



Application for Licence Amendment

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

| | |
|-----------------------|--|
| Licence Number | L4247/1991/13 |
| Licence Holder | Talison Lithium Australia Pty Ltd |
| ACN | 139 401 308 |
| File Number | INS-0001134 APP-0030473 |
| Premises | <p>Talison Lithium Mine</p> <p>Maranup Ford Road</p> <p>GREENBUSHES WA 6254</p> <p>Legal description -</p> <p>Mining tenements M01/3, M01/6, M01/7, M01/8, M01/9 and M1/16 L70/232 and L70/244</p> <p>General purpose lease G01/1 and G01/2</p> <p>As defined by the Premises maps in Schedule 1 and coordinates in Schedule 3</p> |
| Date of Report | 4 September 2025 |
| Decision | Revised licence granted |

Table of Contents

| | |
|---|-----------|
| 1. Decision summary | 1 |
| 2. Scope of assessment | 1 |
| 2.1 Regulatory framework | 1 |
| 2.2 Application summary | 1 |
| 2.2.1 Existing water treatment circuit | 1 |
| 2.2.2 Proposed amendment | 2 |
| 3. Risk assessment | 5 |
| 3.1 Source-pathways and receptors | 5 |
| 3.1.1 Emissions and controls | 5 |
| 3.1.2 Receptors | 6 |
| 3.2 Risk ratings | 10 |
| 4. Consultation | 13 |
| 5. Conclusion | 13 |
| 5.1 Summary of amendments | 13 |
| References | 15 |
| Appendix 1: Summary of public submissions on application | 16 |
| | |
| Table 1: Proposed throughput capacity changes | 1 |
| Table 2: Licence Holder controls | 5 |
| Table 3: Sensitive human and environmental receptors and distance from prescribed activity | 6 |
| Table 4. Risk assessment of potential emissions and discharges from the Premises during operation | 10 |
| Table 5: Consultation | 13 |
| Table 6: Summary of licence amendments | 14 |
| | |
| Figure 1: Schematic of the mine water circuit (GHD 2023) | 3 |
| Figure 2: Location of the CGP2 Plant Wide Wedge Pit, ARU and CWD | 4 |
| Figure 3: Regional surface water system and water storage ponds (GHD 2023) | 8 |
| Figure 4: Surrounding groundwater and surface water users. Where multiple uses take place, the most sensitive use has been displayed (drinking water > domestic > stock > irrigation) | 9 |

1. Decision summary

Licence L4247/1991/13 is held by Talison Lithium Australia Pty Ltd (Licence Holder) for the Talison Lithium Mine (the Premises), located directly south of the Greenbushes township within mining tenements M01/3, M01/6, M01/7, M01/8, M01/9 and M1/16 L70/232 and L70/244.

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 operation of the Premises. As a result of this assessment, Revised Licence L4247/1991/1 has been granted.

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 8 August 2025, the Licence Holder submitted an application to the department to amend Licence L4247/1991/13 under section 59 and 59B of the *Environmental Protection Act 1986* (EP Act). The licence is seeking the inclusion of Category 61: Liquid waste facility authorising the acceptance of contaminated liquid waste on the premises for processing within the existing mine water treatment system.

This amendment is limited only to the inclusion of Category 61. No changes to the aspects of the Licence relating to existing categories (i.e. Category 5 and 54) have been requested by the Licence Holder.

Table 1 below outlines the proposed changes to the existing Licence.

Table 1: Proposed throughput capacity changes

| Category | Current [design] [throughput] capacity | Proposed throughput capacity | Description of proposed amendment |
|----------|--|------------------------------|---|
| 5 | 7,100,000 tonnes beneficiated per annual period. 5,200,000 tonnes of tailings deposited per annual period | No change | |
| 54 | 187.5 m ³ /day | | |
| 61 | N/A | 15,000 tonnes per year | Inclusion of Category 61: Liquid waste facility allowing acceptance of contaminated leachate onto the premises. |

2.2.1 Existing water treatment circuit

In response to elevated concentrations of arsenic (As) and lithium (Li) in process waters, the Licence Holder upgraded the onsite water treatment system at the mine. Clear Water Dam (CWD) serves as the primary collection point for process water prior to treatment. The treatment circuit comprises three key components:

- the Water Treatment Plant (WTP), which targets lithium removal;

- the upgraded Arsenic Remediation Unit (ARU), which is designed to reduce arsenic levels; and
- the Water Treatment Facility (WTF) which provides secondary treatment of effluents from the WTP and ARU to further reduce lithium and arsenic concentrations prior to return to CWD.

The ARU receives water from both mine pit dewatering activities and process water from CWD. Arsenic is removed through filtration and the application of ferric reagents. A schematic showing the mine water circuit is shown in Figure 1.

2.2.2 Proposed amendment

The amendment seeks to authorise to storage and treatment of liquid waste (leachate) collected from the ore stockpile at the Licence Holder's bulk handling facility at the Port of Bunbury. The liquid waste contains elevated concentrations of arsenic, which leach from the ore and concentrate during processing and handling. The leachate is collected in sumps prior to its removal from the port facility at a rate of approximately 25kL/day, though up to 40kL/day can be generated, dependent on a number of factors including moisture content within the ore and volumes of washwater used in the storage shed.

Although the leachate has been accepted and treated at the mine for several years, it was previously not classified by the Licence Holder as a controlled waste, given its origin from the Talison Lithium Mine. However, a recent review has confirmed that the leachate meets the definition of a controlled waste under the *Environmental Protection (Controlled Waste) Regulations 2004*, and is therefore subject to regulatory requirements. The Licence Holder has temporarily suspended acceptance of this waste at the mine pending assessment and authorisation under the Licence to ensure compliance with regulatory requirements. Waste is currently transported to third party waste facilities licenced for the acceptance of this waste type.

Monitoring data indicates the historical range for arsenic in the leachate is between 1 - 15mg/L, and although spikes in arsenic have been experienced more recently (late July and early August 2025), monitoring data from sampling undertaken in August 2025 indicates a downward trend in concentrations within the leachate (below 50mg/L). Fluctuations in the arsenic concentration are likely influenced by the volume of washwater utilised at the port facility, and the Licence Holder anticipates that arsenic levels will continue to reduce to longer-term average concentrations.

It is intended that leachate will be transported to the premises from the port via tanker trucks, where it is discharged into the Chemical Grade Plant #2 (CGP2) Wedge Pit (CGP2 Plant Wide Wedge Pit, Figure 2). Water collected in the wedge pit is currently reused in processing or reports to CWD for treatment via the existing water treatment system. It is estimated that one tanker (about 40kL) of wastewater will be received at the premises each day. By comparison, during the 2023-2024 reporting period, inputs into CWD from mine operations averaged about 2,287,000 kL per month (Talison 2024), indicating that the additional wastewater received from the port represents a minor to insignificant contribution to the daily water balance of the mine water circuit and process water directed to CWD.

2.2.3 Existing Arsenic Remediation and Treatment

A detailed risk assessment of the mine water circuit, including the operation of the ARU, was completed under a licence amendment (L4247/1991/13) granted in December 2022. This assessment resulted in licence conditions for operation of the ARU and WTP, as well as conditions targeted at reducing seepage risks. Several of these actions have since been completed such as the development of a *Clear Water Dam Emissions Management Plan* and an updated water balance for CWD. As the ARU and associated infrastructure have already been assessed, and the delegated officer considers that the risks posed by the liquid waste stream are consistent with those previously evaluated, ARU-related risks are not being reassessed as part of this amendment.

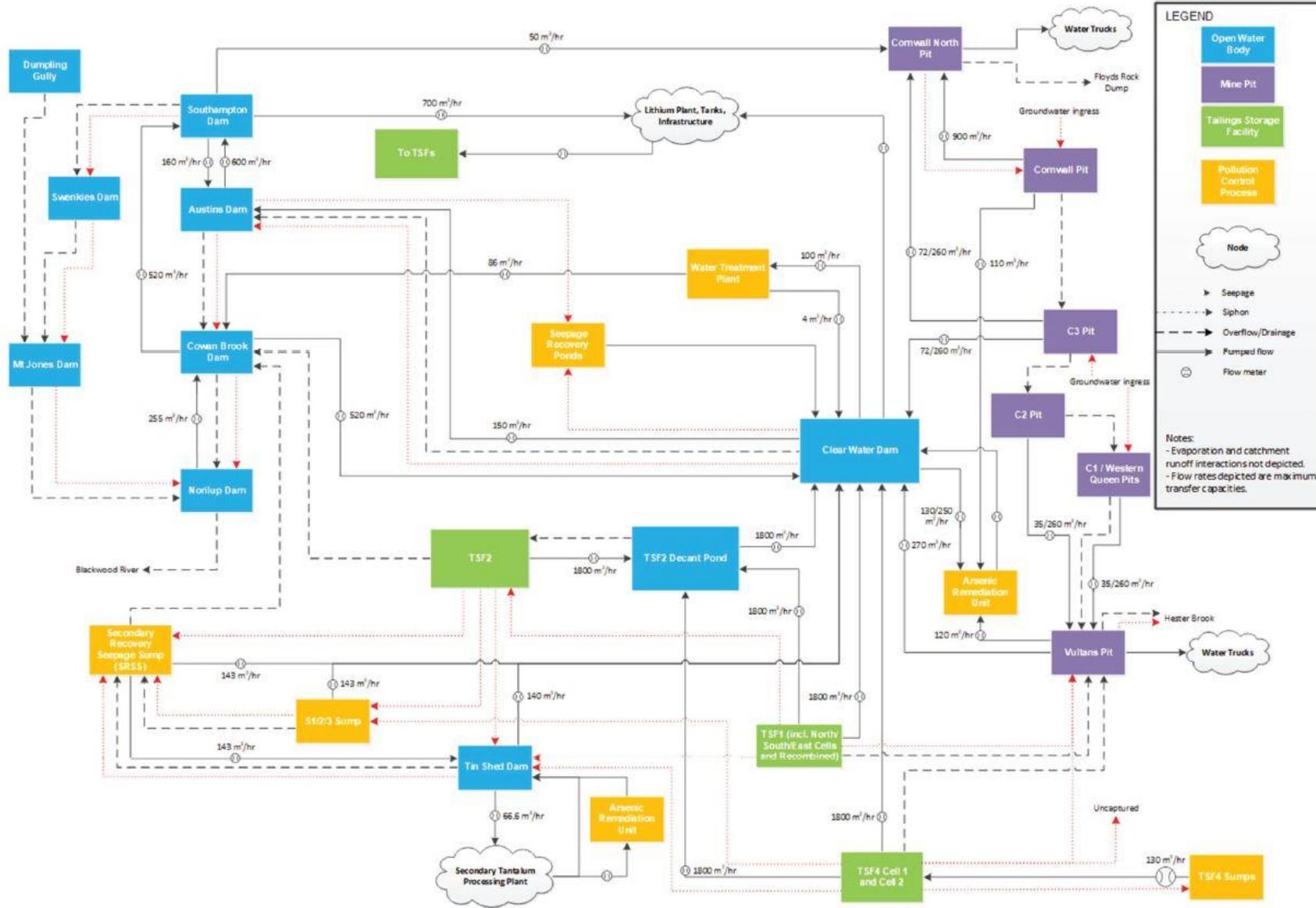


Figure 1: Schematic of the mine water circuit (GHD 2023).



Figure 2: Location of the CGP2 Plant Wide Wedge Pit, ARU and CWD.

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 *Guidance Statement: Risk Assessments* (DER 2017).

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 and receptors

3.1.1 Emissions and controls

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

Table 2: Licence Holder controls

| Emission | Sources | Potential pathways | Proposed controls |
|-------------------------------|--|---|---|
| Arsenic contaminated leachate | Acceptance and storage of contaminated arsenic waste at the CGP #2 wedge pit | Overflow to soils and infiltration to groundwater | <p>The wedge pit is fitted with a sump pump to return flows to the processing plant.</p> <p>Overflow of material drains via a closed pipe to the CWD for treatment within the ARU.</p> <p>Estimated one truck load per day (up to 40kL per day).</p> <p>Existing licence conditions require visual monitoring of CGP#2 wedge pit to ensure capacity is available.</p> <p>Recording and reporting of overflow events is required under the existing licence.</p> |
| | | Seepage to soils and groundwater | <p>Waste to be delivered onto the premises via tanker trucks and received in the concrete pit prior to being directed to the CWD for treatment via the existing ARU.</p> <p>Spills during transfer will be captured in the wedge pit.</p> <p>Estimated one truck load per day (up to 40kL per day).</p> |
| | Storage of contaminated waste within Clear Water Dam | Overflow to soils and infiltration to groundwater | <p>Overflows from CWD to other water storage dams within the Mine Water Circuit and off the premises are managed under existing licence conditions.</p> <p>The volume of waste is proposed to be received is minor compared to capacity of Mine Water Circuit.</p> |

| Emission | Sources | Potential pathways | Proposed controls |
|----------|---------|----------------------------------|--|
| | | Seepage to soils and groundwater | <p>Wastewater stored in CWD is subject to treatment through the ARU to reduce arsenic content. Conditions regarding operation of the ARU, including treatment quality and monitoring, are included on the existing licence.</p> <p>Minor volume of waste relative to capacity of Mine Water Circuit.</p> <p>Seepage from CWD dam managed under existing licence conditions. Conditions include infrastructure controls, water quality specifications and monitoring of downstream receptors (surface water and groundwater).</p> |

3.1.2 Receptors

In accordance with the *Guidance Statement: Risk Assessment* (DER 2017), 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 (*Guidance Statement: Environmental Siting* (DER 2016)).

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

| Human receptors | Distance from prescribed activity |
|-------------------------------------|---|
| Greenbushes townsite | The nearest residential premises is 1.5km north of Clear Water Dam. |
| Surface water and groundwater users | <p>The mine water circuit allows transfer of water from CWD into surrounding water storage ponds such as Austins Dam, Southampton Dam and, Cowan Brook Dam. An overview of the regional surface water system and water storage reservoirs is provided in Figure 3.</p> <p>While the groundwater underlying the site is not recognised as a strategic resource areas (not listed as a proclaimed area) there are a number of residential users of surface and groundwater in the surrounding area.</p> <p>The results of a water survey carried out by the licence holder in 2021 indicates that downstream users access surface water from Norilup Brook, Hester Brook and Woljenup Creek for purposes including drinking water, domestic uses such as showering, laundry, water for gardens, recreational activities (including swimming), aquaculture activities, irrigation for crops and stock water. The nearest property is 2.3km west of CWD and 750m south-west of Cowans Brook Dam (Figure 4).</p> |
| Environmental receptors | Distance from prescribed activity |
| Groundwater | Groundwater is hosted within shallow and deep aquifers on-site. |
| Hester State Forest | The premises is surrounding by state forest which support a number of |

| | |
|--|--|
| Greenbushes State Forest | conservation significant species. Impact on the state forest from ground disturbance activities (e.g. clearing) is managed under Part IV of the EP act via Ministerial Statement 1111 (MS 1111). Impacts to terrestrial fauna are also managed under MS 1111 through the Conservation Significant Fauna Terrestrial Management Plan. |
| Threatened / priority flora and fauna | |
| Tributaries of the Black River (see Figure 3 and Figure 4) | |
| Spring Gully, Schwenke's Dam and Mt Jones Dam | To the north-west of the premises boundary (offsite). Seepage from Southampton Dam (currently occurring) flows into Spring Gully and into Schwenke's Dam (flow from Schwenke's Dam goes to Mt Jones Dams before flowing into Norilup Dam). |
| Cowan Brook Dam, Norilup Dam and Norilup Brook | At the western edge of the premises boundary (offsite). Seepage from Cowan Brook Dam (currently occurring) flows into Cowan Brook and into Norilup Dam. |
| Hester Brook | To the east of the premises boundary. |
| Cultural receptors | Distance from prescribed activity |
| Aboriginal Heritage Site – Blackwood River and Woljenup Creek listed under the <i>Aboriginal Heritage Act 1972</i> . | Woljenup creek tributaries directly south of the premises and 3.4km west of CWD. |

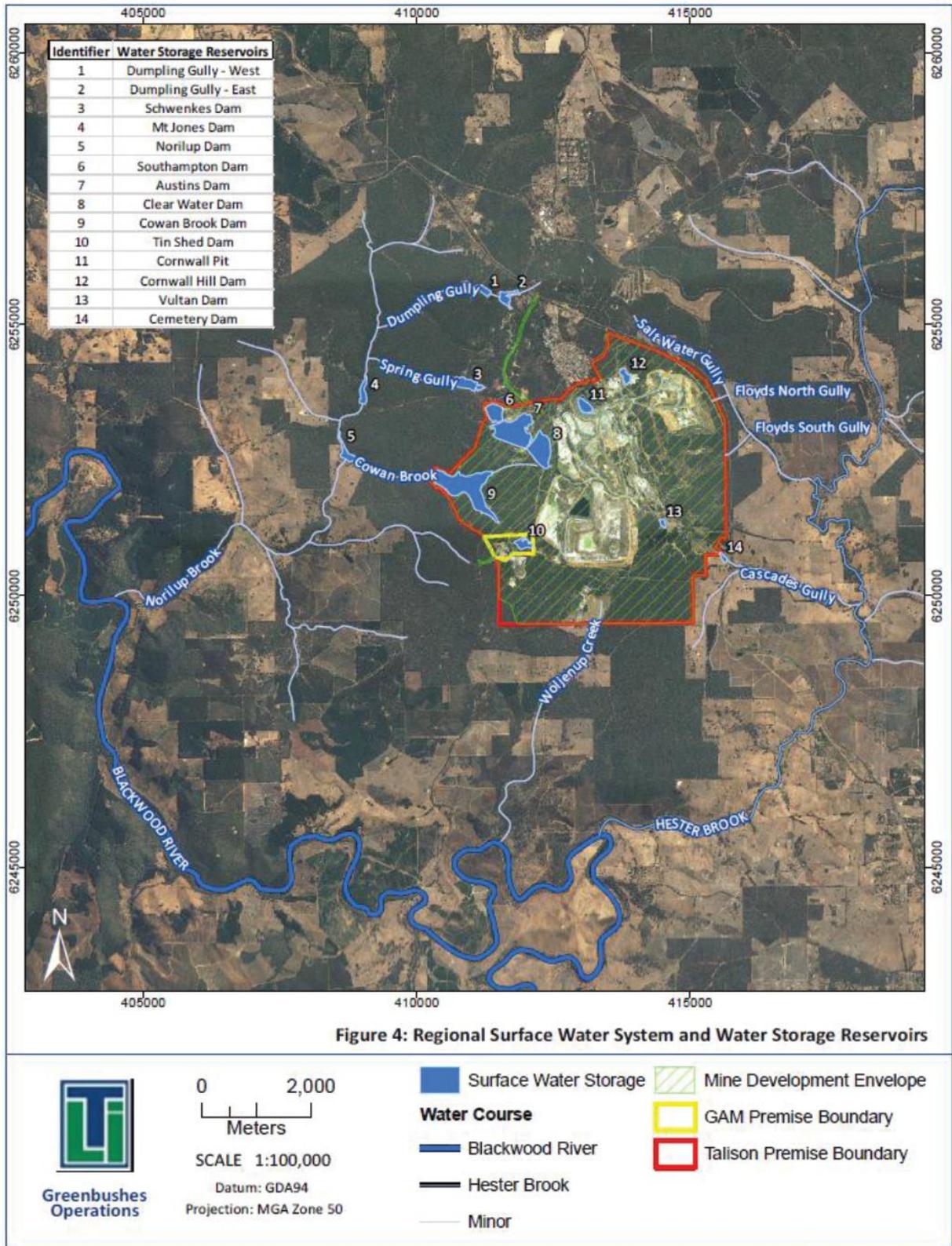


Figure 3: Regional surface water system and water storage ponds (GHD 2023).

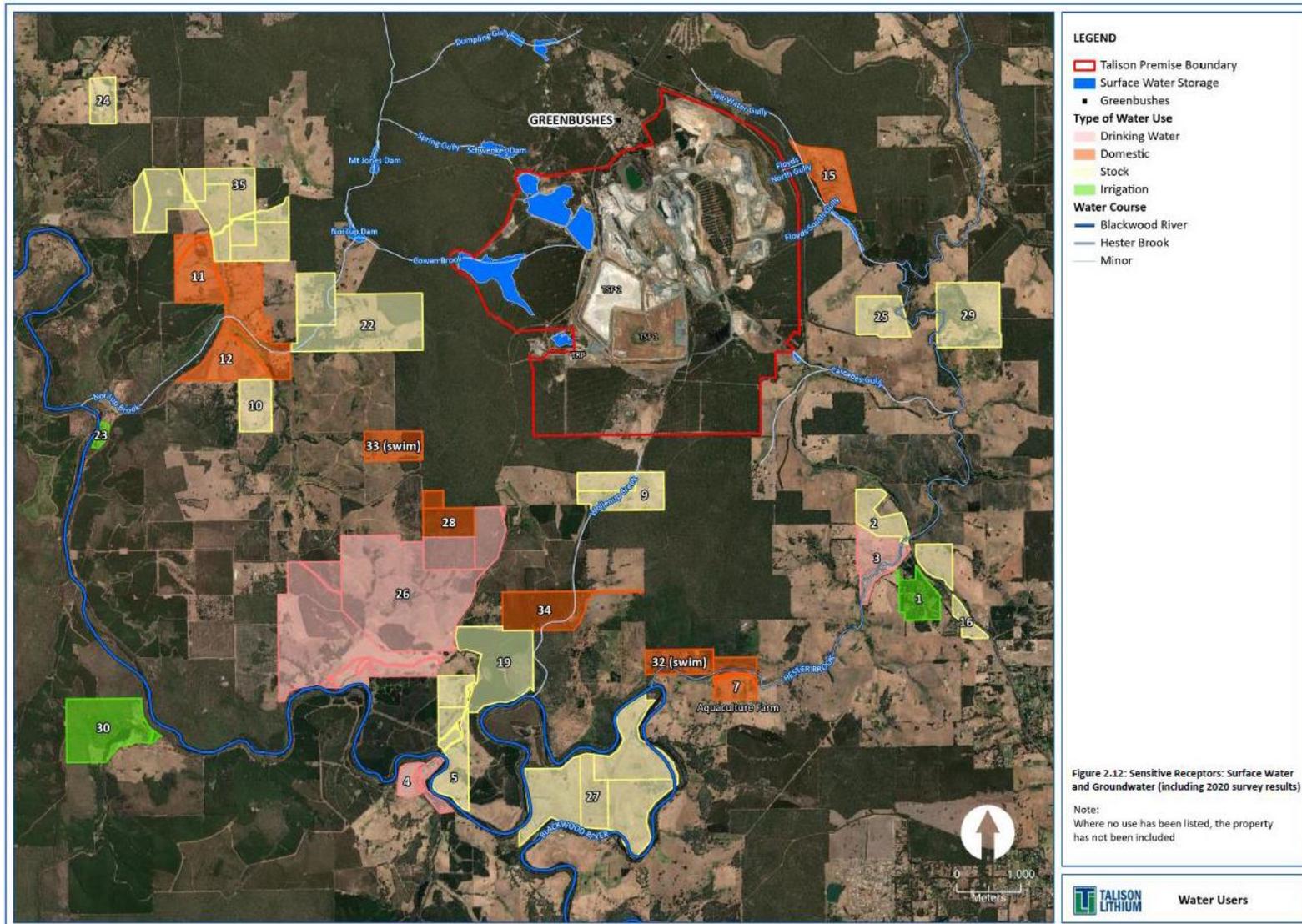


Figure 4: Surrounding groundwater and surface water users. Where multiple uses take place, the most sensitive use has been displayed (drinking water > domestic > stock > irrigation)

3.2 Risk ratings

Risk ratings have been assessed in accordance with the *Guidance Statement: Risk Assessments* (DER 2017) 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. 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), 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 L4247/1991/13 that accompanies this Amendment Report authorises emissions associated with the operation of the Premises i.e. Category 61 activities.

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 operation

| Risk Event | | | | | Risk rating ¹ C = consequence L = likelihood | Licence Holder’s controls sufficient? | Conditions of licence | Justification for additional regulatory controls |
|--|-------------------------------|---|--|---------------------------|---|---------------------------------------|---|---|
| Source/Activities | Potential emission | Potential pathways and impact | Receptors | Licence Holder’s controls | | | | |
| Acceptance and storage of contaminated arsenic waste at the CGP #2 wedge pit | Arsenic contaminated leachate | Overflow to soils and infiltration to groundwater impacting groundwater and surface water quality | Groundwater and surface water systems and their users (refer to section 3.1.2) | Refer to Section 3.1.1 | C = Minor L = Unlikely Medium Risk | Y | Condition 1: Waste acceptance (New) Condition 2: Infrastructure and equipment (Existing) Condition 28: Waste input monitoring (New) | The existing licence conditions controls for managing overflow from the CGP#2 pit allowing water to transfer to CWD for treatment via the ARU. Conditions specifying waste acceptance criteria and requiring monitoring of waste accepted onto the premises are included on the licence. |
| | | Seepage to soils and groundwater impacting groundwater and surface water quality | | Refer to Section 3.1.1 | C = Minor L = Rare Low Risk | Y | Condition 43: Reporting (of waste acceptance) (New) | No additional controls required noting that the CGP #2 pit is concrete lined and therefore seepage risk is low. |

| Risk Event | | | | | Risk rating ¹ C = consequence L = likelihood | Licence Holder's controls sufficient? | Conditions of licence | Justification for additional regulatory controls |
|--|-------------------------------|---|--|---------------------------|---|---------------------------------------|--|---|
| Source/Activities | Potential emission | Potential pathways and impact | Receptors | Licence Holder's controls | | | | |
| Storage of contaminated arsenic waste within Clear Water Dam | Arsenic contaminated leachate | Overflow to soils and infiltration to groundwater impacting groundwater and surface water quality of downstream systems | Groundwater and surface water systems and their users (refer to section 3.1.2) | Refer to Section 3.1.1 | C = Moderate L = Unlikely Medium Risk | Y | <p>New conditions above limiting waste acceptance.</p> <p>Condition 2 and 9: Infrastructure and equipment (Existing) - overflow management and inspections.</p> <p>Conditions 18-25 and 32-36 (Existing): Monitoring of mine water circuit and associated discharges/overflows</p> | Overflows of the Mine Water Circuit have previously been assessed as "Medium" risk noting freeboard controls in place and that overtopping has not occurred in recent years (DWER 2025). Given the relatively low volume of the additional waste stream to be accepted within the Mine Water Circuit, the delegated officer does not expect it to affect the likelihood of overtopping and therefore the overall risk is not likely to change. The delegated officer considers that existing conditions of the licence are suitable for managing risks of overflow from CWD and the Mine Water Circuit. |
| | | Seepage to soils and groundwater impacting groundwater and surface water quality | | Refer to Section 3.1.1 | C = Major L = Possible High Risk | Y | <p>New conditions listed above.</p> <p>Conditions 2 and 13: Infrastructure and equipment (Existing) – include seepage controls, process limits, etc.</p> <p>Conditions 18-24 and 32-36 (New and existing): Monitoring of mine water circuit, seepage and groundwater. New requirement to monitor quality of incoming loads of liquid waste</p> <p>Conditions 39 – 45 and 47 (Existing): Reporting of monitoring data</p> | <p>The delegated officer acknowledges existing contamination associated with mine operations. Accordingly, the risk of seepage from the CWD have been assessed as "High", taking into consideration potential impacts on downstream receptors. These contamination risks are currently managed through treatment via the ARU and existing licence conditions.</p> <p>Given the low volume of the additional waste stream, it is not expected to significantly contribute to contamination at the mine.</p> <p>The delegated officer considers that introduction of the additional waste stream into the Mine Water Circuit will not alter the risk profile of the premises and that existing conditions for managing overflows and seepage from CWD are generally sufficient for managing the activity. To ensure that expectations for water quality within CWD are met, monitoring of arsenic</p> |

| Risk Event | | | | | Risk rating ¹ C = consequence L = likelihood | Licence Holder's controls sufficient? | Conditions of licence | Justification for additional regulatory controls |
|-------------------|--------------------|-------------------------------|-----------|---------------------------|---|---------------------------------------|-----------------------|---|
| Source/Activities | Potential emission | Potential pathways and impact | Receptors | Licence Holder's controls | | | | |
| | | | | | | | | within CWD has increased from quarterly to weekly sampling, with results continued to be reported on a quarterly basis. This allows oversight of water quality with the dam and early detection of increasing trends. Sampling of waste accepted onto the premises is also required to confirm arsenic content prior to discharge into CWD. |

Note 1: Consequence ratings, likelihood ratings and risk descriptions are detailed in the *Guidance Statement: Risk Assessments* (DER 2017).

4. Consultation

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

Table 5: Consultation

| Consultation method | Comments received | Department response |
|---|---|---------------------|
| Application advertised on the department's website (20 August 2025) | Six public submissions were received. A summary of the submissions is provided in Appendix 1. | |
| Licence Holder was provided with draft amendment on (29 August 2029 and 2 September 2025) | None – the Licence Holder elected to waive the comment period. | N/A |

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.

The delegated officer determined that the risk of accepting the waste into the CGP #2 pit is low and that existing infrastructure controls are suitable for managing seepage and overflow from this infrastructure. Broader risks associated with contamination from the mine water circuit (including CWD) have been assessed previously and are regulated through the existing licence. Given the low volume of the additional waste stream (~40kL per day) and the presence of established systems for reducing arsenic in process waters, the delegated officer considers that the inclusion of the liquid waste will not alter the overall risk profile of the premises. To ensure oversight of water quality within CWD and early detection of increasing trends of arsenic, conditions have been imposed requiring an increased frequency of water quality sampling within CWD (quarterly to weekly) and testing of waste material received at the premises to confirm the arsenic content prior to discharge. Results of monitoring will be reported on a quarterly basis in line with existing conditions.

As the risks associated with the ARU have already been assessed, and are not expected to change with the acceptance of this waste stream, they have not been reassessed as part of this amendment. The delegated officer acknowledges however, the need for a site-wide review of activities premises, particularly in relation to the mine water circuit, to ensure that risks associated with process water management, storage and treatment are managed appropriately, and reiterates the department's intention to undertake this review outside the scope of this amendment process.

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.

In amending the licence, the CEO has also:

- revised licence condition's numbers; and
- corrected clerical mistakes and unintentional errors.

Table 6: Summary of licence amendments

| Condition no. | Proposed amendments |
|---------------|---|
| 1 | Inclusion of condition allowing the acceptance of arsenic contaminated liquid waste onto the premises for treatment via the existing ARU. The volume of waste to be accepted is limited to 15,000 tonnes per annum. |
| 2 (Table 2) | Updated to include the acceptance of wastewater from the CGP2 wedge pit to the CWD per existing operations. |
| 24 (Table 11) | Amended noting that overflow from the CGP #2 Plant Wide Wedge Pit is directed to CWD rather than direct to Austins Dam. |
| 24 (Table 11) | Correction of error. Volume limit associated with WWTP outlet amended corrected to reflect actual plant capacity. |
| 24 (Table 12) | Increased frequency of sampling within CWD for pH, redox potential and arsenic from quarterly to weekly. |
| | Included requirement to sample incoming loads of liquid waste for arsenic. |
| 28 (Table 14) | Inclusion of a requirement to monitor the volume of liquid waste accepted onto the premises. |
| 43 (Table 22) | Requirement to report above monitoring results through quarterly and Annual Environmental Reporting. |

References

1. Department of Environment Regulation (DER) 2016, *Guidance Statement: Environmental Siting*, Perth, Western Australia.
2. DER 2015, *Guidance Statement: Setting Conditions*, Perth, Western Australia.
3. DWER 2017, *Guideline: Risk Assessments*, Perth, Western Australia.
4. DWER 2025, *Application for Licence Amendment, Amendment Report (L4247/1991/13)* issued to Talison Lithium Australia Pty Ltd, 1 July 2025
5. GHD 2023, *Clear Water Dam Emissions Management Plan*, Perth, Western Australia [DWER Record: A2205693]
6. Talison Lithium Australia Pty Ltd (Talison) 2024, *Annual Environmental Report 01 July 2023 – 30 June 2024* [DWER Record DWERDT1013780].

Appendix 1: Summary of public submissions on application

| Summary of stakeholder comments | Department's response |
|--|--|
| <p>Stakeholders requested an extension to the consultation period.</p> | <p>The application was advertised on the department's website on 20 August 2025 and subject to a seven-day public consultation period. In determining an appropriate consultation period, the delegated officer had regard for the nature of the proposal, which relates to the acceptance of a relatively small volume of wastewater within an existing mine water circuit that includes treatment facilities for managing arsenic contamination. Considering this, the delegated officer determined that the seven-day advertising period is appropriate.</p> |
| <p>Concerns were raised regarding dust and air quality, fauna fatalities, noise and sewage treatment. A review of the liquid waste storage at the port was also requested.</p> | <p>This assessment is limited to the acceptance of liquid waste (leachate from the port operations) onto the premises for storage and treatment within the Mine Water Circuit. Dust and sewage emissions are not expected from this activity and therefore impacts associated with these emissions are considered outside the scope of this amendment. Similarly, fauna fatalities are also considered to be outside the scope of this amendment and are managed under Part IV of the EP Act via the Conservation Significant Fauna Terrestrial Management Plan required to be implemented by MS1111.</p> <p>Noise impacts associated with the proposal are limited to truck movements enabling transfer of liquid waste onto the premises for discharge into the CGP2 Plant Wide Wedge Pit. It is estimated that one tanker per day will be required to transfer the waste. Noting the limited truck movements associated with the proposal, the delegated officer considers that the noise associated with this activity will not significantly contribute to overall noise from the premises. Noise emissions associated with activities on the premises are currently regulated under the Environmental Protection (Noise) Regulations, with approval granted under Regulation 17 of the Noise Regulations in 2015. A renewal of the Regulation 17 approval is currently under review by the department, and separate to this amendment assessment.</p> <p>Broader impacts associated with air quality from the premises have been considered within recent amendments to licence, and through a recent amendment to works approval W6283/2019/1. Through these instruments, a range of additional controls have been conditioned, and require ongoing monitoring and management of dust emissions from the premises. Due to the nature of the activities proposed as part of this amendment, the delegated officer considers that the existing licence and works approvals conditions are sufficient to manage the risks associated with dust emissions.</p> <p>It is noted that the port operations are independently operated by the Southern Ports Authority and are considered a separate activity from mine site operations. Accordingly, activities at the port are regulated under a separate licence (L6744/1996/12) and as such fall outside the scope of the current amendment.</p> |
| <p>Submissions raised concerns regarding the risks of contamination from the proposal as follows:</p> <ul style="list-style-type: none"> It was noted that the proposed amendment expands processing and wastewater systems which increases the risks of groundwater contamination and downstream | <p>The department acknowledges the range of concerns regarding this specific proposal and matters relevant to the broader management of the premises. It is noted however, that the application is limited to acceptance of liquid waste from the Licence Holders connected port facility, for acceptance and treatment within the existing Mine Water Circuit. The existing infrastructure is considered to have sufficient capacity to receive the additional, low volumes of waste and no expansion to the existing infrastructure is proposed.</p> <p>Contamination risks associated with the acceptance of the leachate waste stream have been assessed in section 3 of</p> |

| Summary of stakeholder comments | Department's response |
|--|---|
| <p>impacts.</p> <ul style="list-style-type: none"> • Treatment at the port was requested rather than transfer to the mine. • Third-party testing overseen by DWER was requested with results made available to the public. • A comprehensive hydrogeological risk assessment, including modelling of seepage and contaminant migration, was requested. • Stakeholders noted existing concerns regarding contamination associated with seepage of lithium from TSF4 and waste rock. • Cumulative consideration of impacts was requested. • Concern was raised regarding the potential risk of outward flowing seepage impacting groundwater and surface water receptors should the mined pit no longer act as a groundwater sink. | <p>this report. The delegated officer acknowledges existing contamination risks at the premises noting that these risks are currently being managed through existing licence conditions. The delegated officer considers that the low volume of the additional waste stream is unlikely to materially increase the risk of contamination from the premises. In making this determination, the delegated officer has noted that contaminated water will be subject to treatment via the ARU to reduce the arsenic content and that the existing conditions of the licence are sufficient for managing contamination risks and mitigating downstream impacts.</p> <p>Licence L4247/1991/13 requires Talison to undertake groundwater and surface water sampling in accordance with the relevant Australian Standards, and have samples analysed by independent laboratories that are certified under National Standards for technical competence and quality. Data from this sampling is used to inform on site management activities, as well by the department in its ongoing review of the risks associated discharges associated with the premises. Talison have obligations under the <i>Environmental Protection Act 1986</i> to comply with licence conditions.</p> <p>The delegated officer acknowledges the comments regarding the need to consider cumulative contamination risks. The risk assessment provided in Table 4 takes into account the cumulative risks associated with arsenic contamination from the Mine Water Circuit, rather than evaluating the proposal in isolation. This includes consideration of existing arsenic contamination within the Mine Water Circuit, the current onsite management measures in place to mitigate these risks, and the regulatory controls enforced under the existing licence. As outlined above, the delegated officer determined that the proposed additional waste stream is not likely to alter the risk profile of the premises due to the low volumes to be accepted, and determined that existing controls on the licence for managing contamination from the mine water circuit are sufficient.</p> <p>In accordance with the departments' <i>Guideline: Risk Assessments</i>, this assessment focuses specifically on the Mine Water Circuit and the treatment processes surrounding arsenic remediation and Clear Water Dam, in part due to the distinct source-pathway-receptor linkages associated with this component of the site. The guideline recognises that environmental risks must be considered in the context of the specific linkages between contaminant sources, potential migration pathways, and sensitive receptors. While it is acknowledged that the mine water circuit encompasses water management across the premises, Clear Water Dam is located to the north of the mine and has different hydrogeological characteristics compared to the tailings storage facility 4 (TSF4) situated to the south, and waste rock dumps to the east, and the nature and extent of potential environmental impacts may differ. Consequently, the risk assessment is limited to the consideration of risks associated with the acceptance of contaminated waste into Clear Water Dam. Risks related specifically to TSF4 and the waste rock dump have previously been assessed and are not reconsidered here, as their source-pathway-receptor linkages are not directly influenced by the proposed changes in this assessment.</p> <p>As discussed in section 5, a comprehensive review of the Mine Water Circuit across the premises will be undertaken to further evaluate cumulative impacts associated with the operation of the Mine Water Circuit. This includes a review of measures for managing contamination at the mine during operations.</p> <p>Longer term strategies for managing contamination risks, particularly post-closure, will be managed through the Mine Closure Plan developed under the <i>Mining Act 1978</i>, <i>Contaminated Sites Act 2003</i> and where necessary, closure notices issued under the EP Act.</p> |

| Summary of stakeholder comments | Department's response |
|---|--|
| <p>It was noted that in a previous audit report (relating to the 2023-2024 reporting period), the Licence Holder declared non-compliance with conditions relating to the management of freeboards within the Mine Water Circuit highlighting the need for a review of licence conditions.</p> | <p>Conditions referred to in the submission relate to following:</p> <ul style="list-style-type: none"> • maintaining a specified freeboard on CWD and Southampton Dam; and • the frequency of inspections required to be undertaken of the Mine Water Circuit freeboard. <p>In 2024, the Licence Holder applied to amend the above licence conditions response to operational challenges related to maintaining freeboard levels. The department's assessment (DWER 2025) took into consideration the operating strategy of the water storage dams noting that the dams are designed to be interconnected and allow controlled overspill between structures. An amended licence was granted in July 2025 that alters the freeboard requirements previously identified as non-compliant to allow operational flexibility, and to reflect the initial design intent of the Mine Water Circuit.</p> <p>A copy of the department's consideration of the above amendment is available online at https://www.der.wa.gov.au/our-work/licences-and-works-approvals/current-licences.</p> |
| <p>Concerns were raised regarding the risk of spills on public roads during the transfer of contaminated material from the port to the mine.</p> | <p>The department acknowledges concerns regarding the risk of spills of arsenic contaminated material on public roads during the transport of the material from the port to the mine, however notes that transport of material on public roads outside of the prescribed premises is not within the remit of regulation under Part V of the EP Act.</p> <p>Transport of controlled is managed via the <i>Environmental Protection (Controlled Waste) Regulations 2004</i> which includes provisions for managing risks associated with spills.</p> <p>Spills of material on public roads are also subject to the <i>Environmental Protection (Unauthorised Discharges) Regulations 2004</i> and the general provisions of the EP Act relating to pollution and environmental harm. Such incidents must be reported in accordance with section 72 of the EP Act, which requires prompt notification of discharge that cause or threaten environmental harm. Reported incidents will be investigated by DWER in accordance with its <i>Compliance and Enforcement Policy</i>, which ensure a proportionate and risk-based regulatory response.</p> |