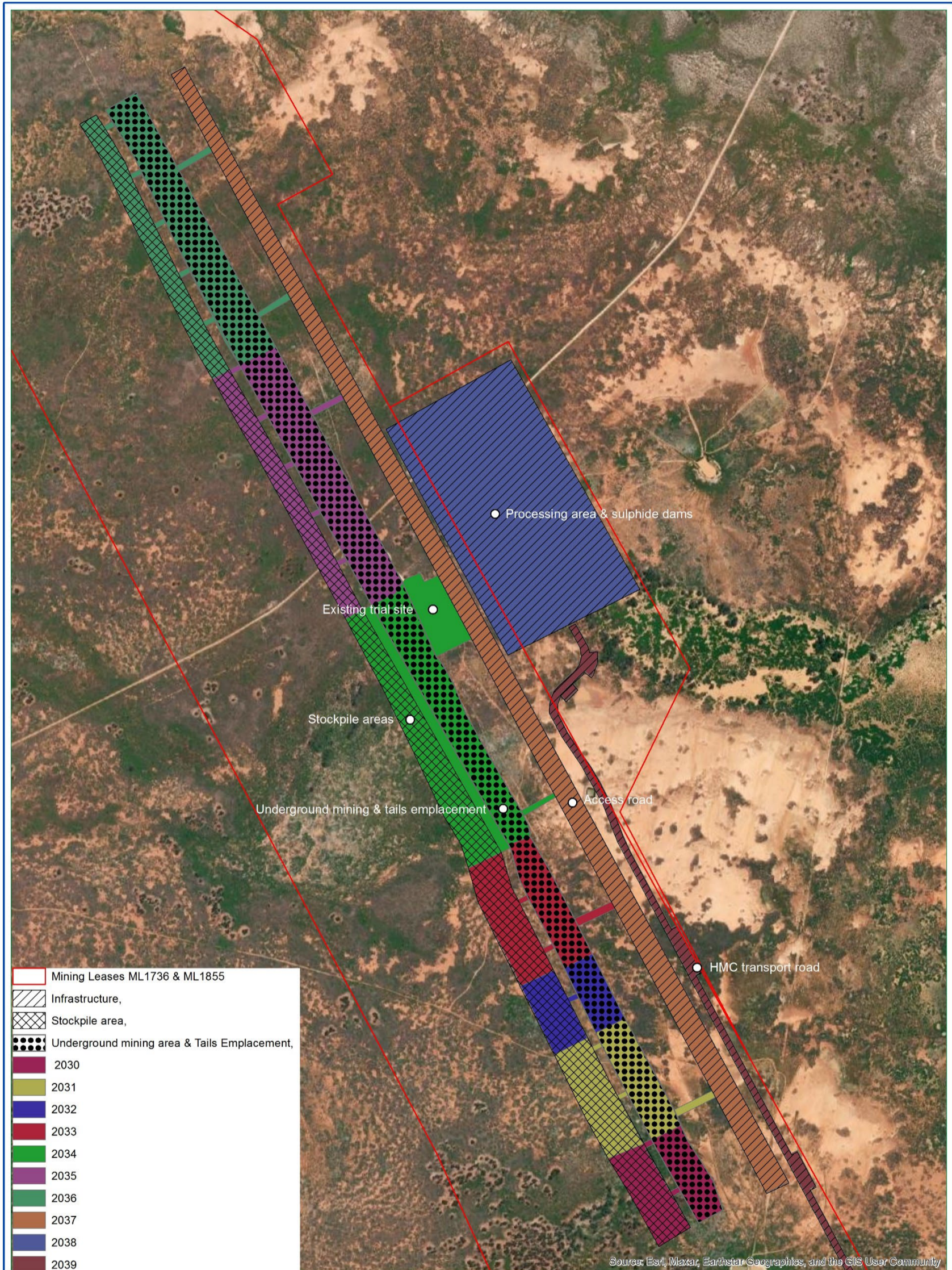
Rehabilitation Risk	Consequence/Hazard	TARP	Contingency Response
Hazardous material / saline material	Site contamination from AMD	Trigger	<ul style="list-style-type: none"> <li>Inadvertent spillage or leakage of hazardous material</li> </ul>
		Action	<ul style="list-style-type: none"> <li>Review/repair capping requirements for AMD producing materials</li> <li>Undertake further review to determine extent and causal factors to establish remediation requirements</li> <li>Application of any required ameliorants</li> </ul>
Vegetation establishment	Self-regeneration from topsoil seed bank ineffective	Trigger	<ul style="list-style-type: none"> <li>Rehabilitation monitoring determines that the recruitment of native vegetation from natural regeneration is less than adequate</li> </ul>
		Action	<ul style="list-style-type: none"> <li>Investigate and implement as required reseed/tubestock options</li> <li>Undertake soil samples to check soil quality parameters which may inhibit plant growth</li> <li>Compare against analogue site and climatic conditions as well as previous monitoring results</li> </ul>
Weeds	Excessive weed growth	Trigger	<ul style="list-style-type: none"> <li>Rehabilitation monitoring determines excessive weeds present which are detrimental to the rehabilitation program</li> </ul>
		Action	<ul style="list-style-type: none"> <li>Undertake weed control or management as per the weed management plan</li> <li>Will need to be timed for appropriate season for spraying and preferably before seed set</li> </ul>
Feral fauna	Damage to rehabilitated areas,	Trigger	<ul style="list-style-type: none"> <li>Increase in population abundance as identified through regular</li> </ul>

Rehabilitation Risk	Consequence/Hazard	TARP	Contingency Response
	competition with native fauna for resources		inspections and/or the rehabilitation monitoring
		Action	<ul style="list-style-type: none"> <li>• Check exclusion fences and access to water points around the rehabilitation areas</li> <li>• Undertake management consistent with the Pest management plan to reduce the population density to an acceptable level</li> </ul>
Weather and climate influences	Weather conditions turn dry and not conducive to vegetation establishment (drought conditions) or alternatively adverse conditions such as flooding, or bushfire affect rehabilitation	Trigger	<ul style="list-style-type: none"> <li>• Dry conditions delay vegetation germinations</li> <li>• Dry conditions damage vegetation after initial establishment</li> <li>• Adverse conditions prevent germination or damage vegetation</li> </ul>
		Action	<ul style="list-style-type: none"> <li>• Review affected areas and outline actions to rectify</li> <li>• Ensure progressive rehabilitation to spread risk over various seasons</li> </ul>

## APPENDIX 2- Life of Mine Rehabilitation plan



**BALRANALD MINERAL SANDS MINE  
LIFE OF MINE PLAN (MOD1)**



0 Kilometers 0.45



**BALRANALD MINERAL SANDS MINE  
LIFE OF MINE PLAN (MOD1)**



ORIG: B.Isaacs

DRAWN: B.Isaacs

SCALE (A3): 1:14,275

DATE: 9/05/2024

DWG No:

**FIGURE:1B**

GDA2020 MGA Zone 54

L:\Data\MurrayBasin\Balranald\Environmental\Design files\Rehabilitation\Rehabilitation Schedule.mxd



# RMP Rev2

Final Audit Report

2024-05-27

Created:	2024-05-22
By:	Brendan Isaacs (brendan.isaacs@iluka.com)
Status:	Signed
Transaction ID:	CBJCHBCAABAAozzQpLL_t4sdLEsgCRzkR0hRuC6WOInR

## "RMP Rev2" History

-  Document created by Brendan Isaacs (brendan.isaacs@iluka.com)  
2024-05-22 - 6:54:46 AM GMT- IP address: 163.116.202.21
-  Document emailed to Dave Wright (Dave.Wright@iluka.com) for signature  
2024-05-22 - 6:55:22 AM GMT
-  Email viewed by Dave Wright (Dave.Wright@iluka.com)  
2024-05-22 - 8:13:19 AM GMT- IP address: 163.116.202.28
-  Document e-signed by Dave Wright (Dave.Wright@iluka.com)  
Signature Date: 2024-05-27 - 0:32:33 AM GMT - Time Source: server- IP address: 163.116.215.78
-  Agreement completed.  
2024-05-27 - 0:32:33 AM GMT