



Application for Licence Amendment

Part V Division 3 of the *Environmental Protection Act 1986*

Licence Number	L5206/1987/10
Licence Holder	Wiluna Operations Pty Ltd
ACN	166 954 525
File Number	2012/006906-1
Premises	Wiluna Mine Site WILUNA WA 6646 Legal description – Being Mining tenements M53/30, M53/32, M53/468, L53/62, L53/20, M53/64, G53/18 and G53/19 part tenements M53/40, M53/44, M53/50, M53/26, M53/6, M53/95, M53/96, M53/200, M53/69, M53/24 L53/50 and L53/77 as defined by the coordinates in Schedule 2.
Date of Report	18 November 2021
Decision	Revised licence granted

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1. Decision summary

Wiluna Operations Pty Ltd (the Licence Holder) currently holds Licence L5206/1987/10 under Part V of the *Environmental Protection Act 1986* (EP Act) for the Wiluna Mine Site (the Premises), for prescribed categories 5, 6, 57, 63, 64 and 85.

This Amendment Report documents the assessment of potential risks to the environment and public health from proposed changes to the emissions and discharges during the construction and operation of the Premises. As a result of this assessment, Revised Licence L5206/1987/10 has been granted.

The Revised Licence has been granted in a new format with existing conditions being transferred, but not reassessed, to the new format.

2. Scope of assessment

2.1 Regulatory framework

In completing the assessment documented in this Amendment Report, the department has considered and given due regard to its Regulatory Framework and relevant policy documents which are available at <https://dwer.wa.gov.au/regulatory-documents>.

2.2 Application summary

On 16 July 2021, the Licence Holder submitted an application to the Department to amend Licence L5206/1987/10 under section 59 and 59B of the EP Act. The following amendment is being sought:

- To allow the construction and operation of the Stage 2 embankment raise to Tailings Storage Facility (TSF) K.

This amendment is limited only to changes to Category 5 activities from the Existing Licence. No changes to the aspects of the existing Licence relating to Category 6, 57, 63, and 64 have been requested by the Licence Holder. Table 1 below outlines the proposed changes to the existing Licence.

Table 1: Proposed design changes

Prescribed Premises category and description	Current throughput capacity	Proposed throughput capacity	Description of proposed amendment
5: Processing or beneficiation of metallic or non-metallic ore.	2,200,000 tonnes per annual period.	No change.	The Stage 2 embankment raise will accommodate an additional 6 million tonnes (Mt) of storage capacity for tailings generated by the processing plant over 27 months, bringing the total volumes of tailings stored at TSF K to 9.4 million tonnes per annum (mtpa).

2.3 Legislative context and other approvals

2.3.1 Mining Act 1978 – Mining Proposal

A mining proposal (MP) was submitted to the Department of Mines, Industry and Safety (DMIRS) on 21 October 2021 seeking approval for the proposed Stage 2 embankment raise to TSF K (Registration ID:100378). The MP is currently under assessment. The project was initially submitted under a larger MP (Registration ID:96162) that incorporated a number of projects, however was removed due to the timeframes for this proposal.

2.3.2 Environmental Protection Act 1986 – Native Vegetation Clearing Permit

The Applicant was granted a native vegetation clearing permit (CPS 8354/1) on 28 March 2019 under section 51E of the EP Act. The permit, which is valid until 19 April 2024 authorises the clearing of up to 375 hectares of native vegetation for the purposes of mineral production and associated activities. The approved clearing envelope includes the area surrounding TSF K, however the Applicant has advised that no clearing is required for the proposed construction works associated to the embankment raises.

2.4 Premises description and licence summary

The Wiluna Gold Mine site is an open-cut, underground mining operation that extends across a 4km footprint area with the northern extent of the Premises situated approximately 700m to the north-west of the Wiluna Township. The operation is owned by Wiluna Operations Pty Ltd (Wiluna Operations; formerly Matilda Operations Pty Ltd)), a wholly owned entity of Wiluna Mining Corporation (formerly Blackham Resources Ltd) which acquired the Premises from Apex Gold Pty Ltd (Apex) a wholly owned subsidiary of Apex Minerals NL on 21 March 2014. The change of company name from Blackham Resources Ltd to Wiluna Mining Corporation was effective from 18 June 2020, and from Matilda Operations to Wiluna Operations from 10 July 2020. Modern operations of the Wiluna Gold Mine commenced in 1984.

The Premises comprises of 16 open pits, 12 waste rock landforms, several underground portals, seven in-pit TSF's and five paddock style TSF's. The layout of the Premises is illustrated in Figure 1. The Wiluna Operations Processing Plant consists of a single crushing circuit for sulphide and oxide ores. Oxide and free-milling ores are sized through a three-stage crushing and two stage milling process, then processed in a Carbon in Leach (CIL-OA) cyanidation circuit. A new sulphide ore processing plant, including flotation circuit and concentrator is currently being constructed under W6371/2020/1 which will complement the existing oxide processing plant and increase the throughput capacity to the anticipated 2.95 mtpa following the submission and approval of a licence amendment. A BIOX® processing plant had previously been approved and used to process sulphide ore at the Premises, however the refurbishment of this process was determined to be unfeasible, therefore the plant was decommissioned.

Of the TSF's located at the Premises, only two are currently active and receiving CIL tailings from the processing plant, namely TSF J and TSF K. The Premises is authorised to process up to 2,200,000 tonnes of ore annually and during the 2020 annual period approximately 1,645,881 dry tonnes of ore was processed through the plant and 1,097,435 m³ of dry tailings were deposited to TSF J or TSF K.

The Licence Holder is proposing to construct a 'Stage 2' embankment raise to TSF K to manage additional tailings storage requirements and to extend the life of the facility. Construction and operation of the Stage 2 embankment raise are proposed to commence in Quarter 4 of 2021 and Quarter 2 of 2022 respectively. Section 2.4.1 below discusses in further detail the proposed construction works associated to the embankment raise of TSF K.

2.5 Description of proposed activity

The Licence Holder was authorised under Works Approval W6248/2019/1 to construct Stage 1 of TSF K in two stages, denoted Phase 1A and 1B to a crest height of RL 515m AHD. A partial compliance report was submitted by the Licence Holder for W6248/2019/1 to DWER advising that Phase 1A embankment had been completed and the Phase 1B buttress had not been constructed. It is understood that Stage 1B is not a structural prerequisite for tailings deposition, it is a waste rock storage facility around the perimeter of the TSF, making it into an integrated waste landform. In addition, the compliance report confirmed that the embankment height of TSF K Stage 1 was constructed to a reduced height from RL 515m to RL 512m to prevent delays in commissioning. This resulted in a corresponding reduced TSF capacity of 3.4 Mt and a reduction in deposition time from approximately 30 months to 20 months.

The Licence Holder is seeking to raise the current embankment in a centreline configuration to a maximum crest elevation of 518.5 mRL. Section 2.5.1 below discusses in further detail the proposed construction works associated to the embankment raises of the TSF cells.

2.5.1 Proposed construction works

Embankment and decant structure raise

The Stage 2 embankment raise consists of a 6m centreline raise to RL 518.5m which will be constructed over the existing Stage 1 embankment. The design of the embankment raise will have a crest width of 8m and an upstream and downstream beach slope of 1V:2H and 1V:2.5H respectively. Access ramps will be constructed on the southern and western flanks of the embankments of TSF2 to allow access of equipment during construction. The embankment raise will be constructed using mine waste materials sourced from the planned Wiluna open pits in the vicinity of TSF K and compacted tailings to form an Integrated Waste Landform. A 5m wide low permeability zone will be constructed on the upstream slope of the embankment to reduce seepage through the waste rock and tailings embankment. The materials that comprise this zone will have a target hydraulic conductivity of 1×10^{-8} m/s or less. Safety windrows will be constructed to a height of 0.5m along both edges of the embankment crest and the decant causeway. The existing decant access ramp will be raised by 6m to 518.5m RL with a batter slope of 2H:1V.

Stormwater management

The TSF K Stage 2 design extent for stormwater diversion and control infrastructure is generally the same as the Stage 1 extent, with localized differences along the south and west embankments of up to 8m and 5m respectively, and no noticeable increase in the extent along the northern and eastern embankments.

The surface water drains that were constructed as part of the TSF K Stage 1 extent will be used for Stage 2. Runoff of contaminated stormwater from TSF K is captured at in the surface water drains located at the toe of the embankment. The drains will direct stormwater runoff away from the downstream face of the embankment to prevent ponding from occurring.

A stormwater division drain and adjacent diversion bund 3m wide by 0.5m high will be constructed downstream of the embankment on the northern flank of TSF K as part of the Stage 2 embankment raise. The additional stormwater diversion drain is proposed to be installed to minimise and divert northern catchment flows occurring along the western flank of the TSF in an easterly direction around the northeast of TSF K.

2.5.2 Operation of TSF K (Stage 2) at RL 518.5m

Once the construction works for the proposed embankment raise to TSF K are completed, tailings will be deposited along the perimeter embankment through sub-aerially rotating spigots located approximately 40m apart along the perimeter main ring. Following the completion of the

embankment raise which will take approximately six months to construct, tailings are proposed to be discharged for approximately 27 months. The design of TSF K allows for an average operating decant pond equivalent to approximately 15% of the tailings beach area.

The proposed embankment raises will provide an additional 6 million tonnes per annum for of storage capacity for oxide and sulphide tailings generated by the processing plant to TSF K. The TSF K (Stage 2) embankment raise has been designed with a total operational freeboard of 500mm (includes operation and beach freeboards) above the normal operation pond plus a 1 in 100 year AEP storm event to comply with the freeboard requirements stipulated by DMIRS (DMP, 2015). The cell will be inspected on a daily basis including:

- Tailings delivery pipelines;
- Tailings return water lines;
- Mine dewater pipelines
- Internal embankment freeboard; and
- Decant pond.

3. Risk assessment

The department assesses the risks of emissions from prescribed premises and identifies the potential source, pathway and impact to receptors in accordance with the *Guideline: Risk assessments* (DWER 2020).

To establish a Risk Event there must be an emission, a receptor which may be exposed to that emission through an identified actual or likely pathway, and a potential adverse effect to the receptor from exposure to that emission.

3.1 Source-pathways, receptors and controls

3.1.1 Emissions and controls

The key emissions and associated actual or likely pathway during premises construction and operation which have been considered in this decision report are detailed in Table 2 below. Table 2 also details the control measures the applicant has proposed to assist in controlling these emissions, where necessary.

Table 2: Licence Holder controls

Emission	Sources	Potential pathways	Proposed controls
Construction			
Dust	Earthworks, construction, mobilisation and positioning of infrastructure associated with Stage 2 TSF K embankment lift Light vehicle/mobile equipment movements	Air/windborne pathway	The applicant has proposed the following controls to minimise dust emissions during the construction phase of TSF K (Stage 2): <ul style="list-style-type: none">• A water cart will be used to minimise fugitive dust as required.• The largest practical truck will be utilised to reduce the number of movements necessary across the site.• Visual monitoring of adjacent vegetation conducted to determine dust impacts.• Water or dust suppressants will be applied as required to cleared areas to minimise fugitive dust generation.• Drop heights between excavators and trucks will be reduced to minimise the creation of fugitive dust.• Conduct regular visual monitoring of construction areas for dust emissions.• Construction works will be terminated if adverse conditions result in excessive dust generation which cannot be suppressed. The event will be recorded by relevant site personnel and reported to the supervisor.• Vehicle speeds on site restricted to

			<p>minimise dust generation.</p> <ul style="list-style-type: none"> Visual monitoring of stockpiles for dust emissions (stockpiles will be stabilised if required). Regular housekeeping will be conducted to collect and remove earth material that may contribute to dust emissions.
Noise	<p>Earthworks, construction, mobilisation and positioning of infrastructure associated with Stage 2 TSF K embankment lift</p> <p>Light vehicle/mobile equipment movements</p>	Air/windborne pathway	<ul style="list-style-type: none"> Noise managed as per the <i>Environmental Protection (Noise) Regulations 1997</i>. Earth moving machinery, vehicles and other equipment to be maintained in accordance with manufacturer specifications to minimise noise emissions during construction. Any complaints received regarding noise emissions will be investigated and mitigation measures implemented where required.
Operation			
Dust (dry tailings)	Deposition of tailings into TSF K following embankment raise.	Air/windborne dispersion	<p>The applicant has proposed the following controls to manage dust lift-off from the surface of TSF K:</p> <ul style="list-style-type: none"> Tailings will be kept at a slurry density of between 38% to 45% solids. TSF K will be visually monitored for dust emissions by conducting daily inspections. Observations during daily inspections will be recorded and reported appropriately. Visual monitoring of adjacent vegetation conducted to determine dust impacts.
Noise	Deposition of additional tailings into TSF K following embankment raise.	Air/windborne dispersion	<ul style="list-style-type: none"> Noise generated during operation of TSF Stage 2 will comply with the standards for operational noise set by the <i>Environmental Protection (Noise) Regulations 1997</i>. Any complaints received regarding noise emissions will be investigated and mitigation measures implemented where required.
Seepage of leachate from TSF	Deposition of additional tailings into TSF K following embankment raise.	Seepage of leachate through base and embankments	The applicable controls from the existing licence that are suitable for managing the risks associated with seepage following construction of TSF K (Stage 2) embankment raise:

		<p>of TSF K into soil and groundwater.</p> <ul style="list-style-type: none"> Existing condition 1.2.8 for the completion of a monthly water balance of TSF K that includes site rainfall, evaporation, decant water recovery volumes, seepage recovery volumes and volumes of tailings deposited to determine an estimation of seepage losses; Existing condition 1.3.4 for the: <ul style="list-style-type: none"> daily visual assessment of the tailings decant pond to determine the pond size and location; any evidence of wildlife visitation to the decant pond noted; daily visual integrity of the tailings delivery and return pipelines to TSF K; maintain a record of all inspections undertaken; and corrective action to taken to mitigate adverse environmental consequences as soon as practicable if inspections identify that an appropriate level of environmental protection has not been maintained. Existing condition 3.4.1 for the quarterly monitoring of groundwater bores TD17K, TD18K, TD19K and TD20K to monitor changes to standing water levels and groundwater quality in response to tailings deposition to TSF K. <p>The applicant has also proposed the following controls to manage seepage impacts and increasing groundwater levels:</p> <p>Seepage recovery:</p> <ul style="list-style-type: none"> Maximise return of water from the TSF supernatant pond to the processing plant; and Seepage is modelled to be mostly toward the mining area cone of depression, away from salt lakes. <p>Monitoring:</p> <ul style="list-style-type: none"> Daily visual inspections (shift-based) to: <ul style="list-style-type: none"> Ensure the integrity of TSF K perimeter embankments are maintained by checking for any evidence of seepage, cracking, instability or erosion; Monitor tailings deposition including location of open spigots, flow rate at spigots, beach formation, beach
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			<p>freeboard, beach erosion and low points;</p> <ul style="list-style-type: none"> - Determine if there are any changes to items of concern (e.g cracking or seepage of the TSF K perimeter embankments) identified during previous inspections; and - Detect if any local native fauna have been observed on the TSF or if any fauna deaths have occurred on the TSF; • Monthly visual inspections of TSF K to: <ul style="list-style-type: none"> - conduct an inspection of the downstream toe of the embankment and other areas that were not readily observed during the daily inspections; and - review of the daily inspection sheets and data to identify any issues within the daily inspections in the previous month and to determine any changes in to tailings characteristics, data trends or trigger exceedances.
Tailings or decant return water with elevated metals and metalloids	Deposition of tailings into TSF K following embankment raise.	<p>Direct discharge to land - overtopping of TSF K (Stage 2)</p> <p>Overland runoff of salts, metals and metalloids during significant rainfall events</p>	<p>The applicable controls from the existing licence that manage the risk of overtopping of TSF K (Stage 2) are outlined below:</p> <ul style="list-style-type: none"> • Existing condition 1.2.2 specifies that TSF K maintains a minimum 600mm total freeboard (operational and beach) at all times; • Existing condition 1.2.3 specifies that a minimum top of embankment freeboard of 300mm or a 1 in 100 year/72 hour storm event (which ever is greater) is maintained; • Existing condition 1.2.6 for the daily visual assessment of: <ul style="list-style-type: none"> - the tailings decant/supernatant ponds to determine the pond size and location; - the internal embankment freeboard to confirm freeboard capacity is available. - maintain a record of all inspections undertaken; and - corrective action to taken to mitigate adverse environmental consequences as soon as practicable if inspections identify that an appropriate level of environmental protection has not been maintained.

			<p>The applicant has also proposed the following controls to manage the risk of the overtopping of TSF K:</p> <ul style="list-style-type: none"> TSF K (Stage 2) has been designed to accommodate a 1 in 100 year ARI, 72 hour storm event without overtopping whilst maintaining a 500mm operational freeboard. <p>Monitoring:</p> <ul style="list-style-type: none"> Daily visual inspections (shift-based) to: <ul style="list-style-type: none"> Ensure the integrity of TSF K perimeter embankments are maintained by checking for any evidence of seepage, cracking, instability or erosion; Monitor tailings deposition including location of open spigots, flow rate at spigots, beach formation, beach freeboard, beach erosion and low points; and Determine if there are any changes to items of concern (e.g cracking or seepage of the TSF K perimeter embankments) identified during previous inspections.
Stormwater contaminated with tailings and tailings liquor	Deposition of tailings into TSF K following embankment raise.	Direct discharge to land to soil and surface water via runoff during rainfall events.	<p>The applicable controls proposed by the applicant to manage the risk associated to stormwater runoff are outlined below:</p> <ul style="list-style-type: none"> Surface drains located at the toe of the embankment will collect stormwater from the outer faces of the embankment and near-surface seepage that may migrate through the TSF embankment; Surface drains will direct water away from the downstream face of the embankment to prevent ponding; Stormwater diversion drain constructed downstream of the embankment on the northern flank of TSF K; 3m wide x 0.56m high stormwater diversion bund constructed downstream of the embankment on the northern flank of TSF K; and Stormwater diversion bund to be compacted to a minimum target density of 95% of SMDD and $\pm 2\%$ OMC.
Tailings or decant return	Transport of tailings and decant return	Seepage through the	The applicable controls from the existing licence that manage the risk associated

water with elevated metals and metalloids	water via pipelines between TSF and processing plant	soil profile to groundwater from pipeline leak/rupture. Overland runoff of salts, metals and metalloids during significant rainfall events	with a pipeline failure between the processing plant and TSF K are outlined below: <ul style="list-style-type: none"> Existing condition 1.2.5 requires that all pipelines containing tailings and decant return water are to be: <ul style="list-style-type: none"> - equipped with telemetry systems to detect leaks or failures; - equipped with automatic cut-outs in the event of a pipe failure, and/or - provided with secondary containment sufficient to contain any spill for a period equal to the time between routine inspections; and Existing condition 1.2.6 requires the visual integrity of tailings pipelines and return waterlines to be inspected on a daily basis.
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3.1.2 Receptors

In accordance with the *Guideline: Risk assessments* (DWER 2020), the Delegated Officer has excluded employees, visitors and contractors of the Licence Holder's from its assessment. Protection of these parties often involves different exposure risks and prevention strategies, and is provided for under other state legislation.

Table 3 below provides a summary of potential human and environmental receptors that may be impacted as a result of activities upon or emission and discharges from the prescribed premises (*Guideline: Environmental siting* (DWER 2020)).

Table 3: Sensitive human and environmental receptors and distance from prescribed activity

Human receptors	Distance from prescribed activity
Town of Wiluna	2.8 km from TSF K, 700 m from premises boundary to the north-west.
Bondini – Aboriginal Town Based Reserve	1.2 km from TSF K to the north-east.
Environmental receptors	Distance from prescribed activity
Wiluna Water Reserve	Public drinking water source area, Priority 1 2.7 km from TSF K to the east.
Lake Violet	Approximately 2 km south of TSF K, bordering on premises boundary to south. Salt encrusted lake, filled with comparatively fresh water during flooding.
Underlying groundwater East Murchison Groundwater Area	Saline to hypersaline, lower salinity groundwater restricted to isolated recharge cells. Originally 10 meters below ground level (mbgl) in mining area, approximately 2 mbgl close to Lake Violet. Mine dewatering resulted in major local

	<p>depression (approx. 100 mbgl).</p> <p>Cone of depression around Eastern Borefield and strong flow towards the west in plant area (likely from dewatering).</p> <p>Flow to south not intercepted by pit lakes expected to feed Lake Violet system. Seasonal fluctuation approx. 1-2 m range.</p> <p>Monitoring bores around TSF K indicate a groundwater level range from approximately 9 to 36.7 mbgl.</p> <p>Closest groundwater bore is Morrissey Well approximately 1.4km north-east of TSF K. This bore is upstream of TSF K.</p> <p>The closest downstream groundwater bore is Butcher Well which is approximately 4.5km downstream of the Premises. It is unclear as to whether this bore is in use. Garden Well bore is also approximately 5.5km downstream of the Premises.</p>
Remnant Native Vegetation	Remnant native vegetation adjoins the northern, eastern, southern and western boundaries of TSF K.
Priority Ecological Communities (PEC)	<p>Priority (P)1 PEC – Wiluna BF calcrete groundwater assemblage type on Carey palaeodrainage on Millbillillie Station - 3.3 km east of TSF K.</p> <p>P1 PEC - Uramurdah Lake calcrete groundwater assemblage type on Carey palaeodrainage on Millbillillie Station – 4.1 km south of TSF K.</p> <p>P1 PEC - Lake Violet south and Lake Violet calcrete groundwater assemblage types on Carey palaeodrainage on Millbillillie Station – 5.4 km southwest of TSF K.</p>
Conservation significant fauna species	Two confirmed records of mammals approximately 3.6 km northwest of TSF K, namely the bilby (<i>Macrotis lagotis</i>) (threatened) and brush-tailed mulgara (<i>Dasycercus blythi</i>) (Priority 4).
Conservation significant flora species	The closest priority flora taxa is a P1 flora species <i>Eremophila congesta</i> located 3.6 kms north west of TSF K.

3.2 Risk ratings

Risk ratings have been assessed in accordance with the *Guideline: Risk Assessments* (DWER 2020) for those emission sources which are proposed to change and takes into account potential source-pathway and receptor linkages as identified in Section 3.1.2. Where linkages are in-complete they have not been considered further in the risk assessment.

Where the Licence Holder has proposed mitigation measures/controls (as detailed in Section 3.1.1), these have been considered when determining the final risk rating. Where the Delegated Officer considers the Licence Holder's proposed controls to be critical to maintaining an acceptable level of risk, these will be incorporated into the licence as regulatory controls.

Additional regulatory controls may be imposed where the Licence Holder's controls are not deemed sufficient. Where this is the case the need for additional controls will be documented and justified in Table 4.

The Revised Licence L5206/1987/10 that accompanies this Amendment Report authorises emissions associated with the construction and operation of the Premises i.e. construction and operation of TSF K (Stage 2).

The conditions in the Revised Licence have been determined in accordance with *Guidance Statement: Setting Conditions* (DER 2015).

Table 4: Risk assessment of potential emissions and discharges from the Premises during construction and operation

Risk Event					Risk rating ¹ C = consequence L = likelihood	Licence Holder's controls sufficient?	Conditions ² of licence	Justification for additional regulatory controls
Source/Activities	Potential emission	Potential pathways and impact	Receptors	Licence Holder's controls				
Construction								
Source: TSF K (Stage 2) embankment lift. Activities: Construction works, earthworks, mobilisation and positioning of infrastructure. Light vehicle/mobile equipment movements	Dust	Pathway: Air/windborne dispersion Impact: Reduced native vegetation health or native vegetation death	Remnant native vegetation adjacent to TSF K.		C = Slight L = Possible Low Risk	Y	N/A	N/A
	Noise	Pathway: Air / windborne dispersion Impact: Health and amenity	Wiluna Township and Bondini community located 2.8 km and 1.3 km from TSF K respectively.	Refer to Section 3.1	C = Minor L = Rare Low Risk	Y	N/A	It is not expected that sensitive receptors will be significantly impacted by noise emissions during construction given the short-term duration of works and distance to human receptors from the Premises. The general provisions of the EP Act and the <i>Environmental Protection (Noise) Regulations 1997</i> are considered sufficient in regulating noise emissions.
Operation								
Category 5: Processing or beneficiation of metallic or non-metallic ore								

Risk Event					Risk rating ¹	Licence Holder's controls sufficient?	Conditions ² of licence	Justification for additional regulatory controls
Source/Activities	Potential emission	Potential pathways and impact	Receptors	Licence Holder's controls	C = consequence L = likelihood			
Source: TSF K (Stage 2) Activity: Deposition of tailings into TSF K following embankment raise.	Dust lift off (dry tailings)	Pathway: Air/windborne dispersion Impact: Reduced native vegetation health or native vegetation death	Remnant native vegetation adjacent to TSF K.		C =Slight L = Rare Low Risk	Y	N/A	Noting the tailings will be kept in a wet state at a tailings density of between 38% to 45% and that visual monitoring of adjacent native vegetation will occur to determine dust impacts, The Delegated Officer has determined that these controls are sufficient in managing dust emissions that may occur as a result of dust lift-off from the surface of TSF K.
	Seepage of leachate from TSF	Pathway: Seepage of leachate from base and embankments of TSF K into soil and groundwater. Impacts: Mounding of groundwater table causing vegetation stress or deaths due to increased salinity within root zones of vegetation. Reduced quality or contamination of groundwater/soils. Reduction in groundwater quality leading to impacts on downstream salt lakes.	Surrounding groundwater Remnant native vegetation adjacent to TSF K. Lake Violet located 2kms south of TSF K.	Refer to Section 3.1	C = Moderate L = Unlikely Medium Risk	N	Table 1.2.7 (Table 1.2.4) has been amended to include the design and construction requirements for the TSF K (Stage 2) embankment raise. Existing licence condition 3.4.1 groundwater monitoring requirements Conditions 1.2.8 and 1.2.9 have been included on the Licence to require an Environmental Compliance report to be submitted once construction of the embankment raise has been completed. Condition 3.4.1 (Table 3.4.3) has been amended to include a limit for SWL of 4mbgl for TSF K	See detailed risk assessment in Section 3.3 of this report

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Risk Event					Risk rating ¹	Licence Holder's controls sufficient?	Conditions ² of licence	Justification for additional regulatory controls
Source/Activities	Potential emission	Potential pathways and impact	Receptors	Licence Holder's controls	C = consequence L = likelihood			
							monitoring bores.	
	Tailings or decant return water with elevated metals and metalloids	<p>Pathway:</p> <p>Direct discharge to land - overtopping of TSF2 (combined stage 2 and stage 3)</p> <p>Overland runoff of salts, metals and metalloids during significant rainfall events.</p> <p>Native fauna may ingest decant return water or tailings.</p> <p>Impact:</p> <p>Reduced quality or contamination of soil and groundwater.</p> <p>Reduced native vegetation health or native vegetation death.</p> <p>Decline in health / death of birds or other native wildlife.</p>	<p>Surrounding soils and groundwater</p> <p>Remnant native vegetation adjacent to TSF K.</p> <p>Surface water bodies (closest is Lake Violet located 2 kms south of TSF K).</p> <p>Native fauna (closest records are the bilby and brush-tailed mulgara located 3.6kms from TSFK).</p>	Refer to Section 3.1	C = Moderate L = Unlikely Medium Risk	Y	<p>Condition 1.2.2 (Table 1.2.2) has been amended to require a 500mm total freeboard be maintained at all times at TSF K.</p> <p>Table 1.2.7 (Table 1.2.4) has been amended to include the design and construction requirements for the TSF K (Stage 2) embankment raise.</p> <p>Conditions 1.2.8 and 1.2.9 have been included on the Licence to require an Environmental Compliance report to be submitted once construction of the embankment raise has been completed.</p>	<p>There is a risk of overtopping of the TSF cell if deposition into the cell exceeds the holding capacities or during a significant rainfall even which could result in the contamination of surrounding soils and groundwater with toxic metals and metalloids, dissolved solids and cyanide reducing vegetation growth and survival and impacting the health of fauna.</p> <p>The Delegated Officer has determined that the likelihood of TSF K overtopping occurring is unlikely due to the Applicant's control which includes the maintenance of a 500mm operational freeboard which includes the allowance of a 1 in 100 year, 72 hour rainfall event during operation. The Delegated Officer also took into consideration the existing condition on the Licence which requires the daily visual assessment of the tailings decant/supernatant pond to determine size and location.</p>
	Stormwater contaminated with tailings and tailings liquor	<p>Pathway:</p> <p>Direct discharge to land to soil and surface water via runoff during rainfall events.</p>	<p>Surface water bodies (closest is Lake Violet located 2 kms south of TSF K).</p> <p>Remnant</p>	Refer to Section 3.1	C = Minor L = Unlikely Medium Risk	Y	<p>Table 1.2.7 (Table 1.2.4) has been amended to include the design and construction requirements for the TSF K (Stage 2) embankment raise.</p>	<p>The Delegated Officer considers that the stormwater emission control infrastructure that was constructed as part of the Stage 1 embankment raise outlined in the Applicant's controls under Section 3.1.1 are sufficient for managing the risk associated to stormwater runoff. The additional stormwater diversion</p>

Licence: L5206/1987/10

Risk Event					Risk rating ¹ C = consequence L = likelihood	Licence Holder's controls sufficient?	Conditions ² of licence	Justification for additional regulatory controls
Source/Activities	Potential emission	Potential pathways and impact	Receptors	Licence Holder's controls				
		Impacts: Contamination to soil and surface water bodies in the vicinity of TSF K.	native vegetation adjacent to TSF K.				Conditions 1.2.8 and 1.2.9 have been included on the Licence to require an Environmental Compliance report to be submitted once construction of the embankment raise has been completed.	drain that will be constructed to minimise and divert northern catchment flows occurring along the western flank of the TSF in an easterly direction around the northeast of TSF K will be conditioned on the amended licence as a construction requirement.
Source: Tailings and return water pipelines Activity: Transport of tailings and decant return water via pipelines between TSF and processing plant.	Tailings or decant return water with elevated metals and metalloids	Pathway: Seepage through the soil profile to groundwater from pipeline leak/rupture. Overland runoff of salts, metals and metalloids during significant rainfall events Impact: Degradation of soil structure and soil contamination inhibiting vegetation growth and survival.	Surrounding soils. Remnant native vegetation in the vicinity of the pipelines. Surface water bodies (closest is Lake Violet located 2 kms south of TSF K).	Refer to Section 3.1	C = Slight L = Unlikely Low Risk	Y	N/A	There is potential for the discharge of tailings slurry or return water to the environment through pipeline failure between the processing plant and TSF K which could impact the health of nearby native vegetation. The Delegated Officer has taken into consideration that the pipeline route is located within a highly disturbed mining area and contained within an above ground earthen bund. If a rupture of pipeline infrastructure was to occur, the impacts are likely to be minimal given the location of the pipeline being within a heavily disturbed area. In addition, the likelihood of tailings or return water being released into the environment from a pipeline leak or rupture is considered unlikely due to existing conditions on the Licence which include regular daily visual inspections and pipeline infrastructure requirements as outlined under Section 3.1.1. No additional regulatory controls are required.

Note 1: Consequence ratings, likelihood ratings and risk descriptions are detailed in the *Guideline: Risk assessments* (DWER 2020).

Note 2: Proposed Licence Holder's controls are depicted by standard text. **Bold and underline text** depicts additional regulatory controls imposed by department.

3.3 Detailed risk assessment for seepage from TSF K (Stage 2)

3.3.1 Overview of risk event

As recorded in Table 5 of Section 3.2, DWER has assessed that there is a medium risk of tailings seepage to groundwater from the base or embankments of TSF K resulting in alteration of groundwater quality and groundwater mounding. There is a potential for seepage of tailings leachate into the surrounding groundwater with the potential to impact on the downstream receptor, Lake Violet which is a Salt Lake approximately 2kms south of TSF K. Seepage of tailings leachate may also result in groundwater mounding into the root zone of vegetation causing vegetation stress or deaths. As a result, the local hydrogeology and depth to groundwater have been considered and a review of groundwater modelling and monitoring data has been undertaken to assess the potential environmental impacts associated to the TSF K embankment raise.

3.3.2 Local hydrogeology and depth to groundwater

The Premises is underlain by weathered and fractured Archean bedrock constrained by granitoid rocks which crosses the Carey palaeovalley to the south which is expressed through the Lakeway/Lake Violet salt lake system. Beneath TSF K, is a thin cover of alluvial and colluvial soils typically less than 1m thick which overlies 55m thick saprolite clays. The alluvial channel to the west of TSF K continues southwards towards Lake Violet.

Bore logs received from the Premises indicate that in the vicinity of TSF K the base of complete oxidation is 20 m to 40 m below surface and that the top of fresh rock is approximately 90 m below surface. Palaeovalley sediments occur to the south of the Premises, a thick sequence of mafic to ultra-mafic volcanics is situated to the west (bounded by a Graphite Fault), tholeiitic and calc-alkaline volcanic rocks to the east (bounded by the Eastern Lineament) and various strike-slip shears and faults and various porphyry/dolerite dykes and quartz veins occur across the mine site. In addition to the key hydrogeological units of the mine site discussed above, the deep underground workings beneath the main pits to the west of TSF K have had a significant impact upon conceptual hydrogeology and groundwater behaviour at the site.

Pre-mining groundwater levels ranged from approximately 10 mbgl in the mining area, to 2mbgl close to Lake Violet. The natural groundwater flow direction beneath TSF K pre-mining was in a north to south direction towards Lake Violet. However, historical open pit and mine dewatering operations have resulted in significant changes to groundwater level drawdown areas (cones of depression) to the west of TSF K. The long-term pit dewatering and pit lake evaporation of the Bulletin and Happy Jack pits have caused the localised groundwater to flow in a westerly direction from TSF K.

3.3.3 Modelling and monitoring data review

Seepage modelling

A seepage assessment (including a two-dimensional seepage model under saturated conditions) was undertaken by Golder Associates Pty Ltd in 2019 for TSF K (Stage 1) using current groundwater data and permeameter test results for the tailings and TSF construction materials. The 2019 seepage model predicted the seepage rate from the base of the TSF at each stage of the operation (from Stage 1 to 4). A seepage rate from the base of the TSF was predicted to be between approximately 250 to 420 m³/d (increasing with each stage of construction) and a very localised rise in groundwater levels. An updated seepage assessment was undertaken by Golder in 2021 to incorporate the new TSF Stage 2 design with the co-deposition of both oxide and sulphide tailings (Golder, 2021). It also included an unsaturated flow component to represent seepage more realistically from beneath the TSF into the groundwater system and the predicted seepage water quality from Golder's 2020 geochemical

assessment which was used as a basis to undertake contaminant transport modelling of selected parameters to predict their impact on the groundwater flow system (Golder, 2021).

The 2021 seepage model predicted a maximum seepage rate of 170 m³/d which slowly decreases after the cessation of Stage 2 tailings deposition. This seepage rate is lower than the seepage rate prediction under the 2019 seepage model due to the previous model being run assuming saturated conditions, therefore hydraulic conductivity remains constant. Under the current model, the hydraulic conductivity varies as a function of saturation, therefore lower seepage rates are expected under unsaturated conditions. The model predicts that TSF K will continue to seep for as long as 100 years, largely due to the low permeability of the underlying rocks and the tailings. Given this, the seepage assessment concluded that groundwater mounding would be very localised beneath the TSF and will slowly decrease over time. The model also predicted that due to sorption to the saprolite clays the movement of metals will be slowed down relative to the rates of groundwater movement and metals contamination will remain within the tailings and the saprolite beneath the TSF for an extended period.

Analysis of SWL for TSF K

Although the 2021 seepage model has determined that the conclusion from the previous model still stands being that groundwater mounding will be very localised due to the reasons outlined above, it is noted that the focus of the model was more on the predicted seepage water quality for the proposed mixed oxide and sulphide tailings, rather than groundwater mounding from TSF K. Given this and that additional groundwater monitoring data for TSF K has been received since the seepage model was undertaken, an analysis of the most recent SWL data obtained from the four new monitoring bores (TD17K, TD18K, TD19K and TD20K) that were installed in the vicinity of TSF K in 2020 has been conducted.

Figure 2 demonstrates the location of the four groundwater monitoring bores adjacent to TSF K. The most recent data obtained from the four new monitoring bores indicate groundwater depths ranging from 9 mbgl recorded at TD19K located to the southeast of TSF K and 36.7 mbgl at TD17K located to the northwest (Wiluna Operations Pty Ltd, 2021). It is difficult to ascertain trends in the SWL's surrounding TSF K, given the four monitoring bores have only been operation since June 2020, therefore there is limited data available. However, a review of SWL data to date, shows that TD19K and TD 20K have seen a rise in SWL over the last year, with TD19K rising 7.24 mbgl to 9 mbgl and TD 20K rising 2.54 m. TD19K and TD20K are located on the south side of TSF K to detect potential leakage migrating to the south towards Lake Violet. Noting SWL are on a rising trend and noting the presence of nearby sensitive receptors (localised native vegetation), an assessment of the potential impacts to sensitive receptors has been undertaken under Section 3.2.5.

Analysis of groundwater quality for TSF K

The geochemical modelling undertaken by Golder indicates that the mixed tailings supernatant and TSF decant water is expected to be a sodium chloride type water, pH neutral and hypersaline (total dissolved solids (TDS) 25,000 to 32,000 mg/L) (Golder, 2021). The modelling predicted that concentrations of arsenic, antimony and selenium enriched in the tailings supernatant and decant water are expected to be below ANZECC (2000) livestock guideline values. Copper and sulphate concentrations were predicted to possibly exceed the guideline values.

A comparison of the predicted groundwater quality parameters in the 2021 seepage modelling to the most recent groundwater chemistry data provided by the Licence Holder to date has been conducted for the risk event. The chemistry data in the TSF K monitoring bores (last data observed in November 2020) for seepage water salinity (TDS) referred to in the seepage assessment has significantly changed over the last year. The most recent groundwater chemistry data from TSF K monitoring bores indicate that the groundwater to the south is saline (TD19K) to hypersaline (TD20K) with seepage water salinity recorded in October 2021 at 11,000

TDS and 47,000 TDS respectively. Groundwater was previously recorded in these bores as fresh at 760 TDS (TD19K) to brackish at 4000 TDS (TD20K). This increase in TDS could be the result of impacts from seepage from the TSF, although this is difficult to confirm with only one years worth of data to assess.

WAD cyanide was recorded in the northeastern bore (TD18K) at 0.08mg/L in October 2021 and was previously recorded in the northwestern bore (TD17K) in November 2020, however has since dropped to <0.004mg/L. TD19K and TD20K have also recorded <0.004mg/L, which are concentrations well below the existing limit for WAD cyanide on the Licence of 0.5mg/L. Arsenic has been recorded within all TSF K monitoring bores at significantly low concentrations between <0.004mg/L and 0.02 mg/L. These concentrations are well below the existing limit on the Licence of 0.4mg/L.

3.3.4 Seepage impacts to sensitive receptors

As stated under Section 3.3.1 above and as outlined in Table 3 of this report, the increase in SWL around TSF K (Stage 2) has the potential to impact upon remnant native vegetation adjacent to the TSF through groundwater mounding.

Although there are existing controls on the licence (i.e. groundwater monitoring requirements) to manage the impacts of groundwater mounding, the analysis of groundwater monitoring data indicates that SWL may be raising, particularly in TD19K and TD20K which have seen significant increases. Tailings slurry and return (decant) water contain soluble metals and metalloids which are toxic to native vegetation and fauna. Should seepage rise to the root zone of adjacent native vegetation (expected to be at least 4mbgl) stress or death of deep-rooted vegetation may result due to impacts from the saline water. Therefore, the Delegated Officer has determined that it would be appropriate to add a SWL limit of 4mbgl for the groundwater monitoring bores surrounding TSF K. Condition 3.4.1 (Table 3.4.3) has been amended to include a limit for SWL of 4mbgl for TSF K monitoring bores TD17K, TD18K, TD19K and TD20K. This will ensure that SWLs are managed, and groundwater mounding does not result in SWL increasing too close to the surface, impacting upon native vegetation.



Figure 2: Groundwater monitoring bores surrounding TSF K.

4. Consultation

Table 5 provides a summary of the consultation undertaken by the department.

Table 5: Consultation

Consultation method	Comments received	Department response
Licence Holder was provided with draft amendment on 5 November 2021	Comments from Applicant received on 16 November 2021. Comments are summarised in Appendix 1.	Refer to Appendix 1.

5. Conclusion

Based on the assessment in this Amendment Report, the Delegated Officer has determined that a Revised Licence will be granted, subject to conditions commensurate with the determined controls and necessary for administration and reporting requirements.

5.1 Summary of amendments

Table 6 provides a summary of the proposed amendments and will act as record of implemented changes. All proposed changes have been incorporated into the Revised Licence as part of the amendment process.

Table 6: Summary of licence amendments

Condition no.	Proposed amendments
Condition 1.2.2	Containment infrastructure requirements for TSF K updated under Table 1.2.2 to reflect the change of the design of the total freeboard from 600mm to 500mm.
Condition 1.2.7	<ul style="list-style-type: none">Table 1.2.4 amended to include the TSF K construction and infrastructure requirements for the Stage 2 embankment raise.Table 1.2.3 amended to exclude the design and construction requirements related to the TSF J Stage 1 embankment raise given the construction works have been completed, therefore this requirement of the condition is now redundant.
Conditions 1.2.8 and 1.2.9	Reporting requirements have been included on the Licence to require an Environmental Compliance report to be submitted once construction of the TSF K (Stage 2) embankment raise has been completed.
Conditions 1.2.8 to 1.2.12	Conditions 1.2.8 to 1.2.12 have been renumbered to conditions 1.2.10 to 1.2.14.
Condition 3.4.1	Table 3.4.3 (Monitoring of ambient groundwater quality) has been amended to include a limit for SWL of 4mbgl for TSF K monitoring bores.
Conditions 4.2.3 and 4.2.4	Reporting requirements related to the construction of TSFJ specified under Table 1.2.4 have been removed and replaced with conditions 1.2.8 and 1.2.9.
Schedules 2 to 4	Amended to include Design Drawings and Map showing location of diversion drain alignments for TSF K Stage 2 embankment raise (now listed under Schedule 2).

References

1. BPL Environmental (2021) Wiluna Mining – Tailings Storage Facility K – Stage 2 Works Approval Application Support Document – Wiluna Operations Pty Ltd, dated July 2021. DWER Reference DWERDT479163.
2. Department of Environment Regulation (DER) 2015, *Guidance Statement: Setting Conditions*, Perth, Western Australia.
3. Department of Mines and Petroleum (DMP) 2015, *Guide to the preparation of a design report for tailings storage facilities (TSFs)*, dated August 2015, East Perth, Western Australia.
4. Department of Water and Environmental Regulation (DWER) 2020, *Guideline: Environmental Siting*, Perth, Western Australia.
5. DWER 2020, *Guideline: Risk Assessments*, Perth, Western Australia.
6. Wiluna Operations Pty Ltd, updated standing water levels data from provided by BPL Environmental for L5206/1987/10, dated 20 October 2021. Wiluna Operations Pty Ltd, DWER Reference A2056402.

Appendix 1: Summary of Licence Holder's comments on risk assessment and draft conditions

Condition	Summary of Licence Holder's comment	Department's response
Licence		
<p>Condition 1.2.2 (Table 1.2.2): Containment infrastructure</p> <p>DWER requested the Licence Holder confirm whether TSF J has been constructed to determine whether reference to this infrastructure in Table 1.2.2 of the Licence can be removed as it has been replaced by the construction of TSF J.</p> <p>DWER also requested the Licence Holder confirm that the infrastructure referred to in Table 1.2.2 in the Licence that will become redundant once TSFJ has been constructed has been removed off site.</p>	<p>The Licence Holder confirmed that TSF J has been constructed.</p> <p>The Licence Holder confirmed that TSF J was constructed to encompass all of the infrastructure listed in Table 1.2.2 associated to TSFJ construction and that reference to this infrastructure can be removed from the Licence.</p>	<p>Noted and updated Condition 1.2.2 (Table 1.2.2) of the Licence accordingly.</p>
<p>Condition 1.2.7 (Table 1.2.4): Construction requirements</p>	<p>The Licence Holder requested that the wording for the construction requirements for the materials that will be used for the embankment raise as outlined under Item 1 of Table 1.2.4 be amended. The Licence Holder requested the wording be changed to 'Embankment to be constructed using tailings and mine waste rock materials' instead of specifying the embankment will be constructed from three different materials.</p> <p>The Licence Holder noted that essentially two of the material types are the same (both tailings), so effectively there will be tailings and mine waste material utilised for the embankment construction. The Licence Holder asserted that the design specifications will not change, although what material is placed where may need to be varied depending on availability of source materials. The construction report will confirm what</p>	<p>Noted and updated Condition 1.2.7 (Table 1.2.4) to reflect the updated wording as requested by the Licence Holder. As the Licence Amendment is for an embankment raise on an existing TSF, the Delegated Officer does not think it's necessary for the construction requirements of the material for the raise to be detailed. The change in wording of the construction requirements will have little impact in terms of risk to the environment.</p>

	materials have been used and that design criteria has been met.	
<p>Condition 1.2.7 (Table 1.2.4): Construction requirements</p> <p>DWER requested that the Licence Holder confirm whether the Stage 2 TSF J construction works have been completed and compliance documentation has been submitted. If TSF J (Stage 2) has been completed, this item will be removed from Table 1.2.4.</p>	<p>The Licence Holder confirmed that TSF J (Stage 2) has been constructed, however needed to confirm whether the compliance documentation had been submitted to the Department. The Licence Holder advised that they would undertake a search for the Environmental Compliance Report (ECR) and consult with Golder Associates to confirm that the construction of TSF J (Stage 2) was in line with the requirements.</p>	<p>DWER advised the Licence Holder that they would need to submit an ECR to the Department for review to demonstrate the construction requirements of TSF J (Stage 2) before this item can be removed from Table 1.2.4.</p> <p>The Licence Holder advised that this may take some time to organise given the person that organises the ACR's for Wiluna Operations is currently on leave. The Licence Holder sought advice on whether it was possible to leave the TSF J (Stage 2) commitment in this Licence Amendment and resolve this matter in the next Licence Amendment application which is likely to be in December 2021 for the operation of the Stage 1 Sulphide Plant.</p> <p>DWER advised that noting the embankment raise to TSF K is time critical for site operations, it would be appropriate to retain Item 2 in Table 1.2.4 so that this licence amendment can be finalised. DWER advised the Licence Holder that they will need to submit an ECR to the Department for review to demonstrate the construction requirements of TSF J (Stage 2) prior to submitting a licence amendment application. Once the compliance documentation has been reviewed and approved, the Licence Holder can request to amend condition 1.2.7 to remove Item 2 from Table 1.2.4 in the next Licence Amendment application.</p>
Amendment Report		
<p>Section 2.3.1 of the Amendment Report: <i>Mining Act 1978</i> – Mining Proposal</p>	<p>The Licence Holder advised that a new Mining Proposal (Registration ID 100378) has been submitted to DMIRS on 21 October 2021 and is currently under assessment. The project was removed from the other Mining Proposal (Registration ID:96162) due to the timeframes for this proposal.</p>	<p>Noted and updated Section 2.3.1 of the Amendment Report accordingly.</p>

Appendix 2: Application validation summary

SECTION 1: APPLICATION SUMMARY				
Application type				
Works approval	<input type="checkbox"/>	<i>To note: the application was submitted as works approval, but is processed as licence amendment. Applicant informed of decision on 5/08/2021 – no objection received</i>		
Amendment to licence	<input checked="" type="checkbox"/>	Current licence number:	L5206/1987/10	
		Relevant works approval number:		N/A
Date application received		16 July 2021		
Applicant and Premises details				
Applicant name/s (full legal name/s)		Wiluna Operations Pty Ltd		
Premises name		Wiluna Mine Site		
Premises location		Within Mining Leases M53/64, M53/69, M53/96, and M53/200 Wiluna Mine Site, Wiluna		
Local Government Authority		Shire of Wiluna		
Application documents				
HPCM file reference number:		Works approval application: DER2021/000407 Current licence: 2012/006906-1		
Key application documents (additional to application form):		<ul style="list-style-type: none"> • Works approval application form • Supporting documentation and Appendices <ul style="list-style-type: none"> ○ Design Report ○ Technical specifications – construction report ○ SH Engagement Register ○ Geochem Assess of Waste rock and Ore ○ Hydrogeological Assessment Report 		
Scope of application/assessment				
Summary of proposed activities or changes to existing operations.		Licence amendment (submitted as works approval by applicant) <ul style="list-style-type: none"> • Construction of embankment raise (Stage 2) and operation of TSF K to new height • (potential throughput increase- to clarify) 		
Category number/s (activities that cause the premises to become prescribed premises)				
Table 1: Prescribed premises categories				
Prescribed premises category and description	Assessed production or design capacity	Proposed changes to the production or design capacity (amendments only)		
Category 5: Processing or beneficiation of metallic or non-metallic ore	Current throughput (L5206): 2 200 000 tonnes /year			
Legislative context and other approvals				
Has the applicant referred, or do they	Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	N/A		

intend to refer, their proposal to the EPA under Part IV of the EP Act as a significant proposal?		
Does the applicant hold any existing Part IV Ministerial Statements relevant to the application?	Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	N/A
Has the proposal been referred and/or assessed under the EPBC Act?	Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	N/A
Has the applicant demonstrated occupancy (proof of occupier status)?	Yes <input checked="" type="checkbox"/> No <input type="checkbox"/>	Mining lease / tenement <input checked="" type="checkbox"/> M53/64 (2029); M53/69 (2030); M53/96 (2030), and M53/200 (2033)
Has the applicant obtained all relevant planning approvals?	Yes <input type="checkbox"/> No <input type="checkbox"/> N/A <input checked="" type="checkbox"/>	If N/A explain why? On mining tenements.
Has the applicant applied for, or have an existing EP Act clearing permit in relation to this proposal?	Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	No clearing is proposed.
Has the applicant applied for, or have an existing CAWS Act clearing licence in relation to this proposal?	Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	No clearing is proposed.
Has the applicant applied for, or have an existing RIWI Act licence or permit in relation to this proposal?	Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	Licence / permit not required.
Does the proposal involve a discharge of waste into a designated area (as defined in section 57 of the EP Act)?	Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	N/A
Is the Premises situated in a Public Drinking Water Source Area (PDWSA)?	Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	N/A
Is the Premises subject to any other Acts or subsidiary regulations (e.g. <i>Dangerous Goods Safety Act 2004</i> , <i>Environmental Protection (Controlled Waste) Regulations 2004</i> , <i>State Agreement Act xxxx</i>)	Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	N/A
Is the Premises within an Environmental Protection Policy (EPP) Area?	Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	N/A
Is the Premises subject to any EPP requirements?	Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	N/A
Is the Premises a known or suspected contaminated site under the <i>Contaminated Sites Act 2003</i> ?	Yes <input type="checkbox"/> No <input type="checkbox"/>	N/A