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First Tin PLC
02 May 2024

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First Tin Plc

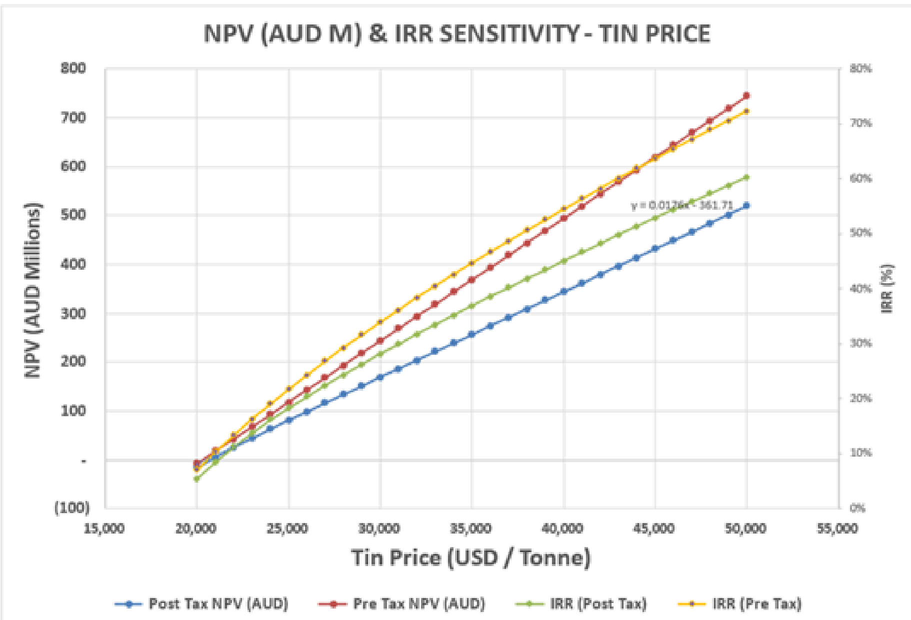
("First Tin" or "the Company")

Taronga Definitive Feasibility Study Confirms Low Capex, High Margin Tin Mine with Attractive Economics

First Tin PLC, a tin development company with advanced, low capex projects in Australia and Germany, is pleased to report it has completed the Definitive Feasibility Study ("DFS") for its Taronga Tin Project located in northeastern NSW, Australia. The project is owned 100% by Australian registered Taronga Mines Pty Ltd ("TMPL"), a wholly owned subsidiary of First Tin Plc via an intermediary Australian registered company First Tin Australia Pty Ltd.

Highlights:

- The DFS was completed at a conservative base case tin price of US$26,000 (A$39,394) per tonne, with pre-tax NPV_8 and IRR of A$143 million and 24% respectively (post-tax A$98 million and 20%)
- Pre-tax NPV_8 increases to A$331 million and IRR to 42% (post-tax A$230 million and 34%) at the current tin price of US$33,097 (A$50,739) per tonne as of 26th April
- NPV_8 has significant leverage to higher tin prices



- Scenarios around the current tin price show the conservative basis of the FS

Scenario	DFS Base Case	Mid-Case	Current Spot	High Case
Tin Price US$/t	26,000	30,000	33,097	40,000
Pre-Tax NPV_8 AUD M	143	243	331	494
Pre/Post Tax IRR %	24/20	34/28	42/34	55/45

Pre-tax NPV_8 Comparisons at alternative Tin Prices (other factors kept constant)

- Average annual production of 3,600 tonnes of tin in concentrate
- Pre-production CAPEX of A$176 million (US$116 million), includes A$28 million for an on-site solar and gas power plant for behind the grid power generation
- Low C1 site cash costs[1] of **A$18,192 (US$12,007)** per tonne of tin produced and all-in-sustaining-costs[1,2] ("AISC") of **A$24,005 (US$15,843)** per tonne of tin sold, place Taronga in the lowest half, close to lowest quartile, on the global cost curve
- EBITDA margin above 50% at current tin price
- Significant upside potential already identified from ongoing work:
    - Recent improvements in mineral processing provide increased tin recovery
    - Potential for extended mine life from revised pit optimisations, higher tin prices and near pit exploration potential, including conversion of Inferred Resources
    - An add-on fine tin flotation circuit at a later stage to improve tin recoveries by 5-10%

First Tin's CEO, Bill Scotting commented: "We are delighted to deliver this Feasibility Study which highlights the attractiveness of our low capex, low risk, and high margin Taronga Tin project. The results confirm that we have an extremely valuable and robust project that can deliver a much-needed secure tin supply into a world undergoing an energy transition and digital transformation.

"The recent jump in tin prices to above US$35,000 per tonne, as the reality of constrained global tin supply and low inventory becomes apparent, confirms that in using US$26,000 our DFS has been developed on a very conservative basis. While this provides comfort on the downside, it also shows the tremendous upside potential as tin prices inevitably respond to the structural change in demand and need for new supply. To this price benefit, we can also anticipate higher recoveries from ongoing mineral processing optimisation, as well as the potential to extend the mine life.

"The value from Taronga derives from its unique geology, mineralogy, and geography. The ore body outcropping on a ridge at the surface enables a low cost, bulk open pit mining solution with a low strip ratio. The coarse nature of the cassiterite enables rapid liberation with basic crushing and gravity separation processes. This delivers a range of benefits, quickly reducing material volume, significantly enhancing the grade and enabling a low tech, low capex and low-cost processing plant.

"Located in a historic tin mining district, which reduces permitting risk, Taronga is close to major transport infrastructure and the Company has also invested in freehold land and water rights. The topography, on-site bore water, and use of solar energy all contribute to low operating costs. As anticipated, forecast costs place Taronga towards the lowest quartile on the global cost curve.

"I would like to thank our extended team in Australia for their ability to translate Taronga's natural advantages into a simple open pit mine and processing plant with basic equipment that enables a fast build and early generation of cash.

"Tin is a critical mineral in many jurisdictions with structural demand growth arising from its fundamental role as the glue in electronics. With low global inventories, geopolitical tensions and supply-side issues, there is a clear need for new tin mines. The successful completion of this feasibility study is a major step forward for our Taronga project. We believe it is well positioned to be the world's next new tin mine.

"Our focus now turns to completion and submission of the environmental impact statement and moving the project through the final approval processes with the regulatory authorities, while concurrently moving forward our financing and off-take discussions for the next phase of development at Taronga."

Retail Investor Webinar

Bill Scotting, CEO, and Tony Truelove, Technical Director, will provide a live investor presentation relating to the results of the DFS via the Investor Meet Company platform today at 10:00 am BST.

The presentation is open to all existing and potential shareholders. Questions can be submitted at any time during the live presentation.

Investors can sign up to Investor Meet Company for free and add to meet FIRST TIN PLC via:

https://www.investormeetcompany.com/first-tin-plc/register-investor

Investors who already follow FIRST TIN PLC on the Investor Meet Company platform will automatically be invited.

Summary of the Definitive Feasibility Study Results

Project Economics

Tin is traded on the London Metals Exchange ("LME") and Shanghai Futures Exchange ("SHFE"). The average trailing 3 month tin prices and exchange rates for different time horizons as of 26th April 2024 is shown in Table 1.

Time	US$/t tin	AUD:USD rate	A$/t tin
Spot (26/4/24)	33,097	0.6523	50,739
1 Year Av	26,350	0.6584	40,021
3 Year Av	29,720	0.6951	42,756
5 Year Av	25,180	0.6969	36,131
10 Year Av	22,311	0.7359	30,317

Table 1: Tin price and exchange rates for different time periods

Based on the 1 year (US$26,350) and 5 year (US$25,180) average USD tin prices and forecasts by the International Tin Association ("ITA") and others that US$25,000 will be the new floor price for tin, a conservative tin price of US$26,000 (A$39,394) has been used for the DFS. As of 26th April 2024, the spot price was US$33,097 (A$50,739), which highlights the conservative assumption used in the DFS.

Exchange rates are more difficult to predict, and using past averages does not have any real significance going forward due to changing economic conditions. The value of the AUD is partly dependent on the Chinese economy, as China is Australia's main trading partner, and it is generally predicted that China's economy will slow down from its high rate of advance going forward. Long range forecasts are generally bearish for the AUD. Based on this, the current rate of around 0.65 to 0.66 is considered reasonable and it was decided that 0.66 be used for the current study.

The project's NPV is sensitive to the tin price as shown in Figure 1.

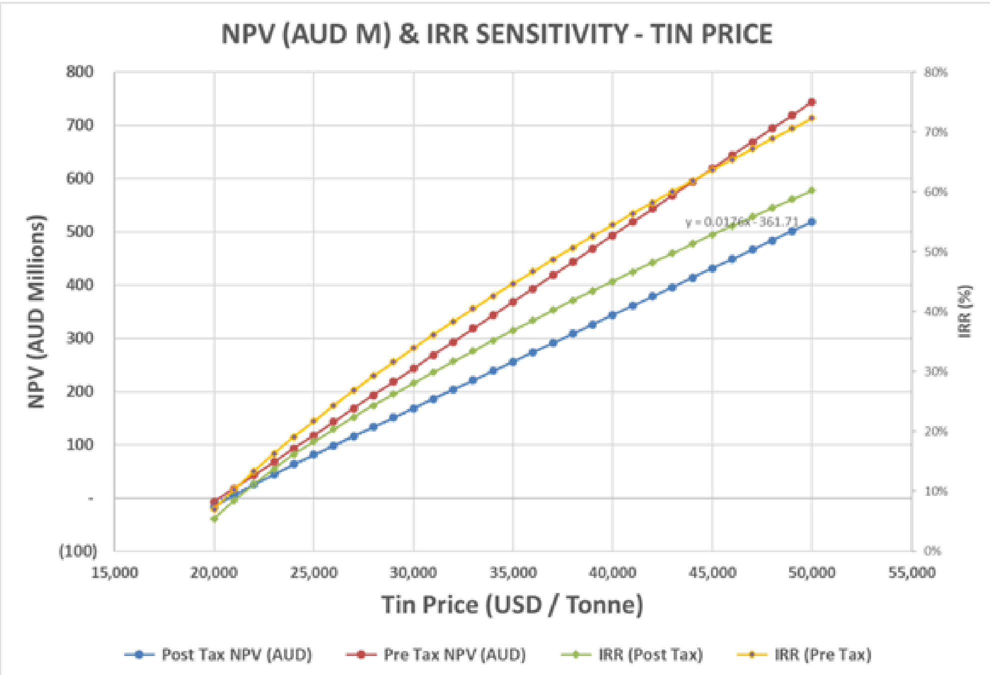


Figure 1 - Taronga Tin Project - NPV_8 Sensitivity to Tin Price

At the current tin price of US$33,097 (A$50,739) per tonne on 26th April, pre-tax NPV_8 and IRR are A$331 million and 42% respectively while post tax NPV_8 and IRR are A$230 million and 34% respectively. At the conservative tin price of US$26,000 (A$39,394) per tonne used as a base for the DFS, pre-tax NPV_8 and IRR are A$143 million and 24% respectively (post-tax A$98 million and 20%). A higher price scenario assuming a US$40,000 per tonne, implies a pre-tax NPV_8 of A$494 million and a post-tax NPV_8 of A$345 million.

Considering the recent movements in the tin price and the ITA forecast that an inducement price of US$33,800 per tonne is required to encourage new capacity, a tin price of US$30,000 per tonne is a useful mid-price comparable for this project. At this tin price the pre-tax NPV_8 is A$243 million and IRR of 34% (post-tax A$169m and 28%).

These comparisons are summarised in Table 2:

Scenario	DFS Base Case	Mid-Case	Current Spot	High Case
Tin Price US$/t	26,000	30,000	33,097	40,000
Pre-Tax NPV_8 AUD M	143	243	331	494
Pre/Post Tax IRR %	24/20	34/28	42/34	55/45

Table 2: Pre-tax NPV_8 Comparisons at alternative Tin Prices (other factors kept constant)

NPV sensitivity to other key inputs is shown in Figure 2.

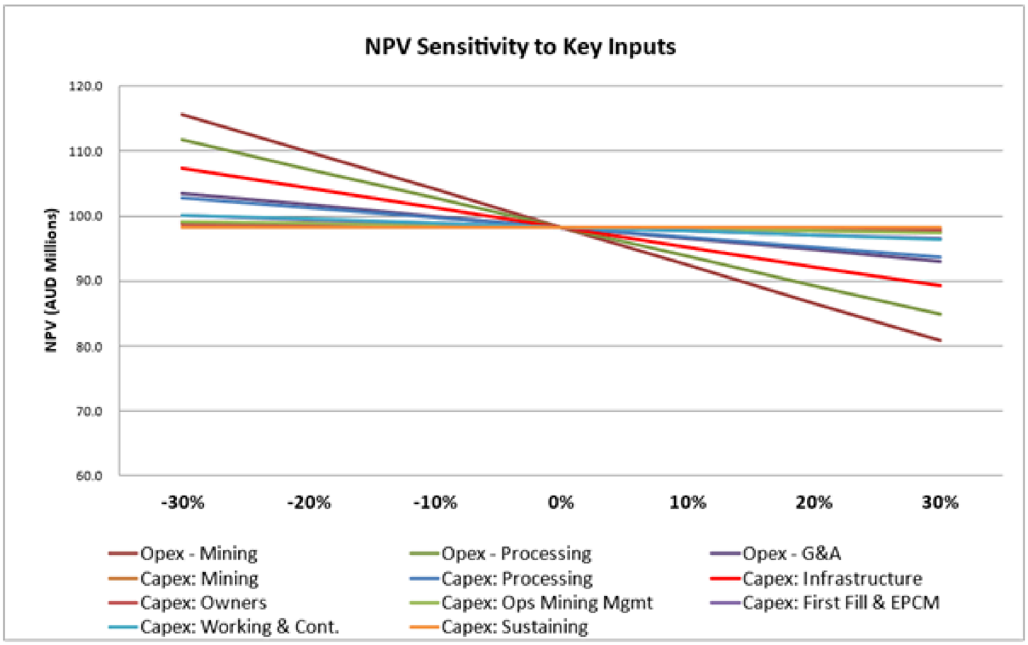


Figure 2 - Taronga Tin Project - NPV_8 Sensitivity to Key Inputs

Capital Costs

The total pre-production capital cost is A$176 million, which includes A$17 million (9.5%) for contingency. Also included in the capital costs is A$28 million (16%) for a behind the grid solar facility with gas generators, which will substantially lower the energy costs and CO_2 emissions over the life of the project.

A summary of the pre-production capital cost is shown in Table 3.

Item	**A$M**
Mining	7.1
Processing	42.1
Infrastructure (incl. renewable power)	82.4
Owner Costs	3.7
Ops Mining Management	8.4
First Fill & EPCM	16.1
Contingency	16.6
TOTAL	**176.4**

Table 3: Summary of Pre-Production Capital Costs

Operating Costs

Operating cost estimates have been included under the respective headings and are consolidated in Table 4 and Table 5.

Cost Centre	LOM Cost (A$M)	LOM Cost per Tonne Treated (A$/t)	LOM Cost per Tonne Treated (US$/t)
Mining	267.1	6.73	4.44
Processing	209.8	5.28	3.48
G&A	80.1	2.02	1.33
Total Site Costs (C1)	**557.0**	**14.03**	**9.26**
Rehab Bond	9.4	0.24	0.16
Off Site Costs (Smelting, Transport etc)	140.2	3.53	2.33
Royalties	22.7	0.57	0.38
Sustaining Capital	5.7	0.14	0.09
AISC Costs	**734.9**	**18.51**	**12.22**
Depreciation	162.4	4.09	2.70
Full Cost	**897.3**	**22.60**	**14.92**

Table 4: Summary of LOM Operating Costs per Tonne of Ore Treated

Cost Centre	LOM Cost (A$M)	LOM Cost per Tonne Tin (A$/t)	LOM Cost per Tonne Tin (US$/t)
Mining	267.1	8,724	5,758
Processing	209.8	6,853	4,523

G&A	80.1	2,615	1,726
Total Site Costs (C1)	**557.0**	**18,192**	**12,007**
Rehab Bond	9.4	308	203
Off Site Costs (Smelting, Transport etc)	140.2	4,578	3,023
Royalties	22.7	741	489
Sustaining Capital	5.7	186	123
AISC Costs	**734.9**	**24,005**	**15,843**
Depreciation	162.4	5306	3502
Full Cost	**897.3**	**29,311**	**19,345**

Table 5: Summary of LOM Operating Costs per Tonne of Tin Sold

These costs place Taronga firmly in the lower half of production costs worldwide and close to the lowest quartile. Figure 3, reproduced with permission from the ITA, shows the projected worldwide tin mine full costs in 2027 based on 2022 data. Taronga's projected full cost, including depreciation, is US$19,345 per tonne, well below the forecast US$33,800 tin price required to induce new capacity.

Taronga Projected Full Cost US$19,345

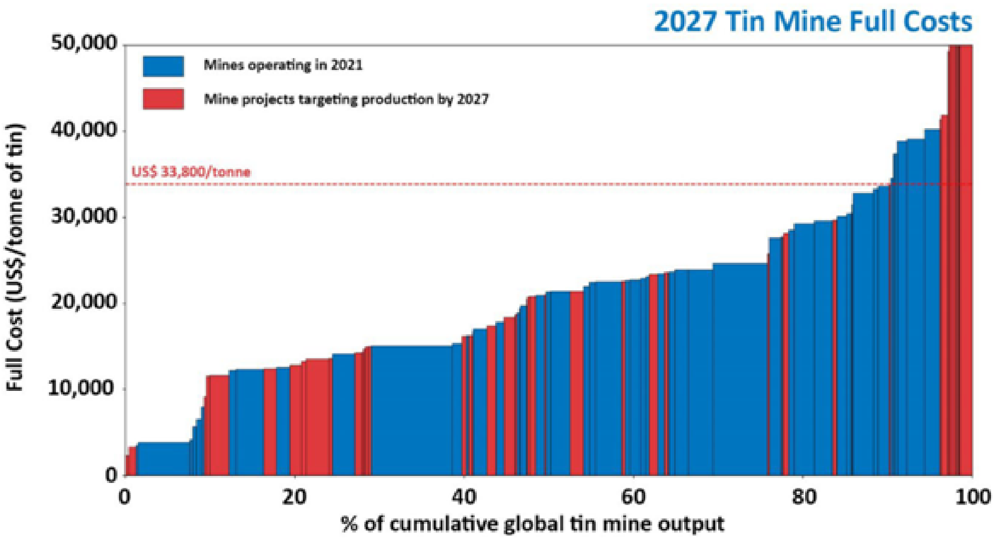


Figure 3: ITA Projected Tin Mine Full Production Costs 2027 (Based on 2022 Data, Used with Permission From ITA)

At these competitive costs, Taronga is estimated to have an EBITDA margin of over 50% at current tin prices as Figure 4 illustrates.

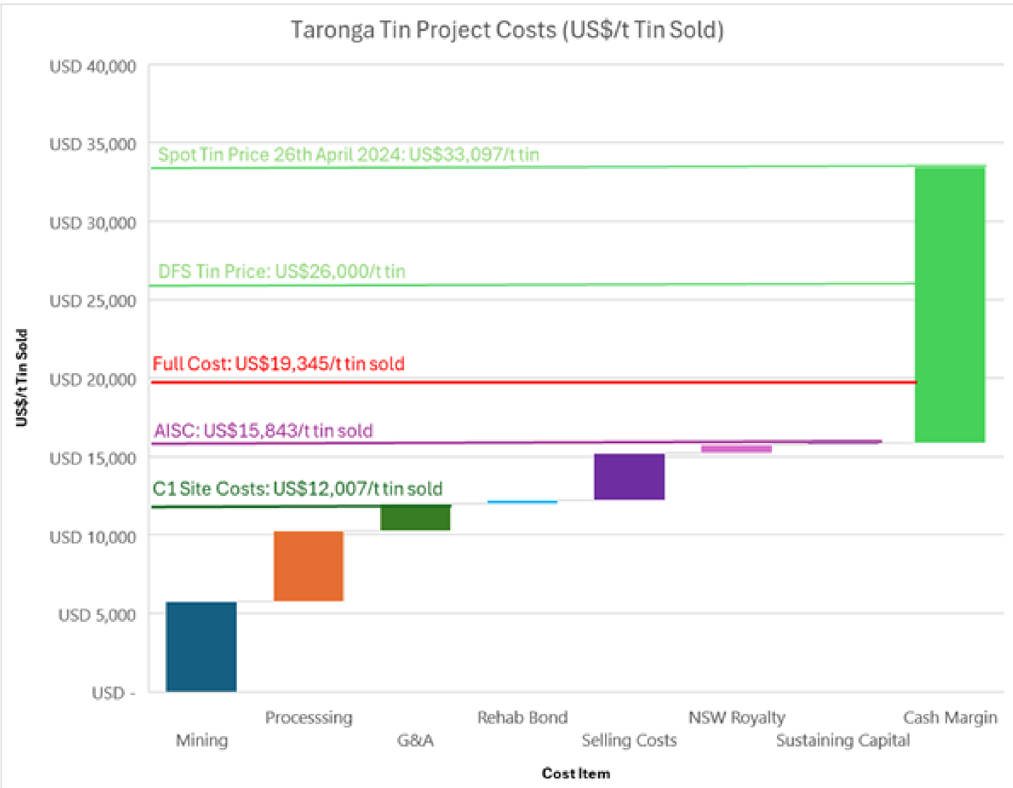


Figure 4: Taronga Tin Project - Costs and Margin per Tonne Tin Sold at Current Tin Price and Exchange Rate

Operational drivers and approach

During the feasibility study, TMPL, Mincore and the various sub-consultants examined several options for the project via trade-off studies. Options considered include size and scale of operations, owner operator vs contract mining, several mineral processing, ore sorting and crushing options, infrastructure locations, wet tailings vs dry stack, use of waste rock as aggregate and grid vs renewable power options.

The result of these trade-off studies led to the following go-forward option which forms the basis of the DFS:

1. The simple coarse grained ore body, outcropping at the surface along a high sided ridge, is amenable to low cost, low risk, bulk open pit mining, with a low strip ratio and relatively easy grade control. Resultant total material movement of around 10 million tonnes per year, at an average strip ratio of approximately 1:1 provides 5 million tonnes per annum of ore to the processing plant. Mining will be owner operator with a leased fleet, with ore mining predominantly during daylight hours and waste removal mainly during evening hours.

2. Conventional 3-stage jaw-cone-cone crushing only during daylight hours, to reduce night-time noise and make best use of the solar power.

3. Twenty-four hour operation for the rest of the processing facility that consists of single pass vertical shaft impact (VSI) crushing, jigs, spirals, re-grind of tailings and middlings, clean-up by shaking tables and final dressing consisting of sulphide flotation, re-grind, magnetic separation and shaking tables. This simple, low tech, low capex and low-cost processing plant is enabled by the simple mineralogy and coarse nature of the cassiterite.

4. The rock easily fractures along the quartz veins allowing rapid liberation that quickly reduces material volume and enhances the grade. This allows pre-concentration by crushing to 12mm and screening at 2.8mm, with no ore sorting, as the crushing process recovers around 80-90% of the tin to 44-60% of the mass, depending on starting grade. Tin recovery will be initially limited to the coarse tin gravity circuit as described above, to make the processing circuit as simple and cost effective as possible. An add-on fine tin flotation circuit could be included at a later stage to improve recoveries by an additional 5-10%,

5. Stockpile the relatively low volumes of sulphides, which contain significant copper and silver, in a fully lined wet tailings storage facility for possible re-treatment later.

6. Dry stacking of all non-sulphide tailings material, with coarse rejects from the VSI crusher (2.8mm to 12mm size fraction), coarse tailings from the jigs circuit (0.3mm to 2.8mm size fraction) and de-watered (filtered) fine tailings from the spirals/tables (<0.3mm) all sent by conveyor to a dry co-disposal facility.

7. Use waste rock and possibly coarse rejects for on-site aggregate requirements and other local usage. Main markets are too distant for economic transport.

8. Locate the main infrastructure, including crushing and processing facilities, workshops, waste rock emplacements and co-disposal facility, to the north of the open pits to reduce visibility, noise and dust. The admin buildings, power plant, magazine and security will be to the south of the open pits.

A general mine layout is shown in Figure 5:

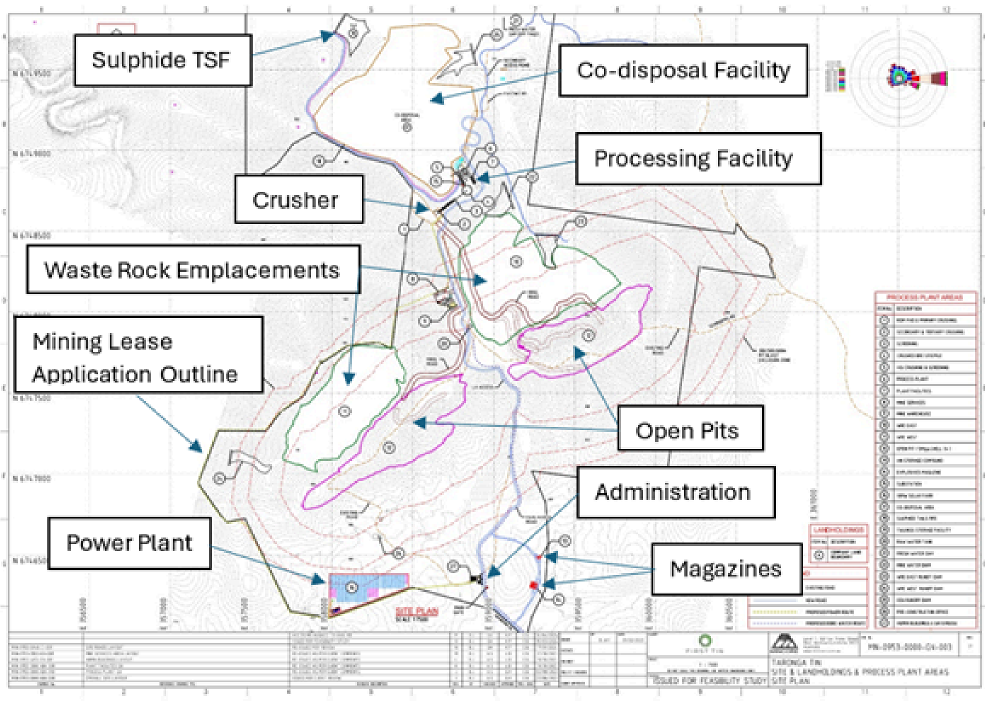


Figure 5: Taronga Tin Project – Layout

Geology, Mineral Resource Estimate and Ore Reserve Estimate

The Taronga deposit consists of a series of sub-vertical sheeted quartz-mica-sulphide-cassiterite+/-topaz-fluorite veins that vary from 0.1mm to 100mm (dominantly 1-10mm) in width and have an average density of 5 to >20 veins per metre.

Tin occurs dominantly (>90%) as relatively coarse cassiterite (SnO_2) that averages 0.3-3mm in size, occasionally to >10mm. The cassiterite is dominantly hosted within the veins, with volumetrically insignificant, very fine grained cassiterite sometimes found in haloes to the veins.

The veins tend to occur in sets, with four main zones identified as Hillside, Hillside Extended, Payback and Payback Extended (Figure 6). The four zones appear to coalesce into a single zone in the northeast (North Pit) area.

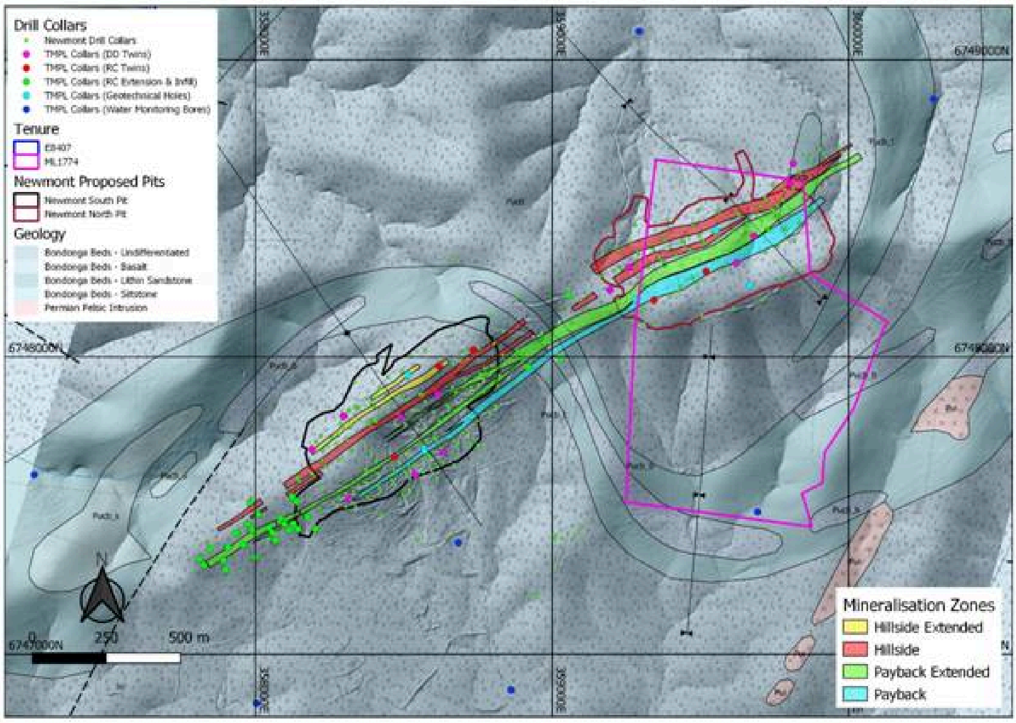


Figure 6: Taronga Tin Project - Interpreted Zones of Mineralisation

Newmont completed 33,350m of predominantly diamond drilling in 357 drillholes between 1981 and 1984. TMPL twinned a selection of the Newmont drillholes throughout the deposit which successfully confirmed the quality and reliability of the Newmont drilling. TMPL also completed several infill and extensional drill holes as well as 6 geotechnical drillholes. The total drilling completed by TMPL is:

- South Pit area 4,694m in 43 drillholes
- North Pit area 1,639m in 16 drillholes
- Geotechnical 670m in 6 drillholes

The distribution of these drillholes is shown on Figure 6.

Based on the twin hole drilling, independent resource estimation consultants H&S Consultants Pty Ltd ("H&SC") concluded that the Newmont drilling is accurate and reliable and is suitable for the resource estimation.

H&SC subsequently combined the TMPL and Newmont drilling data into a single database and used that for their updated Mineral Resource estimate (MRE), as reported in Table 6.

Category	Mt	Sn %	Sn kt	Density t/m^3
Measured	33.0	0.13	44.2	2.75
Indicated	38.9	0.11	42.0	2.75
Inferred	61.1	0.09	51.9	2.76
Total	**133.0**	**0.10**	**138.3**	**2.75**

Table 6: Taronga MRE reported in accordance with the 2012 JORC Code and Guidelines (see Appendix 1 for Table 1)

Based on the final pit designs, an Ore Reserve Estimate reported in accordance with 2012 JORC Code Guidelines has been defined as per Table 7. Details are included in the Ore Reserve Statement included as Appendix 1 to this RNS.

Category	Zone	Mt	Sn %	Sn kt
Proved	North Pit	19	0.13	26
	South Pit	7	0.14	10

	Total	**26**	**0.14**	**36**
Probable	North Pit	9	0.11	10
	South Pit	5	0.12	6
	Total	**13**	**0.12**	**16**
Total	North Pit	28	0.13	36
	South Pit	12	0.13	16
	Total	**40**	**0.13**	**52**

Table 7: Taronga Ore Reserve Estimate Based on Final Pit Designs reported in accordance with the 2012 JORC Code and Guidelines (see Appendix 1)

Upside Potential

The pit optimisations and subsequent detailed designs are based on the initial recovery formula (average 54% recovery) that has since been shown to be far too conservative.

As reported on 25th April 2024, ongoing mineral processing test work has shown a total recovery of 60.2% for a low grade sample (0.10% head grade). Crushing test work on a high grade (HG) sample (0.15% head grade) provided a 91.2% recovery of tin in 44% of the mass, grading 0.30% Sn. If the gravity concentration recoveries for the HG sample can be shown to be similar to the 71.2% obtained for the low-grade samples, then total recovery at a head grade of 0.15% should be around 65-66%.

As these results arrived too late to re-design the pits, waste rock emplacements, co-disposal areas and tailings storage facility for the DFS, an updated recovery was only used for the economic modelling. However, revised pit optimisations (not used for the DFS) suggest that at currently achieved recoveries of ca. 59%, the mine life and pre-tax NPV of the project is likely to increase from that reported in the DFS.

At a later stage an add-on fine tin circuit could be included to improve recoveries by 5-10%.

Recently announced soil sampling results suggest the presence of additional tin mineralisation. Success from any subsequent follow up drilling could result in the identification of new Mineral Resources which could significantly add to mine life and the project economics. There are several areas that require additional drilling to define potential additional Mineral Resources including:

1. Current Inferred Resources
2. Potential parallel zones immediately NW of the current pits.
3. Extensions to the NE and SW of the current pits (mineralisation not closed off).
4. Between the two pits where recent drilling has returned previously unknown mineralisation.
5. Potential parallel zones to the SE of the current pits.

Enquiries:

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Notes to Editors

First Tin is an ethical, reliable, and sustainable tin production company led by a team of renowned tin specialists. The Company is focused on becoming a tin supplier in conflict-free, low political risk jurisdictions through the rapid development of high value, low capex tin assets in Germany and Australia, which have been de-risked significantly, with extensive work undertaken to date.

Tin is a critical metal, vital in any plan to decarbonise and electrify the world, yet Europe has very little supply. Rising demand, together with shortages, is expected to lead tin to experience sustained deficit markets for the foreseeable future.

First Tin's goal is to use best-in-class environmental standards to bring two tin mines into production, providing provenance of supply to support the current global clean energy and technological revolutions.

Technical Details:

Introduction

The Taronga tin deposit is owned 100% by Australian registered Taronga Mines Pty Ltd (TMPL), a wholly owned subsidiary of First Tin Plc via an intermediary Australian registered company First Tin Australia Pty Ltd. There are no joint ventures or other encumbrances.

The deposit sits in northeastern NSW, Australia, approximately 370km by road southwest of Brisbane and 630km by road north of Sydney (Figure 1) and is secured by ML 1774 (valid to 21/12/2029) and EL 8407 (valid to 4/11/2028). All licences are currently in good standing. A mining lease application (ML 642) was made on 19/12/2023 for an area covering the entire mining and infrastructure requirements (Figure 1).

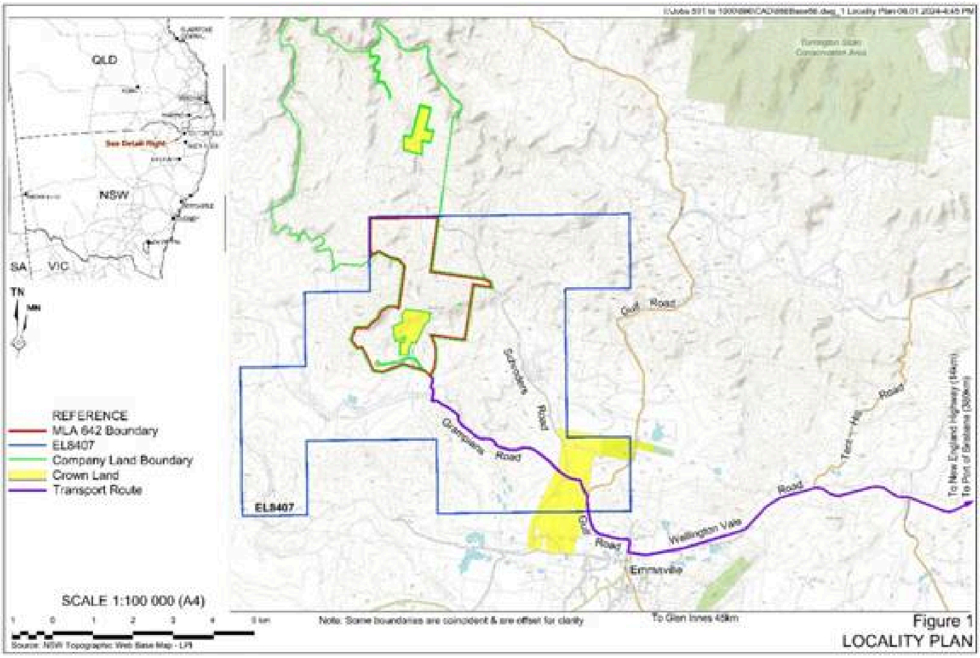

Figure 1: Taronga Tin Project - Location Plan

Tin mineralisation was discovered in the Emmaville district in 1872 and was mined semi-continuously until the mid-1980s when the tin price rapidly retreated due to the collapse of the International Tin Cartel. A total of over 89,000t tin concentrates have been produced from the district.

Initial work in the immediate Taronga area, consisting of alluvial and eluvial mining of the gullies draining the Grampians Range, where the Taronga deposit is located, was undertaken intermittently between 1872 and 1924.

The hard rock deposit was originally targeted by BHP who conducted exploration intermittently between 1933 and 1966, including excavation of an adit, diamond drilling and surface trenching.

Between 1971 and 1978, the surficial eluvial material on the south slope of Grampians Range was mined by Minerals Recovery (Australia) NL using a scraper, trommels and jigs.

The most intense phase of exploration was conducted by Newmont Holdings Pty Ltd on behalf of a Joint Venture with ICI Australia Operations, Endeavour Resources and Pelsart Resources, between 1978 and 1985. This work included 33,350m drilling in 357 drillholes, the excavation of three adits, estimation of a mineral resource (pre-JORC), extensive mineral processing testwork and mining and infrastructure studies culminating in a feasibility study. The Newmont non-JORC mineral resource estimate (MRE) was 37.6Mt @ 0.15% Sn (56,000t tin).

In August 2013, Aus Tin Mining Ltd re-evaluated and re-modelled the Newmont data and announced a maiden Mineral Resource estimate (MRE) in accordance with the 2012 JORC Code and Guidelines of 36.3Mt @ 0.16% Sn (57,000t tin). They subsequently completed a pre-feasibility study that returned an ore reserve estimate of 22Mt @ 0.16% Sn (35,200t tin).

TMPL owns approximately 25km^2 of freehold land covering most of the deposit as shown on Figure 1. Land use in the district is rural, with areas of agricultural land and scrubland, plus substantial areas degraded by the previous 100 years of mining activities. No National Parks or Conservation Areas occur within the proposed mining area. The nearest township is Emmaville, population 270, that is located approximately 7km to the southeast of the deposit.

In late 2022, TMPL commissioned Mincore Pty Ltd based in Melbourne, Australia, to be lead consultants responsible for completing a Feasibility Study to Level 3 engineering standards (as per AusIMM guidelines, accuracy +/-10%) on the Taronga tin deposit. Mincore retained several specialist sub-consultants to complete certain aspects of the study including:

- H&SC Consultants - Geology and Mineral Resource estimation
- Australian Mine Design and Development (AMDAD) - Mining and Ore Reserves
- Pells Sullivan Meynink (PSM) - Geotechnical Engineering
- ATC Williams - Tailings and Water Management
- RW Corkery - Environmental

During the feasibility study, TMPL, Mincore and various sub-consultants examined several options for the project via trade-off studies. Options considered include size and scale of operations, owner operator vs contract mining, several mineral processing, ore sorting and crushing options, infrastructure locations, wet tailings vs dry stack, use of waste rock as aggregate and grid vs renewable power options.

The result of these trade-off studies is the following go-forward single option and the basis of the feasibility study:

1. Optimum scale of operation of 5 million tonnes per annum (Mtpa) through the processing facility at a strip ratio of approximately 1:1, with around 10Mtpa total material movement from two open pits.
2. Owner operator mining with a leased fleet.
3. Twenty four hour mining operation, with ore mining preferred during daylight hours and mainly waste mining during evening hours.
4. Pre-concentration by crushing to 12mm and screening at 2.8mm, with no ore sorting, as the crushing process recovers around 80-90% of the tin to 44-60% of the mass, depending on starting grade.
5. Conventional 3-stage jaw-cone-cone crushing (largest on-site power draw) during daylight hours only, in order to reduce nighttime noise and make best use of solar power.
6. Twenty four hour operation for the rest of the processing facility that consists of single pass vertical shaft impact (VSI) crushing, jigs, spirals, re-grind of tailings and middlings, clean-up by shaking tables and final dressing consisting of sulphide flotation, re-grind, magnetic separation and shaking tables.
7. Tin recovery initially limited to the coarse tin gravity circuit as described above, to make the processing circuit as simple and cost effective as possible. However, testwork on recovering additional tin from the fine fraction is currently in progress and will likely be implemented once the coarse circuit is running smoothly, with the aim of improving overall tin recovery by an additional 5-10%.
8. Stockpile the sulphides, which contain significant copper and silver, in a fully lined wet tailings storage facility for possible re-treatment later.
9. Dry stacking of all non-sulphide tailings material, with coarse rejects from the VSI crusher (2.8mm to 12mm size fraction), coarse tailings from the jigs circuit (0.3mm to 2.8mm size fraction) and de-watered (filtered) fine tailings from the spirals/tables (<0.3mm) all sent by conveyor to a dry co-disposal facility.
10. Use waste rock and possibly coarse rejects for on-site aggregate requirements and other local usage. Main markets are too distant for economic transport.
11. Locate the main infrastructure, including crushing and processing facilities, workshops, waste rock emplacements and co-disposal facility, to the north of the open pits to reduce visibility, noise and dust. The admin buildings, power plant, magazine and security will be to the south of the open pits.

A general mine layout is shown as Figure 2 below:

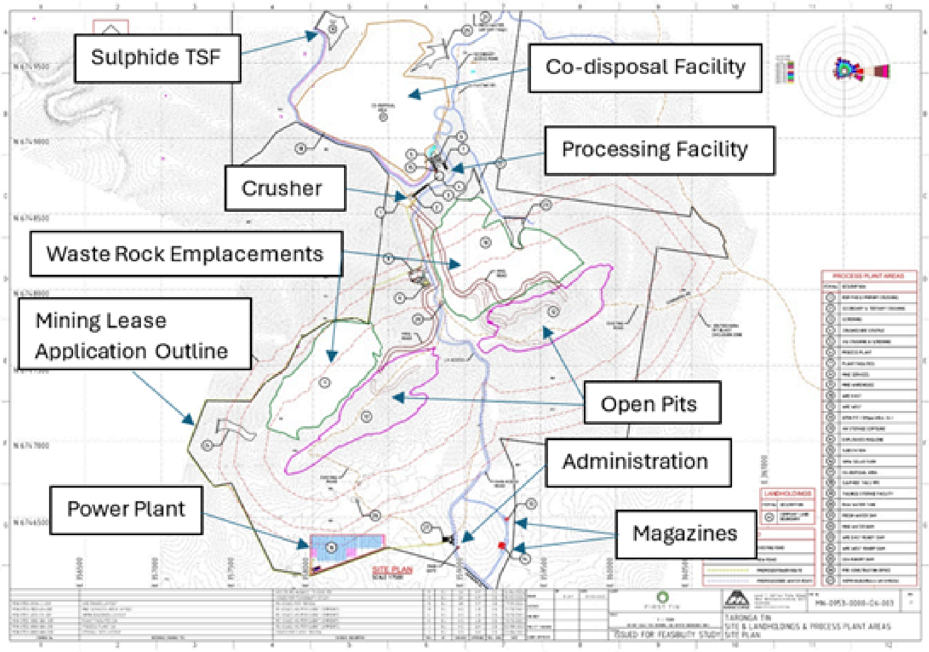

Figure 2: Taronga Tin Project – Layout

Geology and Mineral Resource Estimate

The Taronga tin deposit is located within the New England orogen in northeastern NSW. This orogen is the most easterly and youngest orogen of the Tasmanides system, which formed the south-eastern margin of the Gondwana supercontinent. It was an active westward dipping subduction zone active from the Silurian to Carboniferous periods. During the Permian, eastern rollback of the plate margin resulted in extension and formation of small rift basins.

Following cessation of subduction, large volumes of I- and A- type granites were intruded into the former accretionary complex rocks during the middle Permian to Triassic. These represent the roots of a new continental margin arc and are the last remnants of an active arc margin on the Australian continent.

These granites are the source of the mineralising fluids responsible for depositing the tin mineralisation at Taronga.

The Taronga deposit is hosted by metasediments of the Permian aged Bondonga Beds that have been partially converted to hornfels due to the contact metamorphic effects of the intrusion of the Triassic aged Mole Leucogranite. The Mole Leucogranite is a reduced, I-Type, highly fractionated, multiple intrusion and is interpreted as being the source for the magmatic fluids responsible for most of the mineralisation in the district.

Granite, interpreted to be an apophysis of the Mole Leucogranite, has been intersected by drilling at depth beneath the Taronga deposit, and several non-outcropping ridges of granite, generally trending in a northeasterly direction, are interpreted as underlying most of the known tin mineralisation in the district (Figure 3).

Tin mineralisation in the district comprises:

1. Sub-vertical sheeted quartz-mica-sulphide-cassiterite+/-topaz-fluorite veins (sheeted veins).
2. Greisens at the apices of granite intrusions.
3. Quartz-mica greisen lodes and veins, generally sub-vertical.
4. Eluvial or weathered bedrock deposits.
5. Alluvial or placer deposits.
6. Palaeo-alluvial deposits or "deep leads".

A total of over 89,000t tin as cassiterite concentrates has been produced in the district since 1872, mainly from alluvial, deep lead, and eluvial (weathered bedrock) deposits around Emmaville. Production from lodes has been relatively minor.

The Taronga deposit consists of a series of sub-vertical sheeted quartz-mica-sulphide-cassiterite+/-topaz-fluorite veins that vary from 0.1mm to 100mm (dominantly 1-10mm) in width and have an average density of 5 to >20 veins per metre.

Tin occurs dominantly (>90%) as relatively coarse cassiterite (SnO_2) that averages 0.3-3mm in size. The cassiterite is mainly hosted within the veins, with volumetrically insignificant, very fine grained cassiterite sometimes found in haloes to the veins.

The veins tend to occur in sets, with four main zones identified as Hillside, Hillside Extended, Payback and Payback Extended (Figure 4). The four zones appear to coalesce into a single zone in the northeast (North Pit) area.

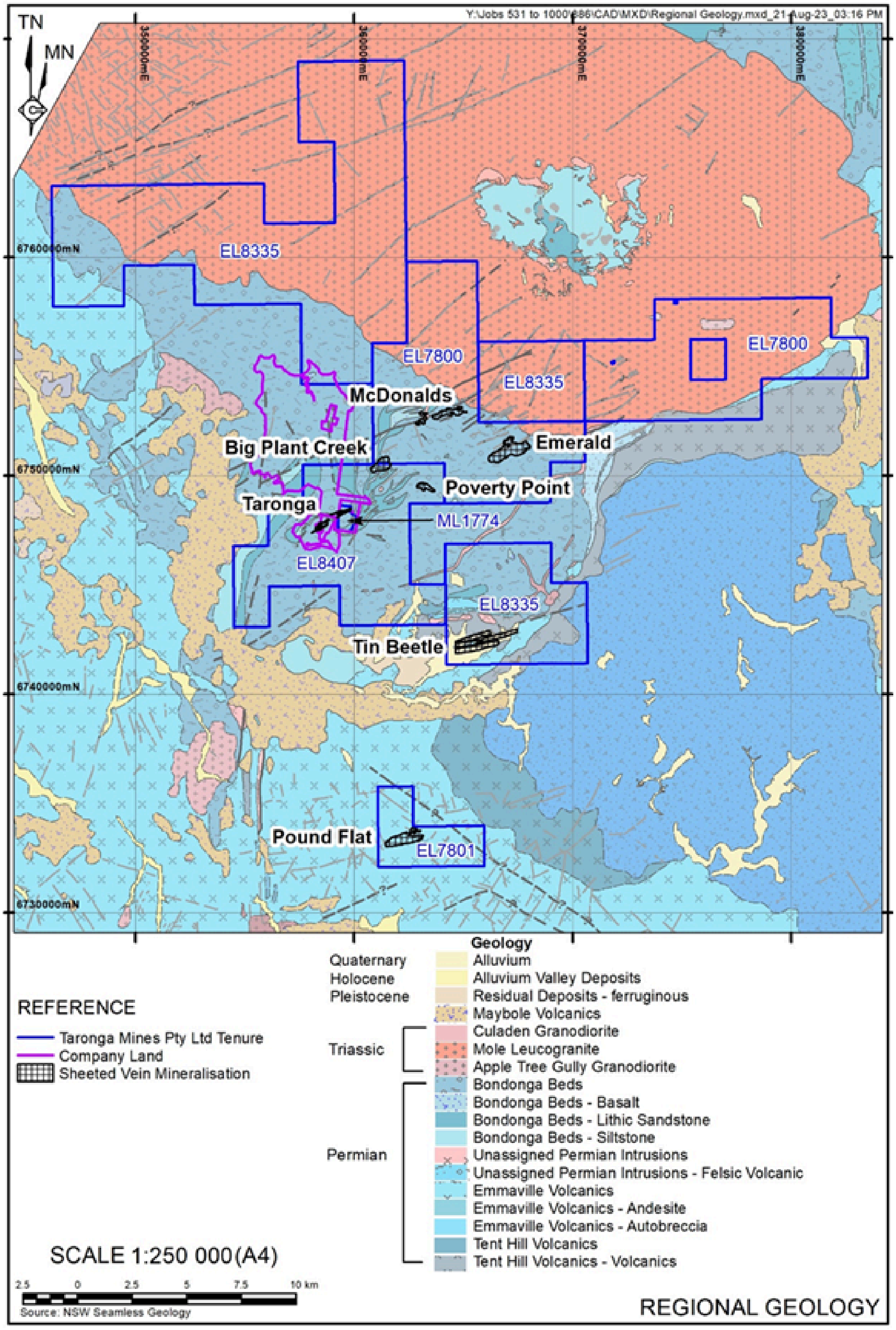

Figure 3: Taronga Tin Project - Regional Geology

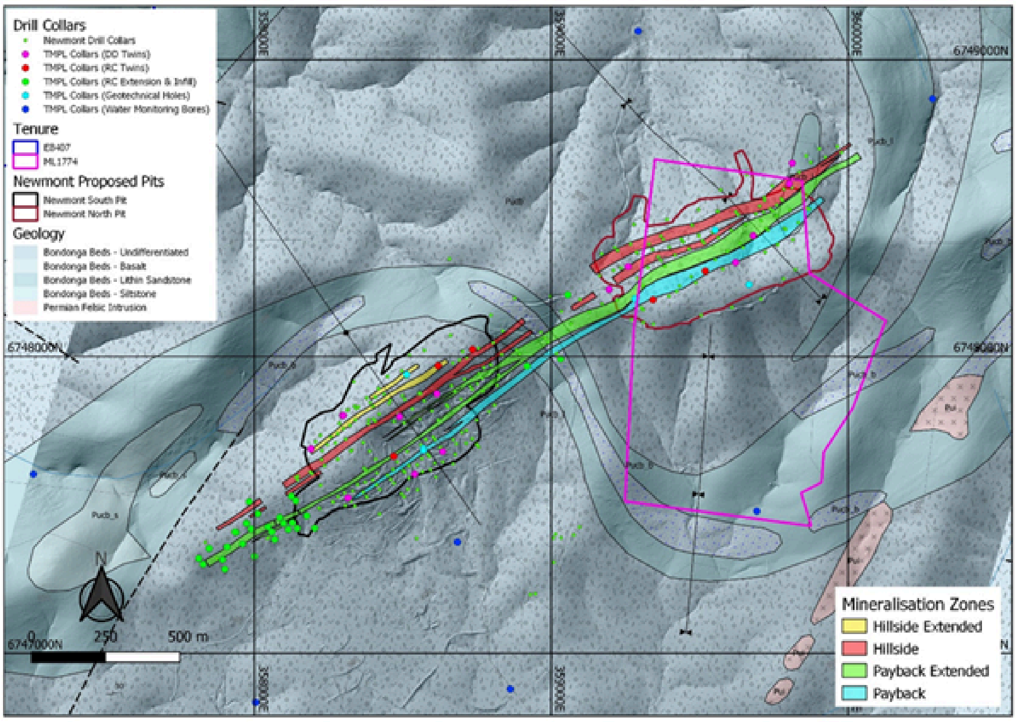

Figure 4: Taronga Tin Project - Main Mineralisation Zones

Oxidation is very limited, with relatively fresh rock occurring almost at surface. Deeper weathering can be seen along some of the vein sets, which appear to have been preferentially weathered.

The general structural trend is ENE, parallel to the mineralised veins. Two subsidiary structural trends are observed, one at approximately 90° to the main vein trend and sub-vertical, the other sub-horizontal and probably related to cooling and contraction of the underlying granite.

A basalt layer forms a sinusoidal zone that separates the North Pit and South Pit areas and may have been a less favourable rheological setting for the mineralisation. Slightly different elemental distribution is noted on either side of the basalt, representing different stratigraphic or litho-structural associations.

Newmont completed 33,350m drilling in 357 drillholes between 1981 and 1984. TMPL twinned a selection of the Newmont drillholes throughout the deposit that successfully confirmed the quality and reliability of the Newmont drilling. TMPL also completed several infill and extensional drill holes as well as 6 geotechnical drillholes. The total drilling completed by TMPL is:

- South Pit area 4,694m in 43 drillholes
- North Pit area 1,639m in 16 drillholes
- Geotechnical 670m in 6 drillholes

The distribution of these drillholes is shown on Figure 4.

Based on the twin drilling, consultants H&SC concluded that the Newmont drilling is accurate and reliable and is suitable for resource estimation.

H&SC subsequently combined the TMPL and Newmont data into a single database and used that for their updated Mineral Resource estimate (MRE). There is sufficient drilling data to allow for unconstrained modelling of 1m composites (35,178 samples) via Ordinary Kriging to generate a block model. The new MRE is reported for a 0.05% tin cut off to a nominal depth of 300m below surface as shown in Table 1 and has previously been reported in detail in RNS 3792M on 14th September 2023.

Category	**Mt**	**Sn %**	**Sn kt**	**Density t/m^3**
Measured	33.0	0.13	44.2	2.75
Indicated	38.9	0.11	42.0	2.75
Inferred	61.1	0.09	51.9	2.76
Total	**133.0**	**0.10**	**138.3**	**2.75**

Table 1: H&SC Reported MRE in accordance with 2012 JORC Code & Guidelines (see Appendix 1 for Table 1)

The tin block grade distribution from the resource model is shown on Figure 5. The four main zones can be seen in the South Pit area and appear to coalesce as two to three zones in the North Pit area.

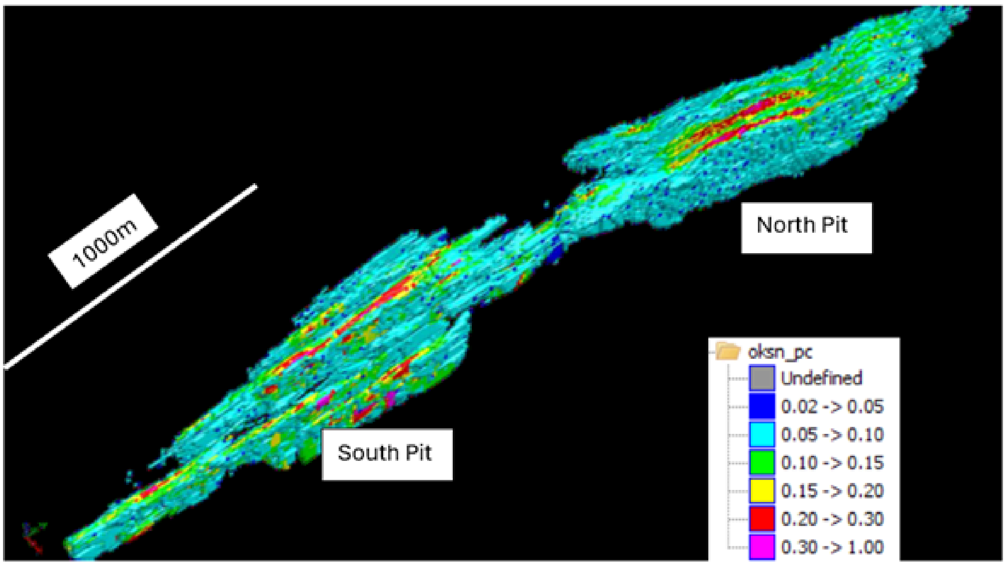

Figure 5: Taronga Tin Project – Block Grade Distribution (local grid)

Mining & Ore Reserves

Sub-consultants Australian Mine Design and Development Pty Ltd (AMDAD) conducted pit optimisations, final pit designs, haul road design and mining schedules to obtain an optimum mine design for the project.

Pit optimisations applied processing and financial inputs nominated by Mincore and TMPL, and mining parameters defined by AMDAD, to define the optimal mining shell.

The pit optimisations are based on a tin price of A$39,286 and a recovery formula nominated by TMPL/Mincore that averages around 54% recovery. This formula was based on partial results of an ongoing work programme and has subsequently been shown to be too conservative. A new formula has now been nominated by TMPL/Mincore that averages around 59% recovery based on the recent mineral processing testwork results. However, the pits have not been re-designed at this stage due to time constraints. Revised pit optimisations (not included as part of the main DFS) have been undertaken to show what the effect is likely to be (see "Upside Potential" section below).

The optimisation results indicate that (Figure 6):

1. Shell 36, the "revenue factor 1.00" shell, generates the highest undiscounted cashflow, in a 103.2Mt pit with a total mill feed of 45.6Mt at 0.13%Sn. Each shell increment up to this shell will add value on an undiscounted cash basis. Stepping out to larger shells will progressively lose value on an undiscounted cash basis.

2. When cashflows are discounted at 8%, Shell 30 generates the highest discounted cashflow (DCF) for a "worst case" (no stages) schedule, in a 71.0Mt pit with a total mill feed of 36.1Mt at 0.13%Sn.

3. With cashflows discounted at 8%, Shell 31 generates the highest DCF for a "specified case" with Shell 17 as a starter pit. This gives a 77.6Mt pit with a total mill feed of 38.2Mt at 0.13%Sn.

The specified schedule shells were selected for preparation of pit designs. These shells included adjustment within Whittle^{TM} to ensure a minimum mining width of 40m.

AMDAD prepared the practical stage open cut designs from the optimal starter pit shells and final shells using geotechnical slope parameters provided by PSM, and ramp widths nominated by TMPL. A starter pit design and final pit design were prepared for both the North Pit and South Pit. The designs included:

North Pit

- Exit at 870mRL for both starter pit and final pit
- Geotechnical berm at 910mRL on the south wall

South Pit

- Starter Pit is of a smaller scale than Shell 17, related to narrow widths in this shell

Final designs are shown in Figure 7.

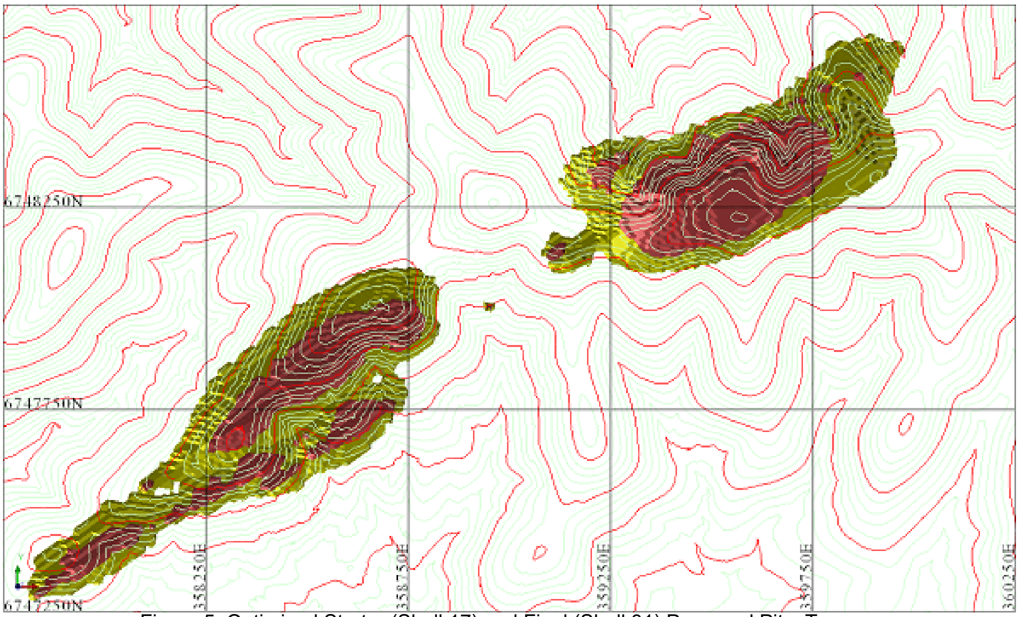

Figure 5: Optimised Starter (Shell 17) and Final (Shell 31) Proposed Pits, Taronga

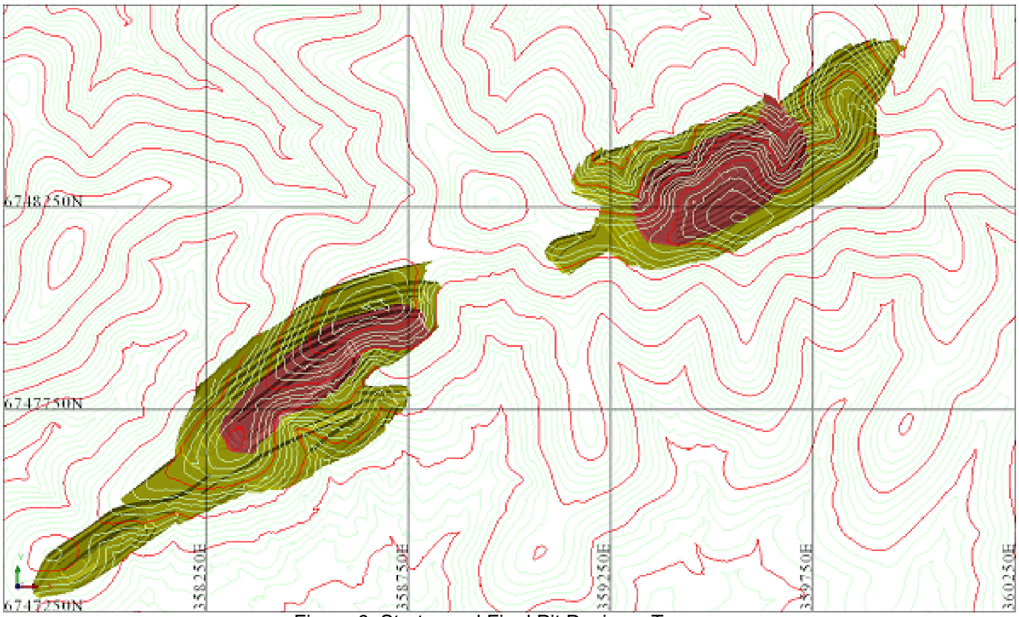

Figure 6: Starter and Final Pit Designs, Taronga

A detailed life of mine schedule was prepared by AMDAD based on the open cut and WRE designs. This schedule includes the following features:

- Processing plant ramps up over 9 months
- Mining ramps up to match the requirements of the processing plant
- ROM stockpile kept around 100kt to maintain feed supply between pit stages, and a maximum size of 200kt
- Peak processing rate of 5Mtpa, peak mining rate of 10Mtpa
- Total mine life of 9 years

Mining costs were estimated using a first principles cost model covering the following cost components:

- Labour costs
- Fleet ownership and operating costs
    - Load and Haul fleet
    - Ancillary fleet
- Contract Drill and Blast costs
- Ancillary Activities including:
    - Grade Control
    - Slope Stability
    - Pit Water Management

The average mining cost, inclusive of fixed mining costs, is A$3.84/t mined. This equates to A$6.73/t treated due to the strip ratio and other factors.

The mining costs assume Taronga will be predominately owner operator, with only drill and blast activities to be undertaken by contractors. TMPL has specified that the operation will use a lean personnel model, with recruitment targeting experienced and multi-skilled technical staff and operations personnel to keep the headcount low and minimise labour costs.

The mining workforce will comprise:

- 18 management, supervision, and technical staff
  - Clerical and General Assistant will be shared with Processing
- 33 operators
  - Split across four shifts
  - Three ancillary operators will work dayshift, one on nightshift
- 11 maintenance fitters
  - Generally working dayshift
  - Fitter numbers will increase periodically when major rebuilds of the mine fleet are required.

The Taronga heavy equipment fleet reflects a conventional truck and excavator operation, and consists of the following:

- 140t primary excavator (e.g. CAT 6015) x 1
  - Working wider ore and waste zones in the North pit
  - Will also excavate bulk waste zones in the South pit
- 90t secondary excavator (e.g. CAT 395) x 1
  - Works narrower ore and waste zones in the South pit
- 90t haul trucks (e.g. CAT 777G) x 4
- Ancillary vehicles
  - Dozers (e.g. CAT D9 and CAT D6) x 2
  - Grader (e.g. CAT 14M) x 1
  - Water truck (e.g. CAT 745) x 1
  - ROM wheel loader (e.g. CAT 992) x 1
  - Other (e.g. service truck, tray truck, forklift, scissor lift)

Based on the final pit designs, an Ore Reserve Estimate reported in accordance with 2012 JORC Code Guidelines has been defined and is shown in Table 2:

Category	Zone	Mt	Sn %	Sn kt
Proved	North Pit	19	0.13	26
	South Pit	7	0.14	10
	Total	**26**	**0.14**	**36**
Probable	North Pit	9	0.11	10
	South Pit	5	0.12	6
	Total	**13**	**0.12**	**16**
Total	North Pit	28	0.13	36
	South Pit	12	0.13	16
	Total	**40**	**0.13**	**52**

Table 2: Taronga Ore Reserve Estimate Based on Final Pit Designs reported in accordance with the 2012 JORC Code and Guidelines (see Appendix 1 for Ore Reserve Statement and Table 1)

Note: The tonnes and grades shown are stated to a number of significant figures reflecting the confidence of the estimate. The table may nevertheless show apparent inconsistencies between the sum of components and the corresponding rounded totals.

Mineral Processing

A large amount of mineral processing testwork has been completed by Newmont (1979-1984), Aus Tin (2014-2016) and TMPL (2022-2024).

This work included a large number of geological and mineralogical observations that concluded the mineralisation is unique in that tin occurs almost entirely in the form of relatively coarse cassiterite (0.3-3mm, occasionally to 30mm) restricted to a network of sheeted quartz-mica-cassiterite-sulphide+/-topaz-fluorite veins within hornfels or silicified metasediments. The veins have a lower rock strength than the host rock, resulting in preferential breakage along the veins during crushing.

These unique characteristics result in most of the tin being liberated as relatively coarse cassiterite during the crushing process, with 80-90% of the tin being liberated into the minus 2.8mm fraction after crushing to 12mm followed by a single pass through a vertical shaft impact (VSI) crusher. This is equivalent to, or better than, most ore sorting results obtained at other tin mines and projects, and at a fraction of their capital and operating costs.

The work undertaken by Newmont resulted in an estimated coarse tin recovery (excluding fine tin flotation) of between 57% and 63% by the following flowsheet:

1. Crush to 12mm (80% passing 9.5mm) and screen out the minus 1mm fraction.
2. Dense media separation (DMS) of the 1-12mm fraction, with floats sent directly to waste.
3. Grind DMS sinks (concentrate) in a rod mill to -1mm and re-combine with the fines.
4. Two stage cyclone classification to remove the minus 75 micrometre fraction.
5. Gravity separate the +75 micrometre minus 1mm material using a spiral circuit.
6. Re-grind middlings to 0.3mm and re-circulate to cyclones and spirals.
7. Concentrates ground in ball mill to minus 0.3mm and sent to sulphide flotation.
8. Sulphide sinks go to tables for final clean-up.
9. Mids from tables go to GEC separator with concentrate sent back to sulphide flotation circuit.

Tabling of the 10-75 micrometre fraction recovered additional tin to a roughly 10% tin concentrate.

Aus Tin conducted a limited testwork programme to confirm Newmont's results and subsequently decided they could use the Newmont results for their PFS and assumed a tin recovery of 70% to a 55% Sn concentrate. They slightly modified Newmont's flowsheet as below:

1. Use a blend of 70% North Pit and 30% South Pit mineralisation.
2. Three stage crushing (jaw-cone-cone) to p80 of 9.5mm.
3. Screen at 1mm and send plus 1mm material to the DMS plant.
4. DMS sinks recombined with the fines and sent to primary grind rod mill for grinding to a p80 of 0.75mm.
5. Three stage cyclone classification with secondary underflow sent to spirals and tertiary underflow to slimes scavenging circuit.
6. Slime scavenging circuit is shaking tables treating 10-75 micrometre material.
7. Spirals are two stage with regrind to 300 micrometres.
8. Concentrates sent to sulphide flotation circuit.
9. Sulphide flotation sinks re-classified by cyclone and fine screens and either returned to re-grind or directed to dressing area.
10. Dressing by shaking tables and magnetic separation.

TMPL has undertaken work on four separate samples, with complete results from three returned to date.

Three samples were collected from the old Newmont adit in the North Pit area. A slot was blasted from the southern wall and collected and crushed to roughly 45mm on site followed by blending and splitting using a rotary splitter. The fourth sample was made by collecting core samples from the TMPL drilling programme.

The initial sample was called HG (High Grade) as it had an average grade (0.19% Sn) higher than the average mining grade of the deposit (0.13% Sn). This was used to examine various options for crushing and gravity concentration and the final flowsheet it went through is not considered to be optimal. It resulted in an average assumed recovery of 56% tin to a 56% Sn concentrate.

The crushing work was conducted in Perth by ALS Perth (conventional crushing), Gekko Systems (VSI crushing) and Koppern (HPGR crushing). Based on the various crushing tests, a combination of conventional three stage crushing followed by a single pass through a vertical shaft impact (VSI) crusher was decided as the go-forward option, as this provided the highest tin recovery to the lowest mass.

It was initially decided to use the minus 2.8mm fraction from the conventional crushing and the minus 1.4mm from the VSI. However, this was subsequently changed to the -2.8mm fraction from both crushing stages in order to simplify the screen circuit and obtain additional tin recovery.

The actual combination used for the initial testwork was the -2.8mm from the conventional crush and the minus 1.4mm from the VSI crush and the subsequent gravity testwork was conducted on this sample.

Thus, recovery will be understated. Using the combined sample, a coarse gravity recovery of 66% was estimated, with an additional 12% from a fine gravity circuit for total recovery of 78%. As a fine gravity circuit was the preferred option at the start of the testwork, the gravity circuit was not optimised toward the coarse gravity circuit and hence classification before the spirals was not undertaken but rather was used after the spirals.

On the recommendation of our metallurgical consultant Ron Goodman, it was subsequently decided to keep the circuit simple and to initially focus on the coarse gravity circuit only, keeping open the option to add a fine gravity circuit once the coarse circuit is operating smoothly.

Based on the sub-optimal results from the HG sample, a very conservative recovery formula that averages 54% total recovery (based on 56% recovery at a head grade of 0.19% Sn) was used for the initial pit optimisations:

- Recovery = 7.3662 x ln(head grade) + 68.393

Building on the results from the first sample (HG), a revised flowsheet was designed, and it was decided to put three additional samples through a testwork programme that closely reflects the actual design flowsheet. These samples are:

- LG: A low grade sample averaging 0.10% Sn collected from a low grade part of the original Newmont adit HG bulk sample.
- HG2: A moderate to high grade sample averaging 0.15% Sn taken from a sub-sample of the original Newmont adit HG bulk sample.
- VAR: This consisted of several samples of quarter HQ core designed to get an average sample close to the mined grade and composition and from throughout the deposit.

The LG sample was taken end to end through the proposed flowsheet and returned a recovery of 84% tin into 57% of the mass at the crushing stage and 72% recovery for the gravity separation stage for a combined recovery of 60%.

As expected, the VAR sample returned a poorer recovery during the crushing stage (76%) due to the crushing characteristics of quarter HQ core compared with a blasted and pre-crushed bulk sample. The crushing recovery is thus not considered to be valid and should be considered only as a qualitative pre-concentration result. The gravity recovery from this sample was shown to be 73%, very comparable to the LG sample gravity recovery, even though the circuit was modified slightly to examine different combinations of the main components.

Based on these results, a modified recovery formula was devised that averages around 59% Sn recovery based on the new result of 60% at a head grade of 0.10% Sn (which is below the average mined grade). This formula is:

- Recovery = 6.7472 x ln(head grade) + 72.896

While it was too late to incorporate this into the existing pit designs, it was used for the subsequent economic evaluations and is considered to still be conservative as the recovery at 0.10% Sn head grade using the formula would be 57% rather than the actual recovery of 60%.

The HG2 sample is currently being treated and only results of the crushing testwork have been received to date. These show that at a head grade of 0.15% Sn, 91% of the tin is recovered in 44% of the mass. If a similar recovery to the LG and VAR samples is obtained through the gravity circuit, this would result in a total recovery of around 65-66% Sn at a head grade of 0.15% Sn.

Once complete, it is expected that results from this sample will significantly improve the DFS results.

Process Plant

The process plant design for Taronga is based on a metallurgical flowsheet designed for optimum recovery with minimum operating costs. The flowsheet is based upon unit operations that are well proven in industry.

The key criteria for equipment selection are suitability for duty, reliability and ease of maintenance. The plant layout provides ease of access to all equipment for operating and maintenance requirements whilst maintaining a compact footprint that minimises construction costs.

A full set of process flow diagrams (flowsheets) and general arrangement drawings were created for the DFS. Detailed process design criteria, material & metal balances and a comprehensive mechanical equipment list were completed using data emanating from the testwork.

Figure 7 shows a 3D representation of the entire processing plant from the point of view of the ROM Ore Feed to the Jaw Crusher in an elevated position in the foreground. The tin concentrate plant is located on the lop left corner of the model.

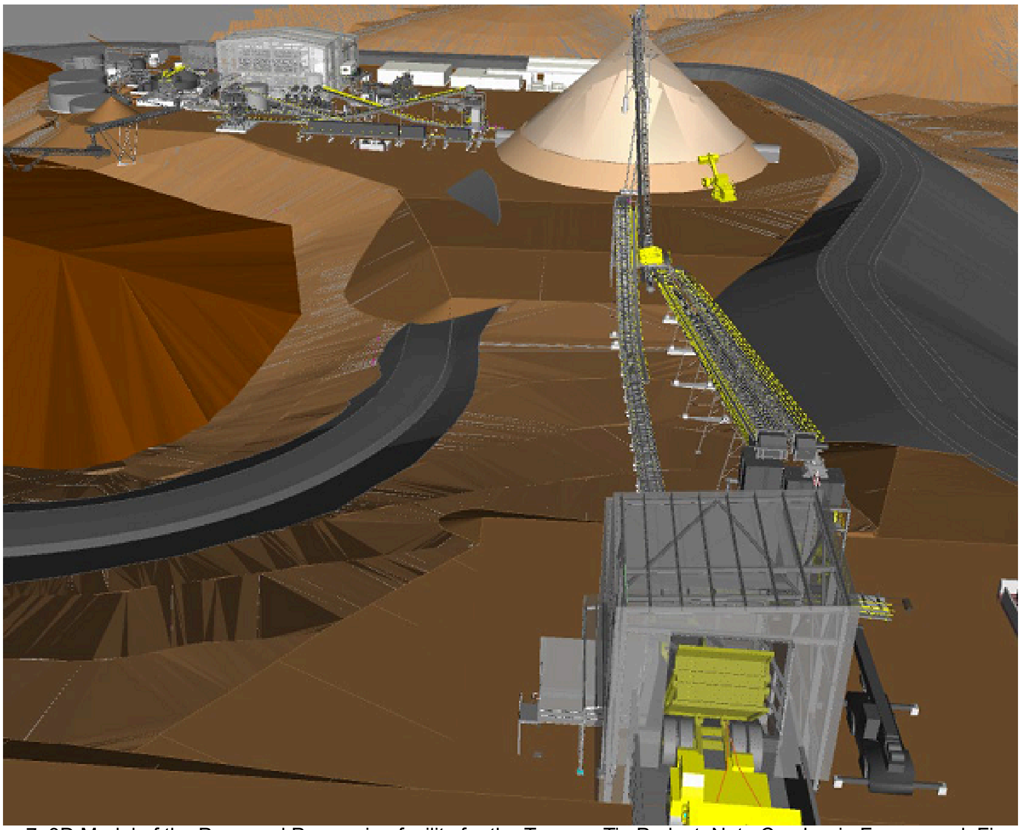

Figure 7: 3D Model of the Proposed Processing facility for the Taronga Tin Project, Note Crusher in Foreground, Fine Ore Stockpile in the Centre and Gravity Concentration plant in the background

A 3D model showing the proposed layout of the gravity concentration plant is shown on Figure 8.

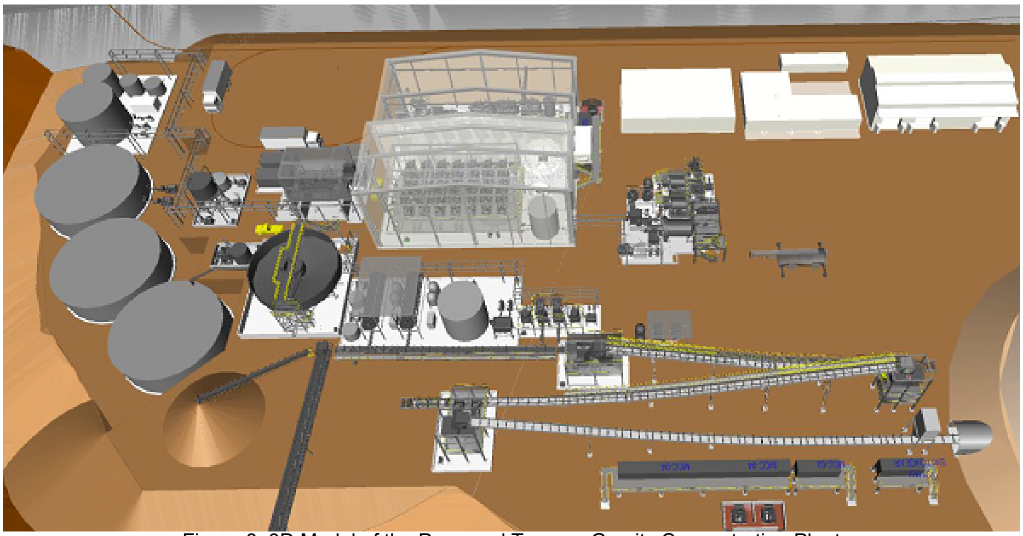

Figure 8: 3D Model of the Proposed Taronga Gravity Concentration Plant

The process uses a combination of four stage front end crushing (Jaw, Cone, Cone, VSI) to reduce the particle size from 800mm to 12mm. A jigging circuit sees a two-to-three-fold upgrade in cassiterite concentration. Additional simple processing brings a low-grade concentrate into something that is feasible to upgrade further to a saleable cassiterite concentrate using a mix of spirals and tables with regrind mills.

Based on the mass flows estimated by the HG sample testwork, the process flow sheet consists of:

1. Conventional three stage crushing (jaw-cone-cone) to 12mm with a capacity of 1,450 tonnes per hour (tph) operating for 10 hours per day during daylight hours. This will reduce nighttime noise and allow the use of solar power whenever it is available. As this is the highest power draw on site, this has the effect of lowering total operating costs.
2. Single pass VSI crushing and screening at 2.8mm with a capacity of 614 tph operating 24 hours per day. The plus 2.8mm oversize fraction (284 tph) is sent directly to the co-disposal site and the undersize (330 tph) is further screened at 0.4mm.
3. The plus 0.4mm fraction (198 tph) is sent to a jig circuit that returns 32.8 tph concentrate and 165.2 tph coarse tailings that are sent directly to the co-disposal site. The undersize is 132.1 tph.

4. The jig concentrate is screened at 0.4mm with the plus 0.4mm fraction (16.4 tph, maximum size 2.8mm) ground in a ball mill to 100% passing 0.4mm.
5. The ground material (16.4 tph) is re-combined with the undersize from the screen (16.4 tph) and the undersize from the jig feed screen (132.1 tph).
6. This combined fraction (164.9 tph) is classified using cyclones which removes 49.5 tph as minus 38 micrometre slimes (sent to tailings thickener) and 115.4 tph underflow (plus 38 micrometres) is sent to spirals.
7. This underflow is screened at 0.106mm with oversize (57.7 tph) sent to a coarse spiral circuit and undersize (57.7 tph) sent to a fine spiral circuit.
8. Tailings from both spiral circuits (159.8 tph) are sent to the tailings thickener to recover water.
9. Concentrate from the coarse spiral circuit (1.7 tph) is cleaned up by shaking tables and the concentrate (0.8 tph) is sent to the batch dressing circuit.
10. Middlings from the coarse spiral circuit (47.3 tph) are combined with tailings from the clean-up shaker tables (1.0 tph) and sent to the coarse spiral regrind circuit (48.4 tph).
11. This is screened at 106 micrometres, with oversize sent to the coarse spiral regrind mill, then returned to the deslime cyclone circuit and pre-spiral screen (point 7 above).
12. The spiral screen undersize is sent to a fine spiral circuit (116.3 tph).
13. Tailings from this circuit (84.2 tph) are sent to the tailings thickener.
14. Concentrate from the fine spiral circuit (10.7tph) is cleaned up by shaking tables and the concentrate (4.8 tph) is sent to the batch dressing circuit.
15. Middlings from the fine spiral circuit (7.0 tph) are combined with tailings from the clean-up shaker tables (5.9 tph) and sent to the fine spiral regrind circuit (12.9 tph).
16. This is classified at 38 micrometres, combined with tailings from the batch dressing circuit, and reground to minus 75 micrometres (13.4 tph).
17. The reground material is sent to the spiral cyclone classification and screening circuit.
18. Concentrates from the two spiral circuits are combined (5.6 tph) and sent to the batch dressing circuit.
19. Batch dressing consists of:
    a. Screening at 0.212mm (212 micrometres) with oversize (1.1tph) sent to the batch dressing regrind mill where it is ground to 0.105mm and returned to the screen.
    b. Undersize (5.6tph) is put through a LIMS (low intensity magnetic separator) to remove magnetic minerals (minor) and scrap from the processing circuit.
    c. The non-magnetics (5.6 tph) are sent to sulphide flotation to remove sulphides.
    d. This removes 3.9 tph of sulphides as floats which are sent to the sulphide tailings facility.
    e. The remaining concentrate sinks (1.7 tph) are cleaned up using the batch dressing shaker tables which produces a concentrate of 1.19 tph which is sent to the concentrate thickener, filtration and bagging facility.
    f. The 0.5 tph tailings and middlings are returned to the fines spiral regrind circuit and recirculated.

This is shown schematically in simplified format on Figure 9, and as a simplified process flow diagram line drawing on Figure 10.

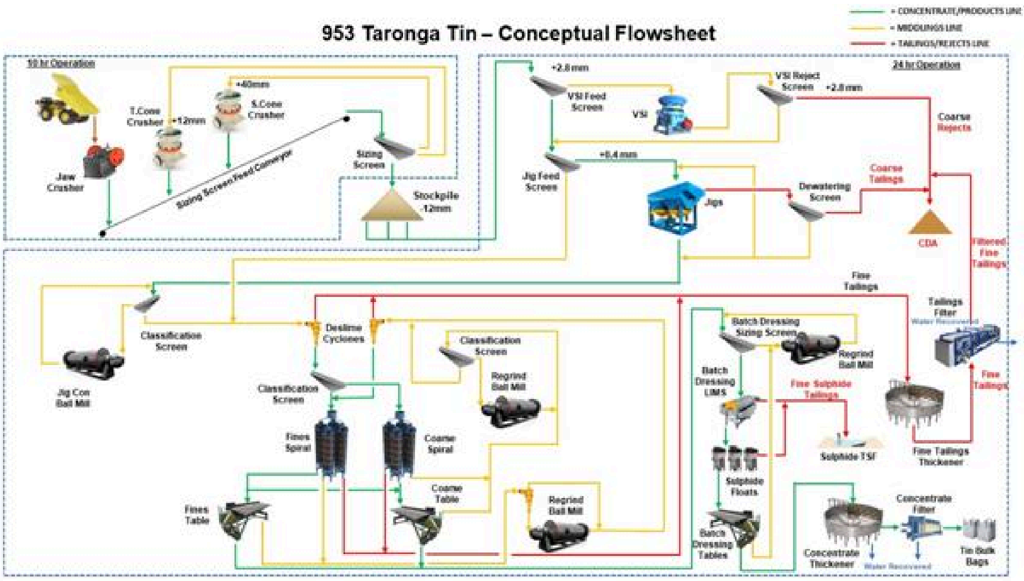

Figure 9: Taronga Tin Project - Simplified Flow Sheet

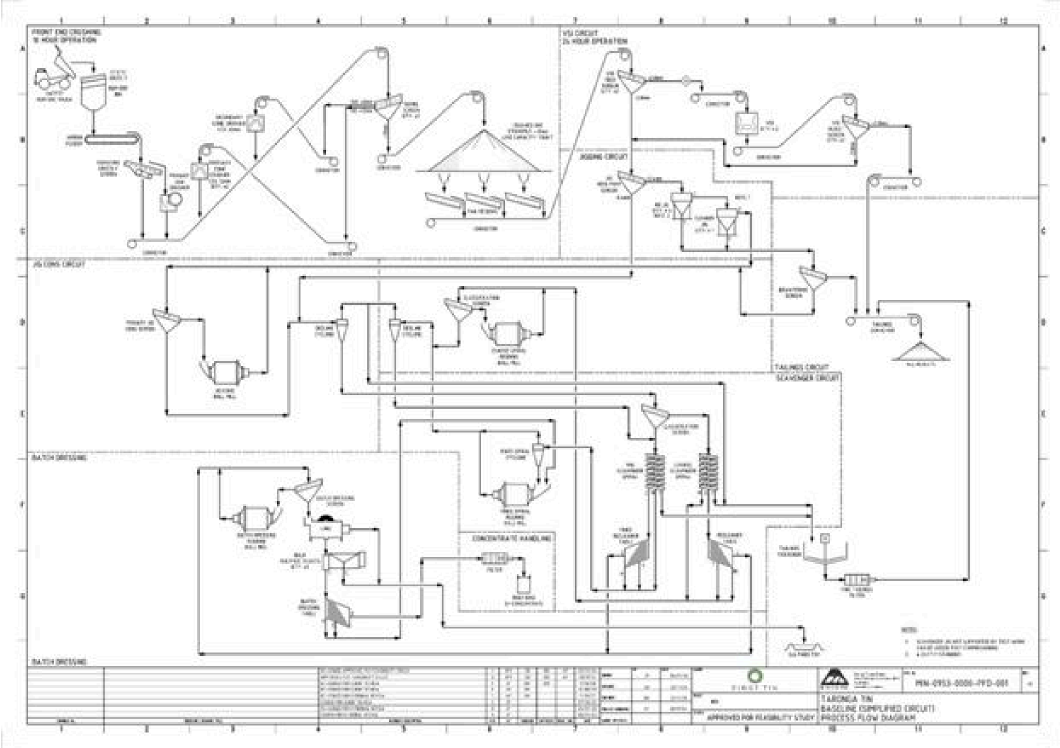

Figure 10: Taronga Tin Project - Baseline Simplified Process Flow Diagram

At a processing rate of 5Mtpa, the simplified mass flow can be represented as shown in Figure 11.

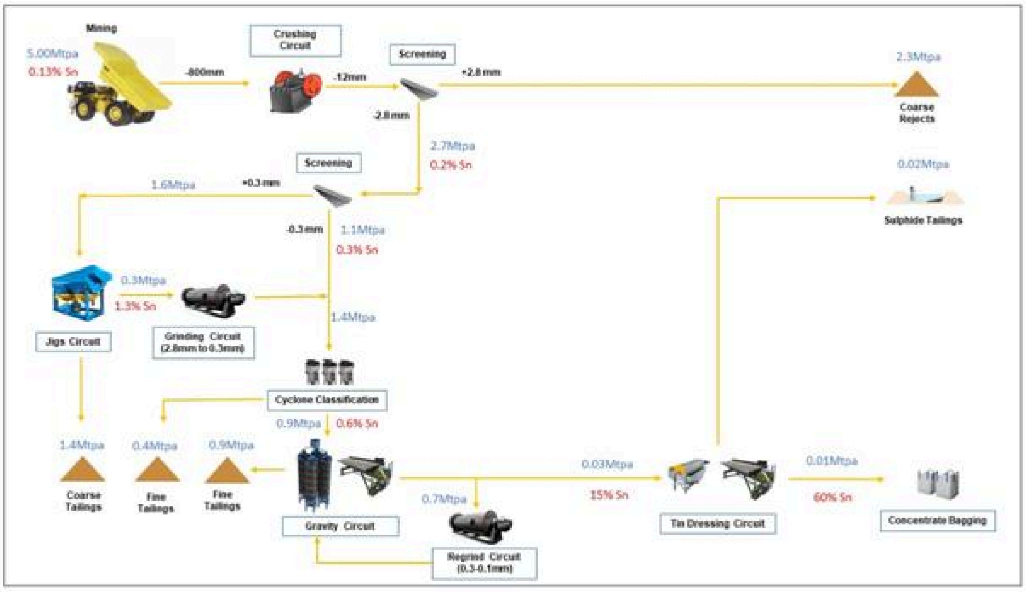

Figure 11: Simplified Mass Flow Diagram for the Taronga Tin Project

As noted above, the quartz veins containing the cassiterite have a lower rock strength than the host rock, which allows preferential breakage along the veins during crushing. The coarse nature of the cassiterite then allows rapid reduction in volume and increase in grade of the concentrate through the gravity separation and grinding processes, which makes the processing facility relatively inexpensive and operating costs low.

The total estimated capital cost for the processing facility is A$76.5M installed as shown in Table 3.

Item		**A$M**	**US$M**
Process Plant		***42.14***	***27.81***
	Concrete	3.99	
	Steel	2.75	
	Mechanical Bulks	5.63	
	Architectural	0.08	
	Mechanical Equipment	25.17	
	Piping and Valves	0.44	
	Electrical Equipment	3.01	
	Instrumentation / Control	1.07	
Process Plant Infrastructure		***13.36***	***8.82***
	Concrete	0.23	

	Steel	0.04	
	Mechanical Bulks	0.54	
	Architectural	0.02	
	Mechanical Equipment	1.09	
	Piping and Valves	0.23	
	Electrical Equipment	3.35	
	Raceway	1.69	
	Wire and Cable	3.35	
	Instrumentation Controls	2.81	
Process Plant Facilities		***3.45***	***2.28***
	Concrete	0.64	
	Architectural	1.07	
	Mechanical Equipment	1.73	
Mobile Equipment		***1.00***	***0.66***
Fresh Water Supply Dam		***0.08***	***0.05***
Freight Forwarding		***2.12***	***1.40***
Subcontractor Overheads		***14.39***	***9.50***
Total		**76.54**	**50.52**

Table 3: Estimated Capital Cost for Taronga Processing Plant

The basis for the estimate, excluding subcontractor costs, freight forwarding and freshwater dam, which are costed elsewhere, is shown in Table 4.

Category	Price	Percentage
P1 - Firm	A$39,795,231	66%
P2 - Budget	A$10,556,335	18%
P3 - Estimated	A$5,530,770	9%
P4 - Historical	A$1,112,513	2%
P5 - Allowance	A$2,949,157	5%

Table 4: Basis of Capital Cost estimation for Taronga Processing Plant

The estimated operating cost of A$5.28 per tonne treated has been derived from first principles including staffing, electricity draw, manufactures recommendations for wear and spare parts etc and is summarised in Table 5.

Item	**LOM Average Annual Cost (A$M)**	**LOM Average Cost/t Mill Feed (A$)**	**LOM Average Cost/t Mill Feed (US$)**	**%**
Labour	7.54	1.52	1.00	28.8
Power	5.70	1.15	0.76	21.7
Operating Consumables	4.66	0.94	0.62	17.8
Maintenance	2.04	0.41	0.27	7.8
Reagents	0.16	0.03	0.02	0.6
Analytical Services	0.93	0.19	0.13	3.6
Utilities and Support Services	6.97	1.40	0.91	19.8
Total	**26.21**	**5.28**	**3.48**	**100**

Table 5: Estimated Operating Cost for Taronga Processing Plant.

The breakdown of the proposed mill workforce is shown in Table 6.

Cost Centre	**Role**	**Number of Employees**	**Roster Type**
Process	Manager Processing	1	Day
	Metallurgy	4	Day
	Processing and Plant Operations	24	Day & Shift
	Laboratory	7	Day & Shift
Maintenance	Superintendent Plant Maintenance	1	Day
	Supervisor Mechanical	2	Day
	Maintenance Personnel	12	Day
Total		**51**	

Table 6: Taronga Processing Plant Workforce.

The total power draw for the processing facility is shown in Table 7.

Area	**Installed power (Duty kW)**	**Absorbed or consumed power (kW)**
ROM & Primary Crushing	337.0	281.6
Secondary & Tertiary Crushing	1359.5	1087.6
Screening	277.2	221.8
Ore Storage & Reclaim	54.7	43.8
VSI Crushing Circuit	1119.0	895.2

Jigging Circuit	268.5	214.8
Jig Concentrate Circuit	307.2	245.8
Scavenger Circuit, Spirals & Regrind	1172.7	938.4
Batch Dressing	99.0	79.3
Concentrate Handling	79.6	63.7
CDA Transport	60.0	48.0
Fine Tailings Thickener	132.0	105.6
Fine Tailings Filter	158.2	126.6
Sulphide Tailings Pipeline & Discharge	15.0	12.0
Water Systems (All items on PFD)	349.2	279.4
Compressed Air Systems	150.0	120.0
Reagents/Chemical Dosing	10.3	8.5
TOTAL	**5944.0**	**4756.1**

Table 7: Power Requirement for Taronga Processing Plant.

Power costs are estimated at A$0.127/kWh and are derived from a mix of solar power during the day firmed by gas powered generators for backup and during the evening.

As the majority of treatment is via gravity processes, the only reagents required are:

- Flocculent 19,402 kg/year
- PAX 1,313 kg/year
- $CuSO_4$ 8,013 kg/year
- MIBC 724 kg/year

The total cost for these is estimated at A$158,524 per year.

A forward work plan has been proposed for the next phase of development and includes the following:

- Finalising all testwork based on the current flowsheet and investigate additional areas to improve the recovery.
- Completing the Detailed Process Design

Tailings Storage Facilities

Tailings storage facilities have been designed by sub-consultants ATC Williams to conform with NSW state regulations.

Based on the provided Process Flow Diagrams (PFDs), four primary types of waste are generated from the process plant, as follows:

- Stream 1: VSI screen rejects (coarse rejects) - materials screened out after being processed by Vertical Shaft Impactor (VSI) crushers (2.31Mtpa).
- Stream 2: Combined JIG tailings (coarse tailings) - comprised of the dewatered tailings produced during the two phases of the jigging processes, specifically the initial rougher JIG process and the subsequent cleaner JIG process (1.35Mtpa).
- Stream 3: Filtered fine tailings (fine tailings) - a combined stream with multiple sources including primarily the fine particles from the slime cyclone overflows and the unrecoverable materials from scavenger spirals (1.30Mtpa).
- Stream 4: Fine sulphide tailings (fine sulphide tailings) - a by-product composed of non-magnetic materials that are separated out using a Low Intensity Magnetic Separator (LIMS) and the materials that are not recovered in the bulk sulphide flotation process (0.032Mtpa).

These four waste streams are highlighted in the PFD reproduced below in Figure 12. Streams 1 to 3 are to be co-disposed as a mixed material in a dry-stack landform named the Co-disposal Area (CDA), while Stream 4 will be stored in a sulphide wet tailings storage facility (TSF).

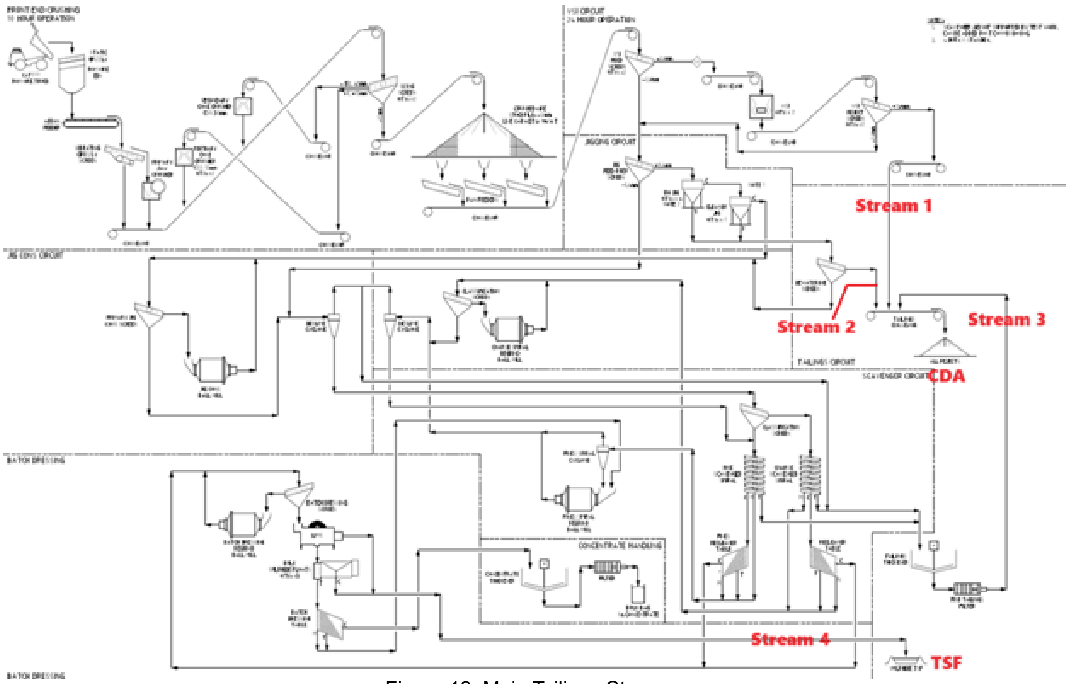

Figure 12: Main Tailings Streams

Based on the mass balance associated with the PFD, the Life of Mine (LOM) tailings and rejects quantities generated from the process plant are presented in Table 8, along with forecast as-delivered moisture content. The total combined tonnage for coarse rejects, coarse tailings, and filtered fine tailings (39.4 million tonnes) is specifically shown, on the basis that co-disposal of these streams will occur in the CDA, whereas the fine sulphide tailings (0.25 million tonnes) will be pumped to the Sulphide TSF.

Year	Co-disposal Area (CDA)			Sulphide TSF
	Coarse Rejects (tonnes)	**Coarse Tailings (tonnes)**	**Fine Tailings (tonnes)**	**Fine Sulphide Tailings (tonnes)**
0	97,479	56,763	54,907	1,340
1	1,741,835	1,014,280	981,125	23,945
2	2,350,394	1,368,647	1,323,909	32,311
3	2,298,917	1,338,671	1,294,913	31,603
4	2,280,129	1,327,731	1,284,331	31,345
5	2,341,716	1,363,593	1,319,021	32,191
6	2,282,637	1,329,192	1,285,744	31,379
7	2,335,415	1,359,924	1,315,472	32,105
8	1,961,304	1,142,078	1,104,746	26,962
9	664,315	386,834	374,189	9,132
LOM Total	**18,354,142**	**10,687,713**	**10,338,357**	**252,313**
LOM Total	**39,380,212**			**252,313**
Solids Content	**92%**	**90%**	**83%**	**34.5%**

Table 8: Taronga Process Plant Tailings and Rejects

The proposed locations of these two facilities are shown on Figure 13. The small sulphide TSF will be completely lined with HDPE. These sulphides could potentially be treated at a later time to recover copper and silver, which preferentially report to this stream. The CDA will only require lining of the downstream run-off dam wall.

The proposed waste rock emplacements have been designed by ATCW and are adjacent and to the north of the proposed pits. These are also shown on Figure 13.

All facilities have been designed to comply with all NSW regulations and to be able to withstand floods and seismic activity as required.

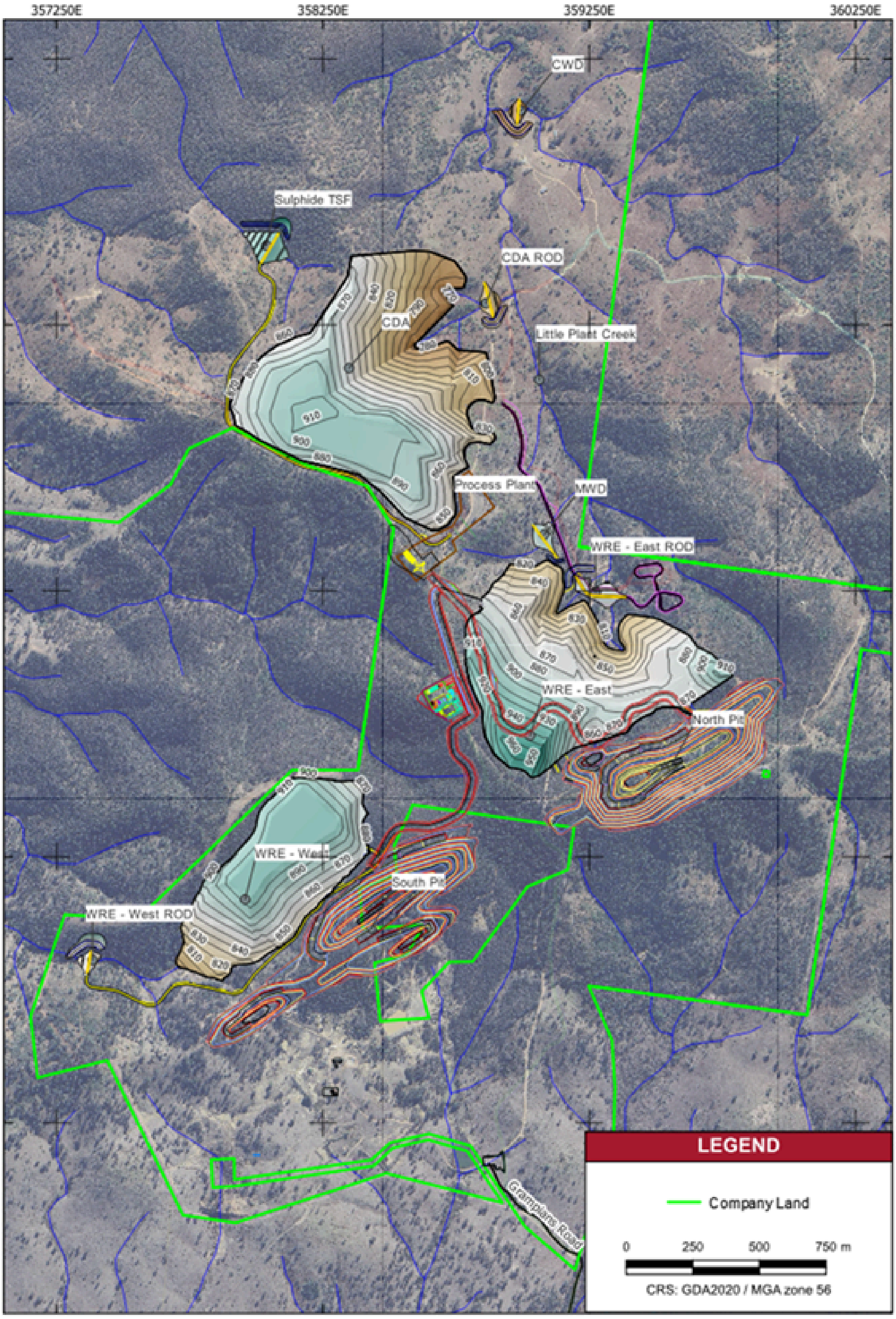

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Figure 13: Location of Tailings Facilities and Waste Rock Emplacements, Taronga Tin Project

Water and Sediment Management

Based on the proposed processing facility, it is estimated that a maximum water requirement of around 17 litres per second (l/s) will be required to service the processing facility and dust suppression requirements. TMPL intends to source this from both surface and underground aquifers and has purchased the right to 636 unit shares in the New England Murray Darling Fractured Rock Groundwater Sources. This allows extraction of approximately 636 megalitres (ML) per year from underground sources in the district.

Water may be obtained from four sources:

1. Southern "deep lead" aquifer located approximately 5km south of the processing facility. This consists of a palaeo-stream channel that has been covered by more recent basalt, preserving the original alluvial sediments. This has been mined for deep lead tin deposits in places and is known to contain a considerable water resource. An agreement to extract the water has been made with the landholder. Flows of at least 7 litres per second (l/s) have been located in water exploration bores.

2. Northern fractured rock aquifer which is located within TMPL's 100% owned freehold land and is immediately adjacent and to the north of the processing facility. Two water exploration bores have returned good flows, one at plus 7 l/s and one at plus 10 l/s. These will be enough to supply the full water requirements if they are shown to be sustainable.

3. Harvestable rights surface water. The company owned freehold land (~25km^2) allows collection of a certain amount of surface run-off, estimated to be around 180 ML per year. Surface dams will be constructed to make use of this allowance (e.g. see Figure 13).

4. Catchments from the WREs, CDA and TSF facilities. No water is proposed to be allowed to escape from these facilities and all water collected will be pumped to the processing storage facilities and possibly to an additional turkey's nest (facility with no catchment input) located on the TMPL freehold land.

Kinetic leach column testing of the various waste streams was undertaken between January 2023 and January 2024. While much of the material is non-acid forming (NAF), there is potential for leaching of some metals from the rock. Even though these metals are already present in surface water collected by the company, run-off into the local creek systems will need to be avoided. Hence a detailed water management plan will be required for pumping from the proposed pits, WREs, CDA and TSF during periods of rainfall.

Figure 14 shows the operational water management schematic.

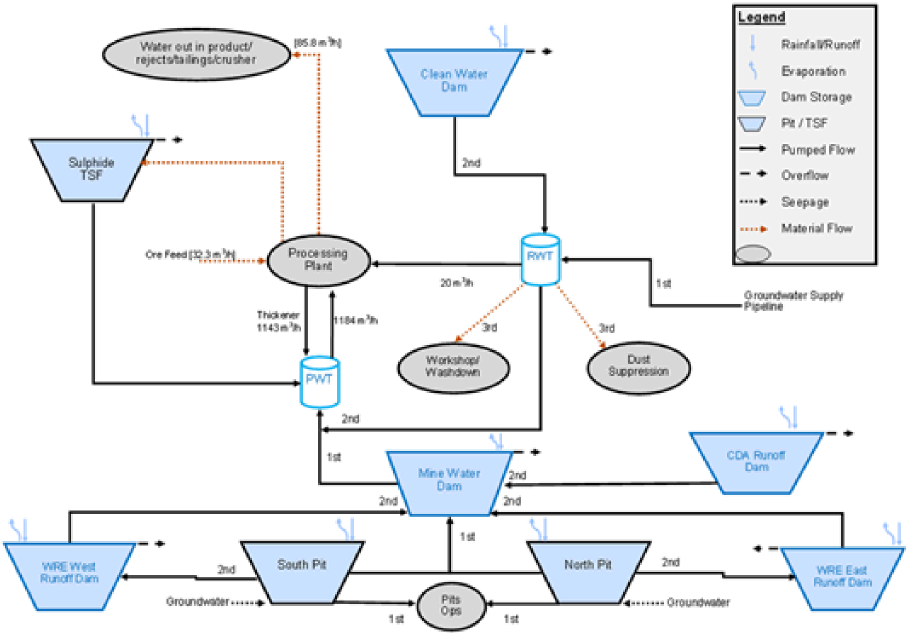

Figure 14: Proposed Water Management Schematic for the Taronga Tin Project

Design of the water storage facilities are shown in the Table 9 (MWD = mine water dam, TSF = tailings storage facility, CWD = clean water dam, CDA = co-disposal area, WRE = waste rock emplacement).

Parameter	MWD	Sulphide TSF	CWD	CDA Runoff Dam	WRE-E Runoff Dam	WRE-W Runoff Dam
Embankment crest level (mRL)	814.62	836.24	740.32	764.8	805.12	794.37
Upstream Batter Slope	1V:2.5H	1V:3.0H	1V:2.5H	1V:2.5H	1V:2.5H	1V:2.5H
Downstream Batter Slope	1V:2H	1V:2H	1V:2H	1V:2H	1V:2H	1V:2H
Spillway invert level (mRL)	812.88	834.54	738.5	763.3	803.62	792.87
Spillway base width (m)	10	10	25	20	20	20
Total Embankment length (m)	158	139	98	135	232.7	89.6
Maximum embankment level (mRL)	814.62	836.04	740.12	764.8	805.12	794.37
Minimum DS Embankment level (N.S.L)	790.9	801.55	727	747.6	786.1	776.07
Maximum embankment height (m)	23.72	34.49	13.12	17.2	19.02	18.3

Embankment crest width (m)	8	8	8	8	8	8
Bench Elevation (mRL)	800	823.4	731.4	756	796.48	785.6
Storage Area (at full supply level) (ha)	1.05	2.60	1.77	2.02	2.10	1.99
Embankment base width (at maximum embankment height) (m)	94	194	71.5	78	94.75	76
Storage Capacity (at spillway level) (ML)	50.5	203.5	59.7	92.9	85.7	85.3

Table 9: Water Storage Facilities for Taronga Tin Project

All facilities have been designed to comply with NSW government regulations.

Modelling has predicted average system inflows and outflows (averaged over the simulation period and all realizations) as shown in Figure 15.

The median model results indicate that runoff provides the highest system inflow (57%) of the total inflow given the high average rainfall for the region and large on-site catchments, followed by groundwater supply for the Process Plant (43%). The majority of outflows (63%) comprise the Process Plant demands, with spill from storages at 17% (predominantly from the CWD but also from the WRE runoff dams), followed by supply to operational demands (10%) (i.e. haul road dust suppression and workshop washdown etc.) and evaporation (10%).

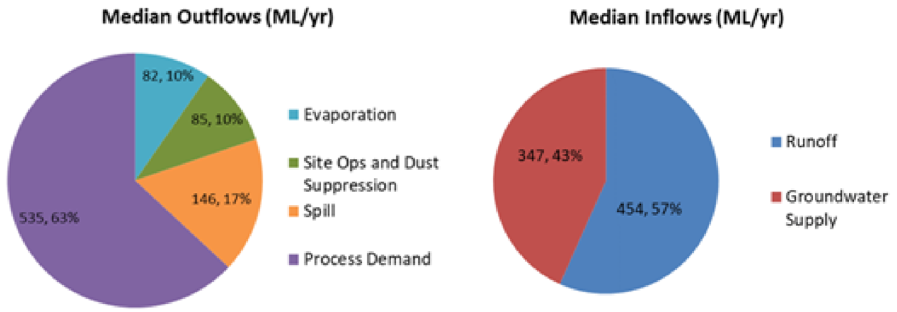

Figure 15: Taronga Modelled Water Inflows and Outflows

Infrastructure

The Taronga Tin mine site is located 7km NW of Emmaville in Northern New South Wales and 353km from Brisbane. The site is accessed by Grampians Road (Figure 16) which is to be upgraded and widened to allow light and medium weight vehicle access. A main site access road will be constructed from the end of Grampians Road to the new process plant. This will be suitable for goods delivery and product export. A secondary road to the north of the site will connect to Schroders Road for emergency access. In addition to the site access roads, service roads will be constructed to provide access to site facilities.

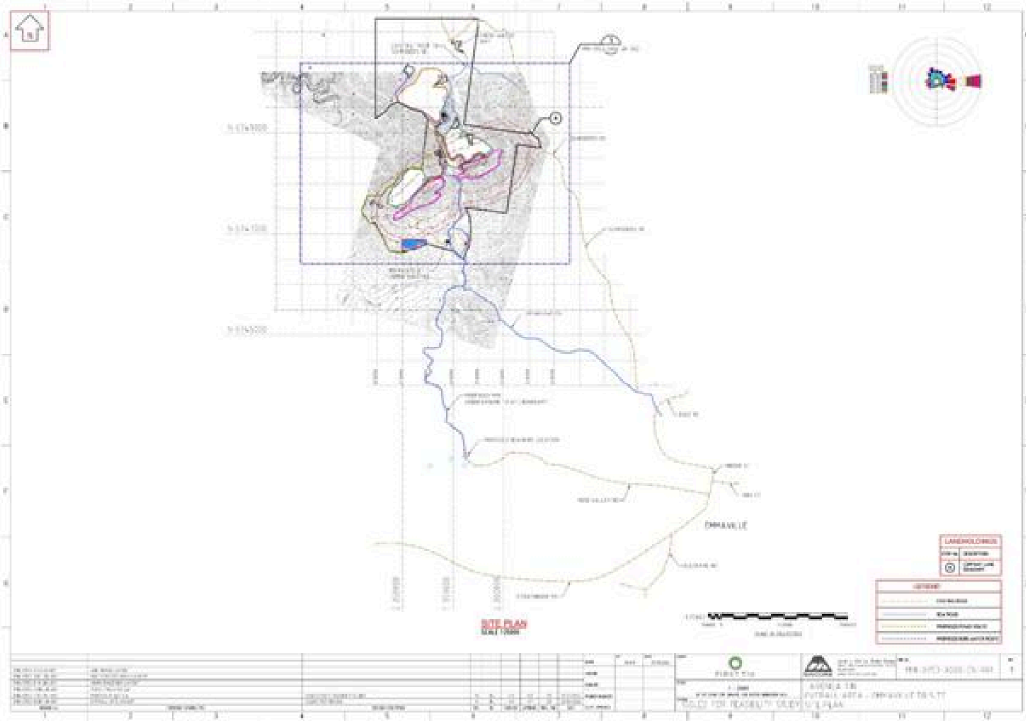

Figure 16: General Site Layout and Access Roads - Taronga Tin Project

All roads, bulk earthworks for infrastructure and non-processing facility platforms will be self-performed by TMPL.

A run of mine (ROM) pad for receipt and storage of mined materials will be constructed to the west of the processing plant and have a capacity of 29,500 tonnes. The majority of ore will be delivered to the jaw crusher feed hopper by direct tipping from CAT 777 trucks. The balance of ore required will be provided using front end loaders reclaiming from the ROM stockpile. The crushed and screened material is to be stockpiled and fed into the process plant at a rate of 614 t/h.

Infrastructure and non-processing buildings comprise the following (Figure 17):

- A Security gate house with visitor parking and an adjacent helipad will be built at the intersection of Grampians Road and the main site access road, on the Taronga Tin boundary.
- An administration office located opposite the gate house will provide for mine management administration and technical services. It will include crib and ablution facilities. A medical centre with undercover ambulance and fire services parking will be provided adjacent the administration office.
- A mine services area including heavy and light vehicle servicing, truck wash, refuelling and management offices will be located between the mine pits and the process plant. A secure stores warehouse will also be located on the mine services area hardstand.
- Process infrastructure facilities consisting of an office, complete with crib and ablutions, a laboratory, and an operational store with maintenance workshop.

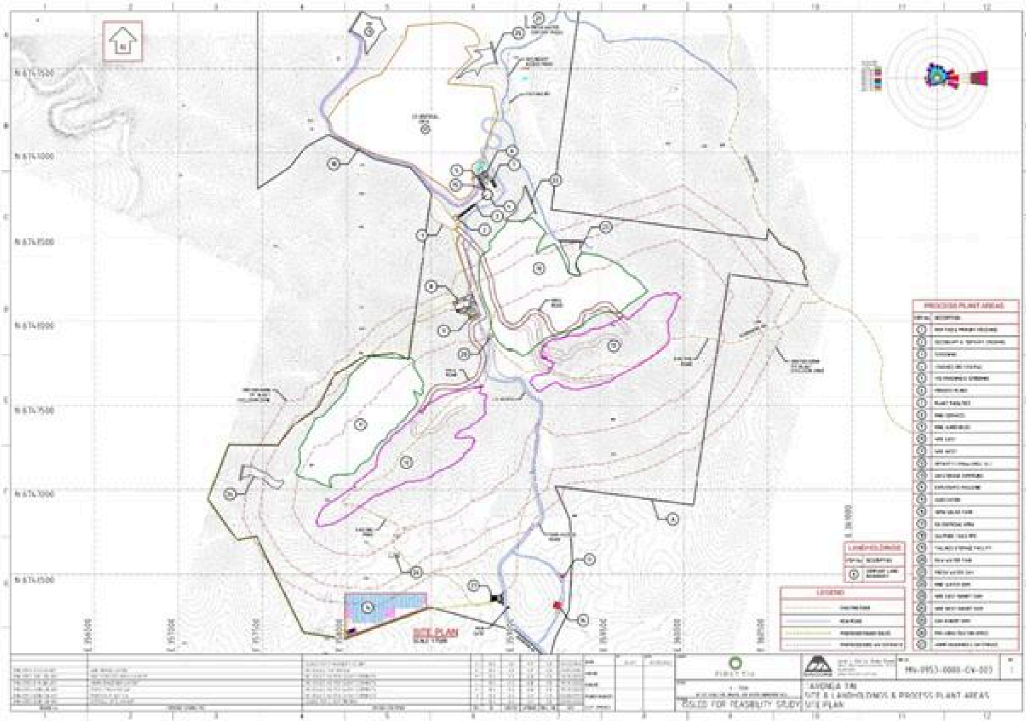

Figure 17 - Taronga Tin Project Site Layout

A photo-voltaic renewables power generation plant will be installed to provide renewable solar power for site facilities. This will be located to the west of the administration area and accessed by the site boundary fence service road. Gas generators and cryogenic storage facility will be provided for power back-up. An 11 kV overhead transmission line will follow the boundary fence around the west of the site to the process plant. This will have take-offs to feed the mine services area and the crushing and screening area. Appropriately sized pole mounted transformers and switchgear will be provided at each take-off, with distribution cables run on ladder rack to each user.

Site internet connection will be provided by Starlink with satellite dishes located on buildings as required to provide effective high-speed internet access. Telephone access will be VOIP protocol. Site communications will be by VHF digital radios, either handheld or mounted in TMPL mobile equipment.

A raw water facility of 79 m^3/h is proposed for process and non-process facilities. This will have two independent sources of supply. A bore field to the south of the site in a neighbouring property (or possibly located on TMPL's freehold land to the north of the plant site), and a clean water dam in the north of the site. A centrally located raw water tank installed at an elevation of approximately RL 935m will provide one megalitre of storage. The clean water dam will provide approximately 60 megalitres of storage.

Bore pumps will be connected to an 11kV power supply taken from the local grid if the southern Borefield is utilised, or by diesel generators if the northern bore field is utilised. The dam pump will be diesel powered.

Raw water will be distributed by gravity to the process plant with a take-off to the mine services area for fire water and truck washdown. A take-off at the crushing and screening area will provide spray water for the screens. The raw water line will terminate at the process water tanks, with take-offs for fire water, gland seal water and various other uses.

A containerised potable water treatment facility will be provided at the raw water tank. It will be self-contained and will distribute water by gravity to the administration building and the process plant, with a take-off at the mine services area.

Sewage treatment facilities will be provided at the administration, mine services and process offices. These will be automated and self-contained.

An 80-bed accommodation camp will be provided at Glen Innes for operational personnel requiring overnight accommodation. The camp will include messing, dining, and entertainment facilities. The camp will be connected to the local power grid and the local potable water and sewage systems.

It is proposed that the camp is constructed early so that it can assist in the accommodation of construction contractor's personnel. An existing farmhouse, located within the mine site boundary, will be upgraded, and made available for use as construction offices. There is sufficient space around the farmhouse for additional portable buildings if required. In addition, it is proposed to construct the administration office facility early for use by the owner's project team.

During the early stages of construction, the site will have few amenities available. It is proposed that contractors will be self-contained, providing all tools, consumables, power, transportation, and accommodation. A water supply will be provided for contractor use on site and this will be taken from the raw water dam. The dam will be constructed early by TMPL to allow time for it to fill.

The capital cost to supply and build the infrastructure and non-processing facilities, including temporary infrastructure and construction preliminaries is estimated to be $66,738,835. Table 10 provides a breakdown of the capital cost estimate.

AREA	PLANT EQUIPMENT	VENDOR REPS	BULK MATERIALS	FREIGHT	DIRECT LABOUR	SUBCONTRACTOR INDIRECTS	TOTAL
Mine Infrastructure	221,343	3000	1,693,277	7,219	390,328	141,550	**2,456,717**
Off Site Infrastructure	0	0	274,107	25,128	134,487	283,035	**716,757**
Site Preparation	0	0	58,500	0	0	1,365,876	**1,424,376**
On Site Infrastructure	1,891,751	63,569	1,317,162	28,854	3,008,165	0	**6,309,501**
Run-off Water & Sediment	211,507	0	1,027,010	7,250	408,477	1,381,713	**3,035,957**
Fresh Water Dam	301,499	0	435,711	4,382	501,453	230,649	**1,473,694**
Solar Power	15,443,493	0	103,895	0	0	0	**15,547,388**
Gas Generators	11,631,483	0	611,078	0	143,000	0	**12,385,561**
Non-process Bldgs	0	0	1,153,203	0	140,005	123,625	**1,416,833**
Mine Village	199,000	4,000	4,106,664	154,706	315,835	0	**4,780,205**
Warehouse & Laydown	0	0	258,809	0	36,380	31,250	**326,439**
Site Access Buildings	25,000	0	38,704	1,250	9,825	9,375	**84,154**
Emergency Response Buildings	0	0	187,786	0	33,040	17,200	**238,026**
Ancillary Buildings	0	0	27,110	800	4,185	1,125	**33,220**
Construction Support	0	0	0	2,116,650	0	0	**2,116,650**
Subcontractor Distributables	0	0	0	0	0	14,393,357	**14,393,357**
TOTAL	**29,925,076**	**70,569**	**11,293,016**	**2,346,239**	**5,125,180**	**17,978,755**	**66,738,835**

Table 10: Taronga Tin Project Capital Cost Estimate for Infrastructure and Non-processing Facilities

The power plant is the most expensive item at a combined installed cost of A$28M. This has been fully costed in a separate feasibility study and will consist of:

- 10MW solar farm
- 2MW BESS battery storage
- 8MW thermal gas engines
- 2MW standby diesel generator
- Microgrid controller

This will supply up to 10MW solar power during daylight hours at peak solar radiation firmed by 8MW gas generated power during times with no solar input. This will more than cover the peak demand of 5.3MW during the day and 2.6MW during the night.

Based on the average solar radiation and maximum power use being during the day (when crushing is active), it has been estimated that 53% of site power requirements will be generated by solar power and 47% by gas power at an average cost of S$0.125/kWh.

This will save around 14,780 tonnes per year of CO_2 emissions compared with grid power.

Operation and Business Support

The scope and scale of the business and operational support functions supporting TMPL's mining and processing operations include the following functions:

- Human Resources
- Occupational Health and Safety, including on-site medical and emergency response capability etc.
- Site Services Infrastructure and Facilities, e.g., accommodation & offices etc.
- Site Access and Security
- Supply - Purchasing, Logistics and Warehouse
- Information and Communications technology
- External Stakeholder Relations (state and national government/regulator focused)
- General and Business Management, including the General Manager Operation's office
- Commercial functions.

These functions form a substantial component of the operation's General and Administration (GA) costs i.e. those "costs not directly associated with mining and processing activities".

To establish many of the functional areas, TMPL has elected to engage senior experienced personnel from specialist third-party providers. They will provide a high level of expertise for a relatively short duration to develop and embed the required business systems, management plans, operating processes, and procedures.

The costs associated with establishing business management systems are part of the Owner's Costs (capital cost estimate). However, to maintain the integrity and relevance of these management plans, operating processes, and procedures, i.e., business systems and processes, these same external resources will be retained to provide oversight and review. The costs of this support are considered in the preparation of the operating costs.

Table 11 summarises the business and operations support costs.

Functional Area	Personnel Numbers	Operating Cost Per Year (A$)
Human Resources	1	359,852
OH&S	2	351,920
Site Services & Accommodation	0.5	4,045,980
Site Access & Security	2	195,147
Supply - Purchasing, Logistics and Warehousing	4	689,519
IT and Communications	-	476,781
General & Business Management	5	1,969,786
Total	**14.5**	**8,088,984**

Table 11: Business and Operational Support Costs.

Remuneration arrangements are consistent with the mining industry in New South Wales and in accordance with the relevant award(s) and National Employment Standards.

The midpoint salaries selected for a range of designations quoted in the Hays 2023/24 Salary Guide were the reference for the basic salaries to establish a Total Annual Cost of Employment for each role identified for Taronga.

Implementation

TMPL's project implementation strategy is built around the core principles embodied in the company's Mission, Values, and Vision.

TMPL's implementation model for Taronga is based on an Integrated Project Plan (IPP), which encompasses the Project Execution Plan (PEP), and the Operations Readiness Plan (ORP).

The focus of the PEP is the delivery of the project's physical components and managing its construction, including:

- Scoping, engineering, design, and construction of facilities
- Specification, procurement, delivery, and commissioning of equipment and facilities required for mining and processing operations.

The ORP is the program of work required to ensure that TMPL, as owner and operator of the project, is equipped to take delivery of the asset at handover and operate it in a way that is consistent with its business objectives and risk appetite.

The delivery of the project's physical components includes:

- The development and operation of open pit mines and their associated access and haul roads and waste rock emplacements (WREs).
- Construction and handover of a tin processing plant and its associated infrastructure and facilities.
- The design, engineering, construction, and handover of the co-disposal area (CDA), and small tailings storage facility (TSF).
- Construction and handover of infrastructure and non-processing facilities, including those onsite and off-site.
- The design and engineering for water and sedimentation management arrangements.
- The identification of the owner's direct and indirect costs.

Project execution will be a joint effort between TMPL, and an EPCM contractor for the processing plant and packages for the project's infrastructure and non-processing facilities. This execution (construction) strategy for Taronga is summarised below:

1. Processing plant and Infrastructure and Non-Processing Facilities. All this scope will be constructed under an EPCM model with the EPCM contractor reporting to the site general manager. The EPCM contractor will engage/provide the needed specialists with the experience to oversee the progress of this work competently and confidently to assess the contractor's adherence to their scope and agreed standards for design and construction, and the certification on progress claims for payment. The cost for these services is provided for in the EPCM quote.

2. Mining Mobile equipment and selected infrastructure will be managed by owner's team, or self-performed. The scope includes:

    a. the execution of the bulk of earthworks across the project using this mining equipment. This work includes access and haul road construction, clearing, grubbing, stockpiling of topsoil, construction of earthwork/pads for all facilities on-site establishment of water storages, etc.

    b. pre-production purchasing and commissioning of any relevant mining equipment will be managed by the owner's team.

TMPL's General Manager Construction will manage and coordinate all activities within the project scope with support from the EPCM Contractor in accordance with the project procedures. The EPCM Contractor will provide, as required in conjunction with TMPL:

- Engineering management services
- Procurement management services
- Construction management services
- The commissioning services performed for the processing plant and infrastructure and non-processing facilities, in conjunction with TMPL who will appoint a competent and qualified Commissioning Manager to manage all commissioning activities.

The Project is approximately 50 km northwest of Glen Innes, a population and services centre in the Northern Tableland / New England region of New South Wales (NSW). Glen Innes is serviced by two classified NSW State Roads, namely the New England and Gwydir Highways that provide interregional road transport linkages.

The Port of Brisbane is the preferred entry point for the Project. Road transport from this port to the Mine Site is expected to take approximately 5 hours for a heavy vehicle travelling via the New England Highway which connects with the Queensland State Road network and NHVR approved GML, CML, and HML routes to the Port of Brisbane.

The operating strategy developed and recommended for TMPL was determined from a workshop which assessed several alternatives. A hybrid model was selected by this process, where most of the functional areas and their personnel are based on site. Depending on the nature of the role, personnel are either housed in Glen Innes or the surrounding area or working on a long distance commute (LDC) roster basis. However, where required, the senior roles needed to support the establishment of business systems and processes are engaged on an off-site basis. This engagement may be either on fixed terms or by contract with specialist third parties.

The LDC arrangements will be a mix, of DIDO, BIBO, or FIFO, which depends on the nature of the role. Personnel associated with LDC arrangements would be accommodated in either a shared house or camp, depending on their role.

Work rosters for proposed site-based roles and their proposed distribution between residential and LDC arrangements are shown in Table 12.

Operating Cost Centre	Management and Technical Roles	Support Roles	Operation / Maintenance - no shift work	Operation / Maintenance - shift work
Residential				
Mining	5:2 (10 hr)	5:2 (8 hr)	7/7	7/7
Processing	5:2 (10 hr)	5:2 (8 hr)	7/7	7/7
G&A	5:2 (10 hr)	5:2 (8 hr)	5:2 (10 hr)	N/A
LDC				
Mining	8/6	8/6	7/7	7/7
Processing	8/6	8/6	7/7	7/7
G&A	8/6	8/6	N/A	N/A
Residential: staff or contractors living within Glen Innes Severn Council area LDC: staff e.g. FIFO / BIBO / DIDO, requiring accommodation provided by TMPL in Glen Innes Shifts 12 hours unless stated otherwise				

Table 12: Proposed Work Rosters for Taronga Tin Project

For all roles engaged at Taronga, a maximum 14-hour workday regime; 12-hour shifts, and 1-hour travel on either side is applied. This implies all residentially engaged personnel are within 1 hour's travel of the site and those who are based further away are on LDC arrangements. These LDCs are anchored to an accommodation camp provided by TMPL in the Glen Innes area.

Operational readiness, including its organisational component, is a term used to describe the work required to ensure the owner or operator for a project or asset under construction is equipped to take delivery of the asset at handover from the construction phase. Implicit in this definition is that, as the operator, they can accept responsibility for the asset and operate it in a way that is consistent with their business needs and chosen risk appetite.

Operational readiness provides the TMPL operational departments with effective preparation to be ready to safely operate the Taronga Tin operation as a business at the handover of the Taronga Tin

Project by the project's construction team. Operational readiness touches every department. However, the scope and scale of this work will vary across departments. The focus for operational readiness work is on the non-physical aspects of the Project, which are the responsibility of the incoming operations team. This entails a significant technical workload before the start of operations, particularly for "Greenfields" where many systems and processes are being built from scratch.

The General Manager Operations is responsible for managing the compilation of the mine's ORP and the coordination between operations managers to ensure the effective delivery of ORP outcomes and objectives. Once the General Manager Operations focus moves beyond the initial objective of the recruitment of the operations leadership team, this team:

- Drives the evolution of the operational aspect of the business management framework and supports recruitment of leaders with their teams; and
- Has responsibility for the establishment of the business systems, management plans, and operating procedures they require to conduct operations at Taronga.

The process for the development and implementation of the ORP requires a staged approach that involves a gradual requirement for personnel. This occurs against the background of the construction and delivery of the project's physical assets and the scheduled start of wet commissioning. The foundation to this work is the capacity of TMPL to recruit a leadership team for the operation:

- With the experience and capacity to contribute to building out the business management systems, their management plans and procedures needed for the operations phase,
- In a timeframe that allows enough of this work to be completed to allow TMPL to commence operations in a way that is consistent with its risk appetite.

Owner's costs are a component of the project capital costs and are shown in Table 13.

Description	**Cost (A$)**
Project Management (TMPL Team)	2,322,560
Detailed Design	1,390,000
Operating and Establishment of TMPL Operations Team	8,599,141
First Fill and Critical Spares	1,784,956
Permitting & Statutory Approvals	998,065
EPCM Engineering	7,887,900
EPCM	4,221,800
EPCM Site Office Expenses	1,451,340
Total	**28,655,761**

Table 13: Taronga Tin Project Owner's and EPCM Costs

The forward work plan for the areas of this DFS covered under Implementation relates primarily to:

- Further work directed at reducing project uncertainties and risk
- Opportunities to improve or enhance the project's value.

The actions identified for consideration as part of the project's forward work program include:

1. Early commencement of detailed engineering so that purchasing of major equipment can occur as soon as funding is available. The long lead-time items for the project are time frames beyond 12 months:
    a. Behind the Meter Power Supply - 10MW Solar Farm with Gas Engines.
    b. For the processing plant, equipment for:
        i. Crushing Plant
        ii. Product Bagging
        iii. CD Tanks
2. A risk identified for the project construction phase is the potential for competition for access to the available accommodation for construction workers required in the area surrounding the project. To better understand and manage this risk, further study is required of the available accommodation and the options available to TMPL and its contractors to secure appropriate accommodation during the construction period.
3. To equip the Taronga Tin operation with the best possible chance of achieving its projected ramp-up performance, timely and effective preparation and completion of operational readiness works are expected to be important. An important aspect of this task is TMPL's ability to attract suitably experienced staff who are capable of contributing to or supporting the establishment of these systems. To support TMPL, early engagement with a recruitment specialist to survey the employment market for key roles is required along with development of a plan to attract staff to these positions.

Legals, Permits and Approvals

UK based and London Stock Exchange (Standard Board) listed First Tin Plc (First Tin) owns the Taronga Tin Project through its 100% owned Australian unlisted public company subsidiary First Tin Australia Pty Ltd which holds 100% of Australian unlisted company Taronga Mines Pty Ltd (TMPL), in whose name the project is held. The mineral rights for the project are held by TMPL.

Australia is a safe and reliable trading and investment partner and has solidified its position as the world's 12th largest economy. Australia is a representative democracy where voters elect candidates to carry out the business of government on their behalf.

The Australian Constitution of 1901 established a federal system of government, based on the British (Westminster) tradition of government. Powers are distributed between a national government (the Commonwealth) and the six states (New South Wales, Queensland, South Australia, Tasmania, Victoria and Western Australia). The Australian Capital Territory and the Northern Territory have self-government arrangements.

A range of Commonwealth and State legislation and policies will apply to the Project. These various legislative instruments relate to Project approval (development consent), the management of environmental impacts, access to natural resources and rehabilitation.

TMPL's licence to operate the Project is maintained by its establishment and compliance with process and management plans required by but not limited to the relevant Federal and NSW legislation and regulations.

Prior to determination of the Development Approval by NSW authorities, the consent authority must consider and assess the Project against a range of NSW State Environmental Planning Policies (SEPP). Most of these SEPPs arose from a simplification program that commenced in 2021 to consolidate 45 SEPPs into 11. A summary of the relevant SEPPs is provided here.

The Project is situated within the Glen Innes Severn Council Local Government Area (GISC LGA). The consent authority for any development within the GISC LGA must consider the local planning provisions that are provided in the Glen Innes Severn Local Environmental Plan 2012 (Glen Innes Severn LEP). A summary of the relevant provisions is provided below.

All Mining Lease(s) issued under the Mining Act contain standard conditions that require the establishment of clear, achievable, measurable and enforceable targets for rehabilitation and reporting. These conditions require, where practicable, the adoption of progressive rehabilitation throughout the Mine-life.

As the Project requires an Environmental Protection Licence, it would be considered a "large mine" under the Mining Regulation 2016. Therefore, the standard ML conditions will require that, prior to the commencement of mining operations, TMPL prepare and/or implement the following in the approved format:

- A rehabilitation risk assessment that identifies and evaluates the potential risks to achieving the final land use.
- Appropriate measures to eliminate, minimise or mitigate identified rehabilitation risks.
- A publicly available Rehabilitation Management Plan that documents rehabilitation risks and identifies the approach to meet rehabilitation objectives.
- The "rehabilitation outcome documents" that must be submitted for approval by the Secretary of the Department of Regional NSW are covered in this chapter.

An environmental Impact Statement (EIS) must present and assess all stages of Project development, including the site establishment and construction stage. Provided development consent is granted, the Project would therefore not require any separate approvals prior to construction although certain Environmental Management Plans would likely be required.

The Work Health and Safety (Mines and Petroleum Sites) Act 2013 and Work Health and Safety (Mines and Petroleum Sites) Regulation 2022 applies to all mines and petroleum sites in NSW. These laws provide provisions for work health and safety issues unique to mines and petroleum sites.

TMPL's licence to operate the Project is maintained by its establishment and compliance with process and management plans required by but not limited to the legislation and regulation identified by the feasibility study.

TMPL has established a register of approval and permits for the project as a working document to record and track the status of the various approvals and permits required for the establishment and operation of the Project.

TMPL currently hold the mineral rights listed in Table 14.

Tenement	Grant/Application Date	Expiry Date	Area	Security	Annual Rental Fee	Annual Administrative Levy
EL7800	4/7/2011	04/07/2025	36 Units	$10,000	$2,160	$100
EL7801	4/7/2011	4/7/2024	4 Units	$10,000	$240	$100
EL8335	5/1/2015	5/1/2027	56 Units	$10,000	$3,360	$100

EL8407	4/11/2015	4/11/2028	17 Units	$10,000	$1,020	$100
EL9200	21/06/2021	21/06/2027	74 Units	$10,000	$4,400	$100
ML1774	21/9/2018	21/12/2029	76.5 ha	$26,500	$497.25	$265
MLA624	19/12/2023		713.3 ha			

Table 14: Mineral Rights held by TMPL

MLA 624 is an application covering the entirety of ML1774 and part of EL8407. This covers all of the Taronga tin mineralisation and proposed infrastructure apart from some external access road, pipeline and power transmission line corridors.

The licences are shown on Figure 18.

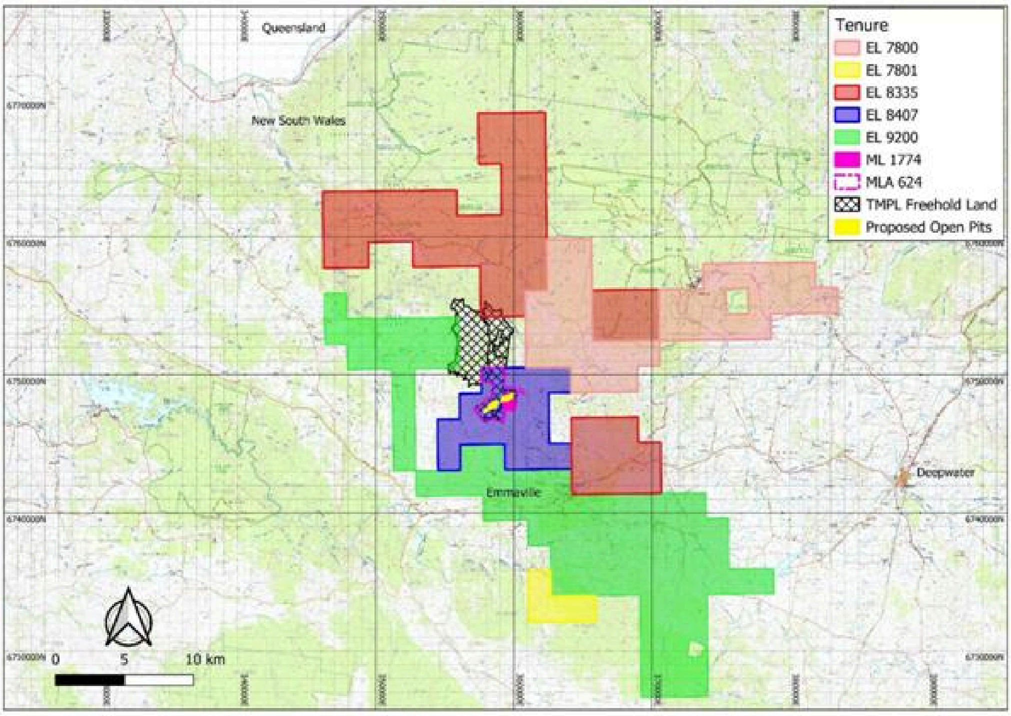

Figure 18: TMPL Licences

As noted above, a range of Commonwealth and State legislation and policies will apply to the Project. These various legislative instruments relate to Project approval (development consent), the management of environmental impacts, access to natural resources and rehabilitation. To undertake a comprehensive assessment of the Project, it is necessary to place appropriate emphasis on those issues associated with the Project that are likely to be of greatest significance. To ensure this has occurred, a review of relevant legislation has been undertaken to identify relevant Project-related matters and potential impacts.

The following Commonwealth Legislation will apply:

- **Native Title Act 1993 (NT Act):** No claims currently exist over the proposed mine area.
- **Environment Protection and Biodiversity Conservation Act 1999 (EPBC Act):** The EPBC Act covers 'matters of national environmental significance' (MNES). Potentially relevant MNES to the Project include:
    - listed threatened species and ecological communities;
    - listed migratory species protected under international agreements; and
    - National heritage places.

  Under the EPBC Act, if a project has the potential to have a significant impact on MNES, it is required to be referred to the Commonwealth Department of Climate Change, Energy, the Environment and Water for assessment as to whether it represents a 'controlled action', thus requiring approval from the Federal Minister for the Environment. Ecological surveys completed to date indicate the presence of six threatened species (Velvet Wattle, Brown Treecreeper, Diamond Firetail, Hooded Robin, Koala and the Border Thick-tailed Gecko) listed under the EPBC Act that may potentially be impacted by the Project. Therefore, the Project may require approval under the EPBC Act and a referral will be made to the Commonwealth Department of Climate Change, Energy, the Environment and Water to establish whether it represents a controlled action. No red flags have been identified to date.

The following State Legislation will apply:

- **Environmental Planning and Assessment Act 1979 (EP&A Act):** The EP&A Act provides the framework for the assessment and determination of development applications in NSW and is administered by the (NSW) Department of Planning Housing and Infrastructure (DPHI). The

EP&A Act aims to protect and conserve the environment through ecologically sustainable development. This is achieved through managing development to conserve resources, including agricultural land, natural areas, forests, minerals, water, and towns with the purpose of promoting social and economic welfare of the community and an enhanced environment. The Project is considered State Significant Development (SSD) as the estimated $176M capital investment value exceeds the $30M threshold identified in Schedule 1, Clause 5(1c) of the State Environmental Planning Policy (Planning Systems) 2021 (Planning Systems SEPP).

The EP&A Act sets out the process for the assessment of SSD applications with an Environmental Impact Statement (EIS) being a mandatory requirement. The Project's EIS must also comply with the requirements of Division 5 of the Environmental Planning & Assessment Regulation 2021 (EP&A Regulation) and address Project specific Secretary's Environmental Assessment Requirements (SEARs) issued by DPHI and relevant NSW Government Agencies. Section 4.41 of the EP&A Act identifies that if development consent is granted for a SSD, the following potentially relevant authorisations under other legislation are not required.

- A permit under section 201, 205 or 219 of the Fisheries Management Act 1994.
- An approval under Part 4, or an excavation permit under section 139, of the Heritage Act 1977.
- An Aboriginal heritage impact permit under section 90 of the National Parks and Wildlife Act 1974.
- A bush fire safety authority under section 100B of the Rural Fires Act 1997.
- A water use approval under section 89, a water management work approval under section 90 or an activity approval (other than an aquifer interference approval) under section 91 of the Water Management Act 2000.

In addition, Section 4.42 of the EP&A Act stipulates that, despite being required, the following authorisations cannot be refused and must be issued (with or without conditions as determined by the relevant authority) for approved SSD:

- a mining lease under the Mining Act 1992;
- an environment protection licence issued under Chapter 3 of the Protection of the Environment Operations Act 1997; and
- a consent under section 138 of the Roads Act 1993 (Roads Act).

The Project will require development consent and approval under Part 4, Division 4.7 of the EP&A Act. The consent authority for the Project will be the Minister for Planning and Public Spaces. In practice, it is understood that the Minister delegates their authority to determine such applications to a senior officer of DPHI. Alternatively, under Section 2.7 of the Planning Systems SEPP, the Independent Planning Commission would be the consent authority should one or more of the following criteria be met.

- Glen Innes Severn Council provides a submission objecting to the Project.
- There are more than 50 submissions objecting to the Project.
- TMPL has made a reportable political donation.

- **Mining Act 1992 (Mining Act):** In NSW, the ownership of most mineral resources is vested in the State and managed under the Mining Act 1992 (Mining Act) which provides the legislative framework for mineral exploration and any subsequent development, operation, rehabilitation and closure of mines. The Mining Act is administered by an agency of the Department of Regional NSW, namely the Division of Mining, Exploration and Geoscience (MEG). Under Part 3 and Part 5 (respectively) of the Mining Act, MEG issues Exploration Licences (EL) and/or Mining Leases (ML) that provide the holder with lawful access to the State's mineral resources. These licences and leases also include a range of enforceable conditions that are administered by the NSW Resource Regulator, and which relate to the environmental performance, reporting and rehabilitation of the respective tenure. Section 282 of the Mining Act also requires the holder of an ML to pay royalty to the State for any publicly owned minerals recovered by the leaseholder. The royalty rate is specified in Schedule 6 of the Mining Regulation 2016 and is currently 4%. Under Section 4.42 of the EP&A Act, MLA 642 cannot be refused if the Project is granted development consent.

- **Protection of the Environment Operations Act 1997 (POEO Act):** The POEO Act provides the environmental protection framework for regulation and reduction of pollution and waste in NSW as well as for monitoring of environmental quality. The POEO Act is administered by the NSW

Environment Protection Authority (EPA), the primary environmental regulator in NSW. The EPA issues environmental protection licences (EPLs) under Chapter 3 of the POEO Act for activities that are scheduled under the POEO Act. The POEO Act also requires immediate reporting of pollution incidents, which cause or threaten to cause material harm to the environment.

As the Project would disturb more than 4 hectares of land for the purpose of mining for minerals, it would require an EPL. Under Section 4.42 of the EP&A Act, this EPL cannot be refused if development consent is granted.

- **Biodiversity Conservation Act 2016 (BC Act):** The BC Act's purpose is to maintain a healthy, productive and resilient environment for the greatest well-being of the community, now and into the future, consistent with the principles of ecologically sustainable development. The BC Act is administered by the Biodiversity, Conservation and Science Group within the Department of Climate Change, Energy, the Environment and Water (DCCEEW). As the Project is SSD, it is required to consider biodiversity impacts in accordance with the Biodiversity Offset Scheme of the BC Act. Under this scheme, the Project's development application must identify how biodiversity impacts are either avoided or minimised. However, where biodiversity impacts are unavoidable, the BC Act allows for their "offset" via the purchase and/or retirement of biodiversity credits or payment into the Biodiversity Conservation Fund.

  The BC Act also contains provisions for landholders to establish Biodiversity Stewardship Agreements on their land to generate biodiversity offset credits. These credits may then be used to retire the landholders' credit obligations and/or sell the credits to other developers.

  TMPL has commissioned a Biodiversity Development Assessment Report (BDAR) to identify the Project's potential impacts on biodiversity and its biodiversity credit obligations. These obligations will be established via detailed field surveys undertaken in accordance with the approved Biodiversity Assessment Method and documented in the BDAR that, under the BC Act, must be submitted with the EIS. TMPL is investigating the potential establishment of a Biodiversity Stewardship Agreement whereby sections of Company-owned land, beyond MLA 642, are set aside to generate biodiversity offset credits that would be used to meet the Project's credit obligations, either wholly or in part. Following the grant of development consent, the Biodiversity Offset Strategy must be finalised and offset credits secured prior to the clearing of native vegetation.

- **Water Management Act 2000 (WM Act):** The WM Act requires that all extraction of surface water or groundwater must be accounted for under the rules of any relevant water sharing plans. The following plans apply to the Project.

  - Water Sharing Plan for the NSW Border Rivers Unregulated River Water Sources.
  - Water Sharing Plan for the NSW Murray Darling Basin Fractured Rock Groundwater Sources.

  Water Sharing Plans specify the rules and limitations on water use in the region that is the subject of the plan and provide for equitable distribution of water in accordance with the limits of the setting. The use (or 'take') of water under a Water Sharing Plan must be approved and the volume (or 'share) of that use limited through a water access licence. TMPL holds water access licence (WAL 44962) entitling it to 636 unit shares in the New South Wales Murray Darling Fractured Rock Groundwater Sources. The volumetric entitlement of WAL 44962 would be utilised to meet Project-related water demands via a production borefield that would be located south or north of MLA 642. This borefield is currently under investigation via a program of test bore drilling, installation and testing.

  It is noted that water capture, storage and use may also be exempt from WM Act licencing and approvals under Section 53 (harvestable rights) or where water management infrastructure that is considered "excluded works" under the Water Management (General) Regulation 2018 with TMPL intending to:

  - exercise its harvestable rights in relation to the construction of some dams for the collection and use of surface runoff.
  - construct and operate "excluded works" as part of its mine water management system.

  The Aquifer Interference Policy (AIP) establishes the water licensing and assessment processes for aquifer interference activities under the WM Act which defines an aquifer interference activity as that which involves the:

  - penetration of an aquifer;

- interference with water in an aquifer;
- obstruction of the flow of water in an aquifer;
- taking of water from an aquifer in the course of carrying out mining or any other activity prescribed by the regulations; or
- disposal of water taken from an aquifer in the course of carrying out mining or any other activity prescribed by the regulations.

The AIP defines an agreed set of 'minimal impact' considerations, such as water table levels, water pressure and water quality in particular aquifer categories. These minimal impact considerations must be assessed against the potential for harm to occur to an aquifer and its dependent ecosystems, culturally significant sites, connected surface water sources and existing water users. The Project may involve aquifer interference activities through the development of open cut pits and will be assessed against the AIP.

Section 4.41 of the EP&A Act specifies that approvals under Sections 89, 90 and 91 (controlled activity) of the WM Act are not required for SSD and, as such, these approvals will not be sought in relation to the Project. However, the Project would require a WM Act Section 91 (aquifer interference) approval when the relevant provisions of the WM Act commence.

- **Roads Act 1993 (Roads Act):** The Roads Act applies to all public roads in New South Wales, and depending upon the road classification, is administered by either Transport for NSW (TfNSW) or the Local Government which, in this instance is Glen Innes Severn Council (GISC). Under Section 138 of the Roads Act, all works or structures that disturb the surface of a public road or connect a road to a classified road requires consent from the relevant roads authority. The Project will require various intersection works, road upgrades and improvements to Local and Regional Roads, with GISC being the issuing authority for the required Roads Act consents. Under Section 4.42 of the EP&A Act, Roads Acts consents cannot be refused if the works are necessary for carrying out an approved project.

- **Explosives Act 2003 (Explosives Act):** The Explosives Act requires a person to hold a licence to handle, transport, store or use explosives and explosive precursors. A Dangerous Goods Licence will also be required for the storage of explosives under the Explosives Act and the bulk storage of Class 3 Combustible Liquid (diesel). TMPL will comply with all requirements of the Explosives Act.

- **Other Legislation:** The following New South Wales legislation (presented alphabetically) is outlined given its potential to apply to the Project at some stage(s) throughout its life.
  - Aboriginal Land Rights Act 1983;
  - Biosecurity Act 2015;
  - Contaminated Land Management Act 1997;
  - Crown Lands Act 1989;
  - Dam Safety Act 1978;
  - Dangerous Goods (Road and Rail Transport) Act 2008;
  - Fisheries Management Act 1994;
  - Heritage Act 1977;
  - Local Land Services Act 2013;
  - National Parks and Wildlife Act 1974;
  - Rural Fires Act 1997;
  - Waste Avoidance and Resource Recovery Act 2001.

In addition to the legislation, prior to determination, the consent authority must consider and assess the Project against a range of NSW State Environmental Planning Policies (SEPP). Most of these SEPPs arose from a simplification program that commenced in 2021 to consolidate 45 SEPPs into 11. A summary of the relevant SEPPs is provided below:

- State Environmental Planning Policy (Planning Systems) 2021
- State Environmental Planning Policy (Resources and Energy) 2021
- State Environmental Planning Policy (Resilience and Hazards) 2021
- State Environmental Planning Policy (Biodiversity and Conservation) 2021

TMPL's current Environmental Impact Assessment (EIS) is considering all these aspects and to date, no red flags have been found.

The Project is situated within the Glen Innes Severn Council Local Government Area (GISC LGA). The consent authority for any development within the GISC LGA must consider the local planning provisions that are provided in the Glen Innes Severn Local Environmental Plan 2012 (Glen Innes Severn LEP). A summary of the relevant provisions is provided below:

- **Clause 2.3(2) Zoning:** The Glen Innes Severn LEP identifies the subject lands of Project's Application Area as being zoned RU1 (Primary Production). The Glen Innes Severn LEP identifies that open cut mining is permissible with consent within Zone RU1.
- **Clause 7.3 Essential Services:** The consent authority must be satisfied that the Project has adequate arrangements in place for the:
  - supply of water and electricity;
  - disposal and management of sewage;
  - stormwater drainage; and
  - road access.

  The Project, through detailed consideration as part of this Feasibility Study, has identified a range of measures to address the matters identified above. The EIS will document all measures relating to the supply of essential services for the Project and provide an assessment of any impacts that may arise from their implementation.
- **Clause 7.3 Riparian Land and Watercourses:** This clause applies to "Riparian Land" identified on GISC LEP mapping where the consent authority must consider:
  - water quality and watercourse flows;
  - aquatic and riparian species, habitats and watercourse ecosystems;
  - watercourse stability (bed and banks);
  - the free passage of fish and other aquatic organisms;
  - the future rehabilitation of the watercourse and riparian areas;
  - whether the development would increase water extraction from the watercourse; and
  - measures to avoid, minimise or mitigate impacts of the development.

  Two watercourses (Vegetable Creek and an unnamed tributary) along the alignment of Grampians Road are identified as being "Riparian Land". As the Project would require upgrades to Grampians Road, including improved crossings of these waterways, an assessment of the impacts of these upgrades will be provided in the EIS.

  One watercourse (Little Plant Creek) within the Mine Site is identified as being "Riparian Land". Whilst the Project would avoid any direct impact on this watercourse, an assessment of water quality and flow will be provided in the EIS.

An Environmental Impact Assessment is currently in progress addressing all aspects of legal, permitting and approvals and is due for completion in Q3, 2024.

Rehabilitation and Mine Closure

All Mining Lease(s) issued under the Mining Act contain standard conditions that require the establishment of clear, achievable, measurable and enforceable targets for rehabilitation and reporting. These conditions require, where practicable, the adoption of progressive rehabilitation throughout the Mine-life.

As the Project would require an Environmental Protection Licence, it would be considered a "large mine" under the Mining Regulation 2016. Therefore, the standard ML conditions will require that, prior to the commencement of mining operations, TMPL prepare and/or implement the following in the approved format:

- A rehabilitation risk assessment that identifies and evaluates the potential risks to achieving the final land use.
- Appropriate measures to eliminate, minimise or mitigate identified rehabilitation risks.
- A publicly available Rehabilitation Management Plan that documents rehabilitation risks and identifies the approach to meet rehabilitation objectives.
- The following "rehabilitation outcome documents" that must be submitted for approval by the Secretary of the Department of Regional NSW:

- A rehabilitation objectives statement that describes the rehabilitation outcomes required to achieve the final land use.
- Rehabilitation completion criteria that establish "benchmark values" that demonstrate rehabilitation has been achieved.
- Final landform and rehabilitation plans that spatially depict the topography and final land use areas of the final landform.

Throughout the period of ML tenure, TMPL would also be required to prepare and submit, in the approved form, the following to the Resources Regulator on an annual basis:

- A Rehabilitation Report that documents TMPL's approvals, surface disturbance, stakeholder consultation, rehabilitation planning, any areas that have achieved the final land use, rehabilitation activities (including management, maintenance) over the reporting period and an analysis of progress against the previous schedule.
- A Forward Program that identifies the 3-year schedule of mining activities and the spatial progression of any rehabilitation activities to demonstrate that rehabilitation is occurring as soon as reasonably practicable.

Following the cessation of mining operations, any buildings and infrastructure not required for the future land use would be decommissioned, dismantled and removed from the Mine Site. During this period, any areas of hydrocarbon or chemical contamination would also be identified and remediated. These activities would then be followed, where required, by earthworks and reshaping to ensure the final landform slopes are stable and free draining.

The Project would also create landforms that would be retained in the final landform, namely the open cut pits, waste rock emplacements, co-disposal area and tailing storage facility. Apart from the open cut pits and tailings storage facility, these landforms would generally be developed during operations to meet slope design criteria to ensure they are free draining and geotechnically stable. Regarding the tailings storage facility, following the cessation of tailings deposition, the facility would be dewatered and placed tailings allowed to consolidate. Once sufficiently consolidated, the tailings would then be shaped to create a low slope surface that directs runoff to the closure spillway. The waste rock emplacements, co-disposal area and tailing storage facility would then be capped to ensure the long-term geochemical stability of the underlying materials. Runoff from these areas would continue to be collected in the water management infrastructure developed for the Project.

Following reshaping and capping activities, growth medium, including stockpiled topsoil and subsoil would then be placed and the landform revegetated using representative native species. At this stage, the final land use of these areas would be "native ecosystem". All water management infrastructure that is not required to meet the final land use, or which exceeds the harvestable rights entitlements of the landholding, would then be removed at this time.

The open cut pits would be retained as "final voids" in the final landform. This would ensure future access to underlying mineral resources should their extraction become economically beneficial. Where required, terminal benches would be shaped to ensure long term geotechnical stability. A closure bund would also be placed around the open cut pit perimeters and angled drillholes installed to permit drainage.

Preliminary studies into renewable power have shown potential exists to convert the Company's large landholdings into a larger renewable power farm, including 13 by 4.5MW wind turbines and 25MW ac solar power generation to generate up to 274,000MWh per year of renewable power. In addition, as the area has moderate relief, potential exists to use the final pit voids for a pumped hydro facility. These options will be examined further as mining proceeds.

A key element of the EIS will be to present the proposed final landform and land use of the Mine Site following the cessation of operations and the subsequent decommissioning and rehabilitation activities. Invariably, rehabilitation outcomes are refined during consultation with NSW Government agencies and the community, so residual risks are reduced to acceptable levels which preserve intergenerational equity. When the Project is approved, the agreed rehabilitation outcomes would be conditioned in the development consent.

A bond of A$9,420,242 has been estimated as requirement prior to start of mining.

Capital Cost Estimate

Capital cost estimates have been included under the respective headings and are consolidated below in Table 15. Note that breakdown by area may be different to that in the previous text.

Pre-production Capital

Area	Item	A$M	US$M
Mining	Pre-production Pit Development	0.49	
	Pre-production WRE Development	1.12	

	Haul Roads	2.87	
	Mining Equipment - Mobile Fleet	0.15	
	Mine Infrastructure, Services & Facilities	2.42	
	Sub Total	**7.06**	
Processing	ROM & primary crushing	3.71	
	Sec & tertiary crushing	6.52	
	Screening	1.74	
	Ore storage & reclaim	2.13	
	VSI screening & crushing	5.47	
	Jigging circuit	5.26	
	Jig concentrate circuit	0.88	
	Scavenger circuit	9.64	
	Batch dressing	1.46	
	Tin concentrate filter	1.58	
	Tin concentrate storage	0.29	
	Co -disposal material handling system	0.13	
	Fine tailings thickener	1.06	
	Fine tailings filter	2.19	
	Tailings pipeline & discharge	0.06	
	Sub Total	**42.14**	
Infrastructure	On Site Plant Infrastructure	13.36	
	Plant Facilities	3.41	
	Plant Mobile Equipment	0.60	
	CDA & TSF Area wide	0.37	
	Co-Disposal Area	0.86	
	Sulphide TSF	1.08	
	Off Site Infrastructure	0.72	
	Site Preparation	1.42	
	Onsite Infrastructure	6.34	
	Runoff Water & Sediment	1.50	
	Fresh Water Supply Dam	1.48	
	Solar Farm	15.55	
	Gas Power Generation	12.39	
	Site Buildings	6.85	
	Construction Support	2.12	
	Subcontractor Overheads	14.39	
	Sub Total	**82.43**	
Owner Costs	TMPL Project team	2.32	
	Detail Engineering	1.39	
	Sub Total	**3.71**	
Ops Mining Management	TMPL Operations team	8.19	
	Operations Mgmt. Team Expenses	0.20	
	Sub Total	**8.40**	
First Fill & EPCM	First Fills & Critical Spares	1.92	
	Permitting & Statutory Approvals	1.00	
	EPCM Engineering	7.89	
	EPC management	4.22	
	EPCM Site Office Expenses	1.02	
	Sub Total	**16.05**	
Contingency	Contingency	16.66	
	Sub Total	**16.66**	
TOTAL		**176.44**	

Sustaining Capital

Area	**Item**	**A$M**	**US$M**
Sustaining	Mining	3.10	
	Site Clearing	0.42	
	WRE & Tailings	1.56	
	Working Capital	0.60	
	Sub Total	**5.68**	
TOTAL		**5.68**	

Table 15: Taronga Tin Project Capital Cost Estimate.

Operating Cost Estimate

Operating cost estimates have been included under the respective headings and are consolidated below in Table 16 and Table 17.

Cost Centre	LOM Cost (A$M)	LOM Cost per Tonne Treated (A$/t)	LOM Cost per Tonne Treated (US$/t)
Mining	267.1	6.73	4.44
Processing	209.8	5.28	3.48
G&A	80.1	2.02	1.33
Total Site Costs (C1)	**557.0**	**14.03**	**9.26**
Rehab Bond	9.4	0.24	0.16
Off Site Costs (Smelting, Transport etc)	140.2	3.53	2.33
Royalties	22.7	0.57	0.38
Sustaining Capital	5.7	0.14	0.09
AISC Costs	**734.9**	**18.51**	**12.22**
Depreciation	162.4	4.09	2.70
Full Cost	**897.3**	**22.60**	**14.92**

Table 16: Taronga Tin Project Operating Cost Estimate by Tonne of Ore Treated

Cost Centre	LOM Cost (A$M)	LOM Cost per Tonne Tin (A$/t)	LOM Cost per Tonne Tin (US$/t)
Mining	267.1	8,724	5,758
Processing	209.8	6,853	4,523
G&A	80.1	2,615	1,726
Total Site Costs (C1)	**557.0**	**18,192**	**12,007**
Rehab Bond	9.4	308	203
Off Site Costs (Smelting, Transport etc)	140.2	4,578	3,023
Royalties	22.7	741	489
Sustaining Capital	5.7	186	123
AISC Costs	**734.9**	**24,005**	**15,843**
Depreciation	162.4	5306	3502
Full Cost	**897.3**	**29,311**	**19,345**

Table 17: Taronga Tin Project Operating Cost Estimate by Tonne of Tin Sold

These costs put Taronga firmly in the lower half of production costs worldwide and close to the lowest quartile. Figure 19, reproduced with permission from the ITA, shows the projected worldwide tin mine full costs in 2027 based on 2022 data. Taronga's projected full cost is US$19,345 per tonne (including depreciation), well below the forecast US$33,800 tin price required to induce new capacity.

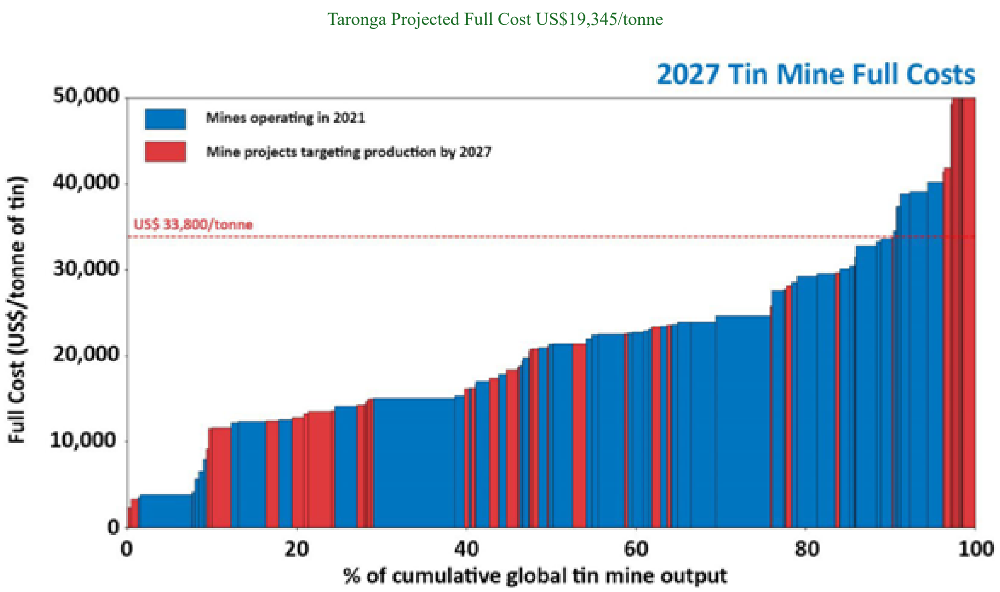

Figure 19: ITA Projected Tin Mine Production Costs 2027 (Based on 2022 Data, Used with Permission From ITA)

Marketing & Offtake

Tin is traded on the London Metals Exchange (LME) and Shanghai Futures Exchange (SHFE). The average trailing 3 month tin prices and exchange rates for different time horizons as of 26th April 2024 is shown in Table 18.

Time	**US$/t tin**	**AUD:USD rate**	**A$/t tin**

Spot (26/4/24)	33,097	0.6523	50,739
1 Year Av	26,350	0.6584	40,021
3 Year Av	29,720	0.6951	42,756
5 Year Av	25,180	0.6969	36,131
10 Year Av	22,311	0.7359	30,317

Table 18: Tin price and exchange rates for different time periods

At the start of the DFS, the assumptions used were a tin price of US$27,500 and exchange rate of 0.70 (A$39,286) based on the 3 year trailing averages at that time. Through the course of the study these assumptions were revisited.

Based on the 1 year (US$26,355) and 5 year (US$25,180) average USD tin prices and forecasts by the ITA and others that US$25,000 will be the new floor price for tin, a conservative tin price of US$26,000 (A$39,394) has been used for the DFS. As of 26th April 2024, the spot price was US$33,097 (A$50,739), which highlights the conservative assumption used in the DFS.

Exchange rates are more difficult to predict, and using past averages does not have any real significance going forward due to changing economic conditions. The value of the AUD is partly dependent on the Chinese economy, as China is Australia's main trading partner, and it is generally predicted that China's economy will slow down from its normal high rate of advance going forward. Long range forecasts are generally bearish for the AUD. Based on this, the current rate of around 0.65 to 0.66 is considered reasonable and it was decided that 0.66 be used for the current study.

Payability terms assume offtake by one of the main smelters in Southeast Asia (MSC or Thaisarco). A Terms Sheet has been obtained with a validity date of 31/12/2024 from Thaisarco that outlines the main terms for treatment charges, deductions, penalties and specifications. As these are confidential, details are not provided here, but total payability is calculated at 88.4%.

The average Taronga concentrate grades are shown in Table 19, along with the specifications for acceptance by the smelter:

Element	**Taronga Average Grade**	**Smelter Specifications**
Sn	62.03%	>40%
As	1.19%	<2%
F	1.70%	N/A
Pb	0.06%	<1%
Bi	0.01%	<0.5%
Cu	0.06%	<0.5%
Sb	0.01%	<0.2%
Ni	0.00%	<0.05%
Co	0.00%	<0.05%
Zn	0.02%	<0.5%
Ag	13.85	N/A
S	0.38%	<5%
Fe	3.73%	<10%
Mn	0.00%	<0.2%
W	0.62%	<5%
ThO3	0.00%	<10Bq/g
U3O8	0.00%	<10Bq/g
SiO2	5.34%	N/A

Table 19: Taronga Tin Project Average Product Specification

It can be seen that the Taronga concentrate is well within specifications. Arsenic, although currently within specification, can be further reduced to well below 1% by cleaning up the final concentrate using sodium hydrosulphide (NaSH) as an addition to the sulphide flotation process.

Based on the above specifications, the total payability of Taronga tin concentrate is 88.4% including all treatment costs and penalties, transport to the smelter in Thailand, insurance and other associated costs.

Business and Financial Assessment

The following key inputs were used to populate the financial model:

- TMPL, AMDAD, and Mincore for mine capital development and infrastructure capital costs
- AMDAD for mine schedule physicals and assumptions for mining costs
- Mincore for power consumption, percentage of installed equipment for maintenance materials, reagents-consumables consumption, and other processing inputs.
- Market bids (sourced by Mincore, TMPL, etc.) consumables prices as inputs for operating costs, sustaining capital estimates, asset replacement as percentage of installed equipment
- ATC Williams for TSF and CDA quantities and timing

- Mincore for labour cost estimates
- TMPL and Mincore for earthworks, materials, and consumables rates

Key assumptions used are:

- Tin price US$ 26,000/t
- AUD:USD Exchange Rate 0.66
- Tin Payability 88.4% (incl. transport, smelting, penalties etc)
- Electricity Price A$0.125/kWh
- Diesel Price A$1.35/l (after government rebate)
- NSW State Royalty Rate 4%
- Income Tax Rate 30%
- Discount Rate 8%

The design requirements were prepared by each consultant for their respective area of study. In consultation with the consultants, Mincore prepared quantity estimates for those designs and applied unit rates from their current market database to estimate the capital costs for each work breakdown structure (WBS) element. For example, ATC Williams designed the TSF and CDA and provided the estimate of earthworks quantities required for their design, and Mincore provided the unit rates of the earthworks to deliver the TSF and CDA capital cost estimate. Both upfront capital costs and sustaining capital costs were prepared in this way.

Upfront capital costs are defined as those capital costs that are required to bring the project into production that occurred before the first tin concentrate is produced. Whereas, sustaining capital costs are the capital cost items that occur post the commencement of production.

Capital and operating costs are provided in previous sections of this report.

The production profile was provided by AMDAD using the ore reserve estimates and scheduling from their pit optimisations and subsequent detailed design.

The key outputs from the financial model are presented in the Table 20.

Item		Unit	Amount
Production	Waste mined	kt	40,540
	Mill feed	kt	39,710
	Head grade	% Sn	0.13%
	Contained tin	tonnes	51,528
	Plant recovery	%	59%
	Tin produced	tonnes	30,613
Operating costs	Mining costs - incl. geology	AUD/t	6.73
	Processing costs	AUD/t	5.28
	Site G&A costs	AUD/t	2.02
	C1 Site Costs	AUD/t	14.03
	Bond Costs	AUD/t	0.24
	Government royalty	AUD/t	0.57
	Sustaining capital	AUD/t	0.14
	Realisation costs	AUD/t	3.58
	Total AISC operating cost	AUD/t	18.51
	Depreciation	AUD/t	4.09
	Full costs	AUD/t	22.60
Operating cash flow	Tin price assumption	AUD/tonne	39,394
	Tin revenue	AUD million	1,206.0
	Realisation costs	AUD million	140.2
	Net revenue	AUD million	1,065.8
	Site operating costs (incl. royalties)	AUD million	589.02
	Operating Margin	%	45%
	EBITDA	AUD million	476.8
Capital costs	Upfront capital costs	AUD million	176.4
	LOM Sustaining capital	AUD million	5.7
Cash Flows	Mine closure costs	AUD million	9.4
	Pre-tax LOM cash flow	AUD million	295.7
	Income taxes	AUD million	78.1
	Post-tax LOM cash flow	AUD million	235.6
NPV metrics	Discount rate (%)	%	8%
	Net present value before tax - ungeared	AUD million	143.1

	Net present value after tax - ungeared	AUD million	98.3
	IRR - before tax (%)	%	24.3
	IRR - after tax (%)	%	20.4
	Mine life	Years	9
	Payback - after tax (years)	years	2.97
	Breakeven tin price (NPV = 0)	USD/tonne	20,510

Table 20: Taronga Tin Project Financial Model Key Outputs

An after tax NPV waterfall chart is shown as Figures 20 and 21.

Discounted and undiscounted after tax cash flow diagrams are shown as Figures 22 and 23.

Concentrate and metal production are shown as Figure 24.

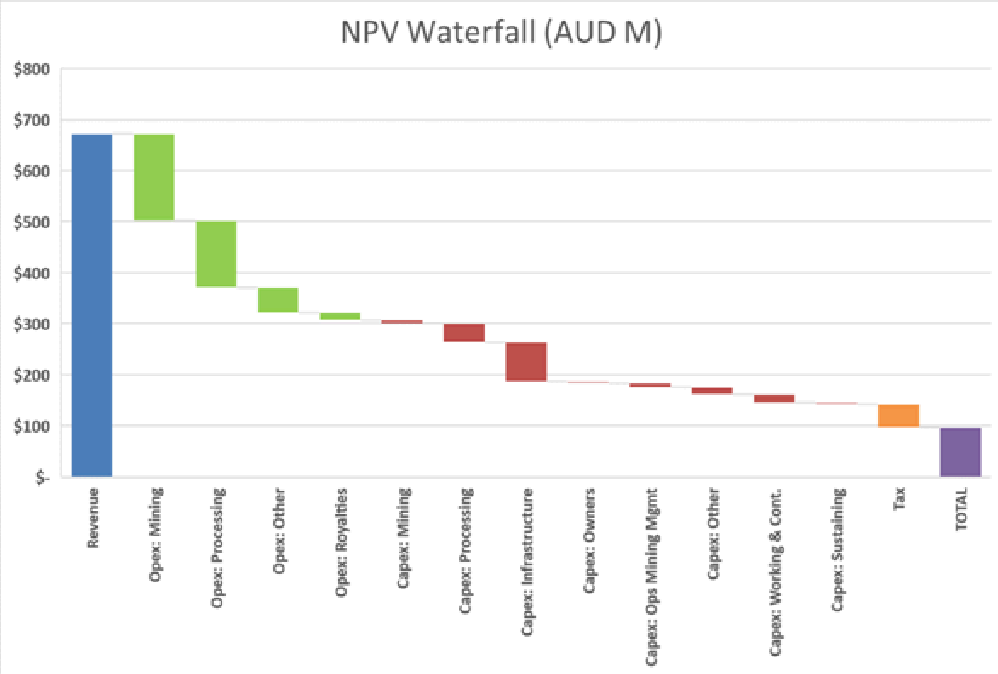

Figure 20: Taronga Tin Project - Post Tax NPV Waterfall Chart

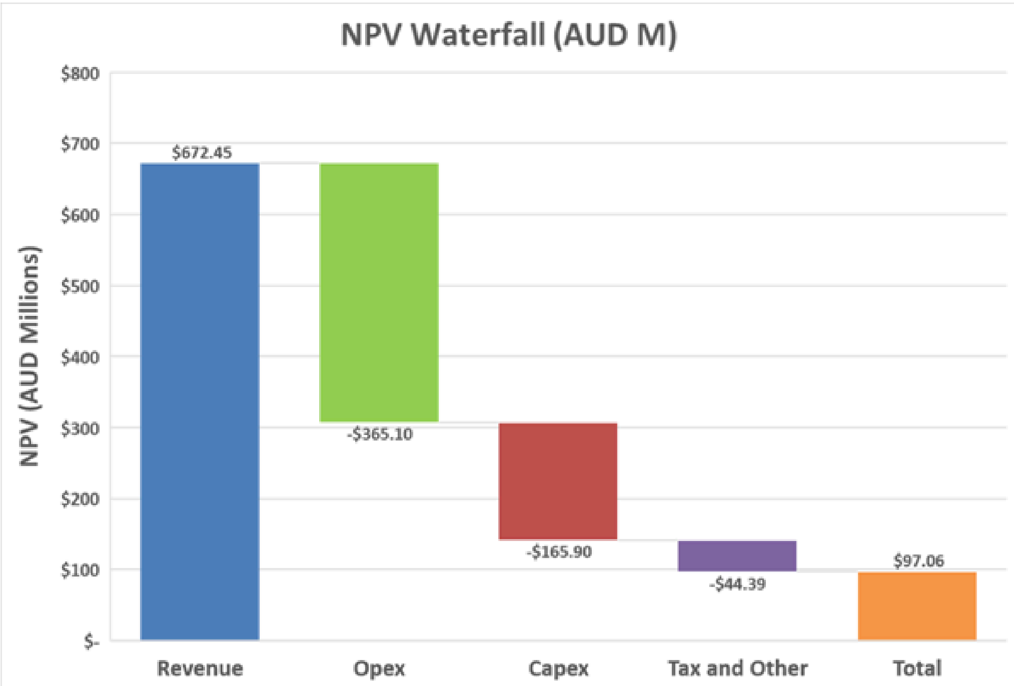

Figure 21: Taronga Tin Project - Post Tax NPV Waterfall Chart (Simplified)

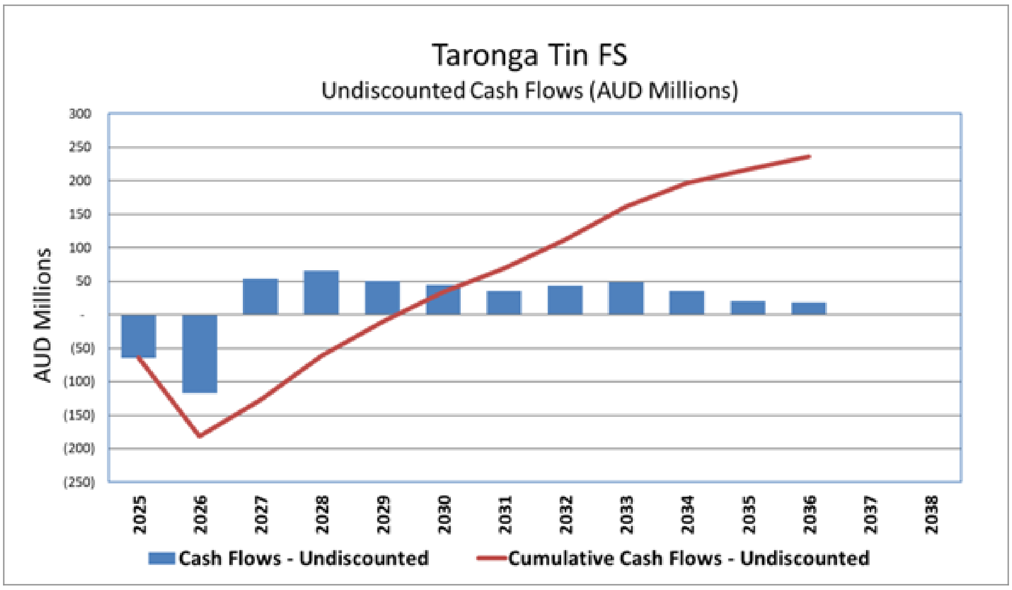

Figure 22: Taronga Tin Project - After Tax Undiscounted Cashflow

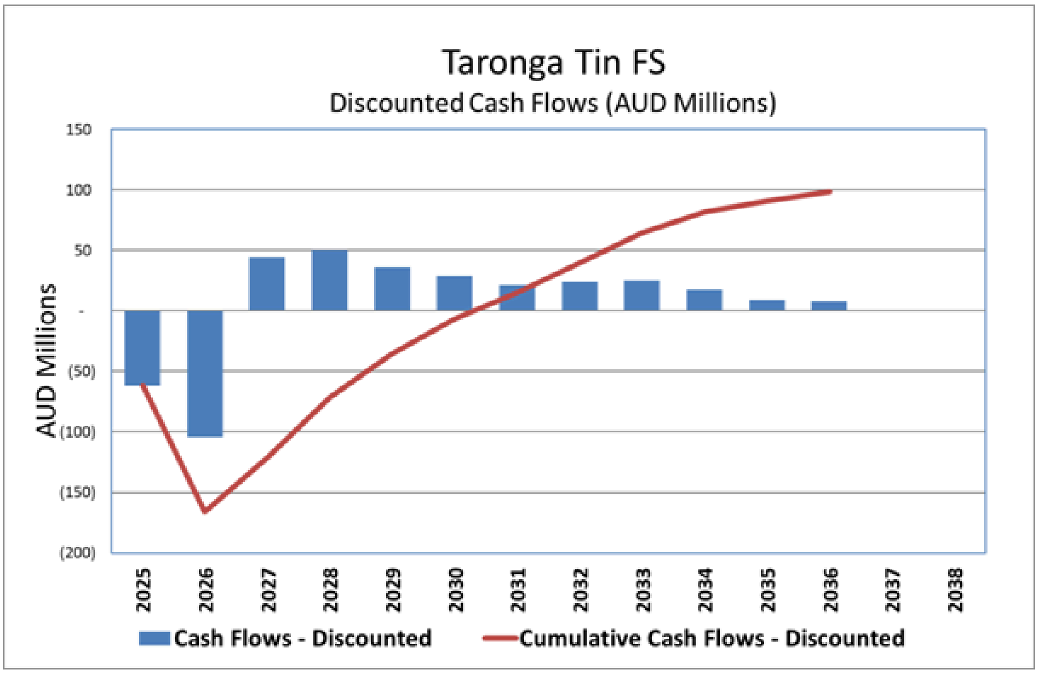

Figure 23: Taronga Tin Project - After Tax Discounted Cashflow

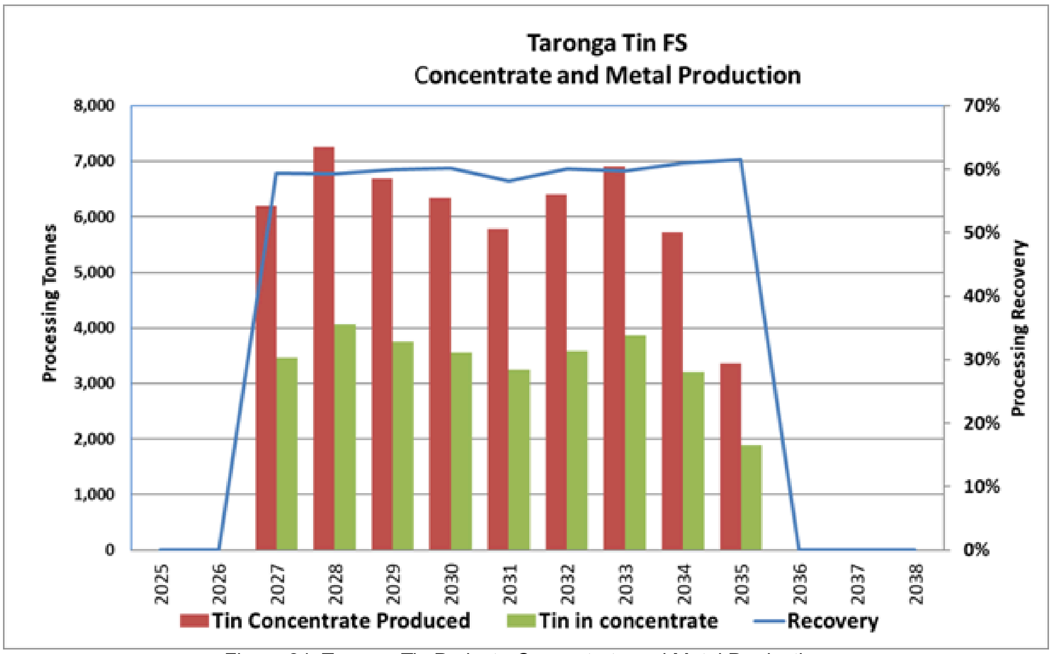

Figure 24: Taronga Tin Project - Concentrate and Metal Production

Sensitivity to tin price is shown as Figure 25.

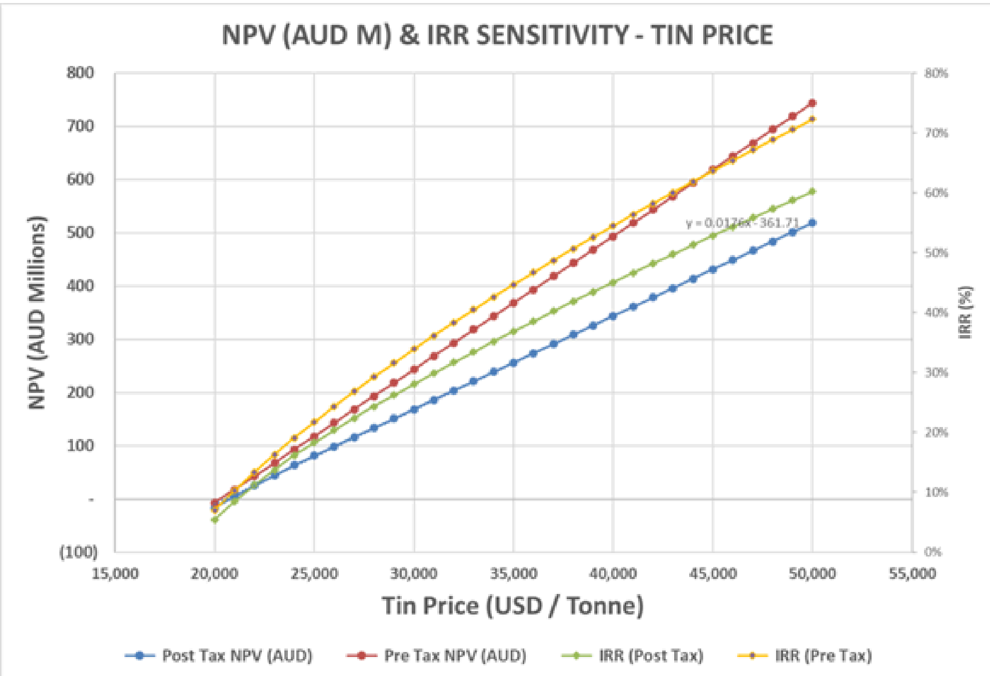

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Figure 25 - Taronga Tin Project - Sensitivity to Tin Price

At the current tin price of US$33,097 (A$50,739) per tonne on 26th April, pre-tax NPV_8 and IRR are A$331 million and 42% respectively while post tax NPV_8 and IRR are A$231 million and 35% respectively. At the conservative tin price of US$26,000 (A$39,394) per tonne used as a base for the DFS, pre-tax NPV_8 and IRR are A$143 million and 24% respectively (post-tax A$98 million and 20%). A higher price scenario assuming a US$40,000 per tonne, implies a pre-tax NPV_8 of A$494 million and a post-tax NPV_8 of A$345 million.

Considering the recent movements in the tin price and the ITA forecast that an inducement price of US$33,800 per tonne required to encourage new capacity, a tin price of US$30,000 per tonne is a useful mid-price comparable for this project. At this tin price the pre-tax NPV_8 is A$243 million and IRR of 34% (post-tax A$169m and 28%).

These comparisons are summarised in Table 21:

Scenario	DFS Base Case	Mid-Case	Current Spot	High Case

Tin Price US$/t	26,000	30,000	33,097	40,000
Pre-TaxNPV_8 AUD m	143	243	331	494
Pre/Post Tax IRR %	24/20	34/28	42/34	55/45

Table 21: Pre-tax NPV_8 Comparisons at alternative Tin Prices (other factors kept constant)

NPV sensitivity to other key inputs is shown as Figure 26.

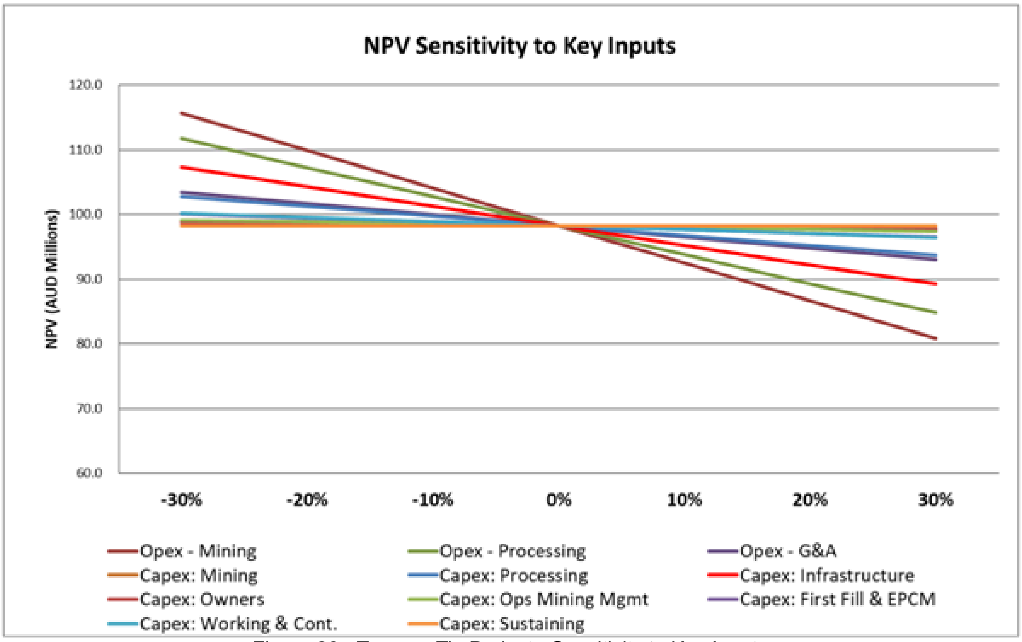

Figure 26 - Taronga Tin Project - Sensitivity to Key Inputs

Upside Potential

The pit optimisations and subsequent detailed designs are based on the initial recovery formula (average 54% recovery) that has since been proven to be far too conservative.

As reported on 25th April 2024, ongoing mineral processing test work has shown a total recovery of 60.2% for a low grade sample (0.10% head grade). Crushing test work on a high grade (HG) sample (0.15% head grade) provided a 91.2% recovery of tin in 44% of the mass, grading 0.30% Sn. If the gravity concentration recoveries for the HG sample can be shown to be similar to the 71.2% obtained for the low-grade samples, then total recovery at a head grade of 0.15% should be around 65-66%.

As these results arrived too late to re-design the pits, waste rock emplacements, co-disposal areas and tailings storage facility for the DFS, an updated recovery was only used for the economic miodelling. Based on this new information, it was not possible to totally re-run the economic model. However, revised pit optimisations (not included in the DFS) suggest that at currently achieved recoveries of ca. 59%, the mine life and pre-tax NPV of the project is likely to increase from that reported in the DFS.

At a later stage an add-on fine tin circuit could be included to improve recoveries by 5-10%.

Recently announced soil sampling results suggest the presence of additional tin mineralisation. Success from any subsequent follow up drilling could result in the identification of new Mineral Resources which could significantly add to mine life and the project economics. There are several areas that require additional drilling to define potential additional Mineral Resources including:

1. Current Inferred Resources
2. Potential parallel zones immediately NW of the current pits.
3. Extensions to the NE and SW of the current pits (mineralisation not closed off).
4. Between the two pits where recent drilling has returned previously unknown mineralisation.
5. Potential parallel zones to the SE of the current pits.

1. Assumed AUD:USD exchange rate is 0.66. Site cash costs include mining, processing and G&A.
2. All-In Sustaining Cost (AISC) is the site cash cost to produce a tonne of contained tin plus the sustaining capital costs to maintain the mine, processing plant and infrastructure, servicing the environmental bond, the off-mine costs to sell a tonne of contained tin, and NSW government royalties. AISC per tonne does not include depreciation, depletion, and amortisation, reclamation, borrowing costs and exploration expenses.

Appendix

If you would like to access the full Ore Reserves Statement for the Taronga Tin Project, which includes the full JORC tables, please click the link below:

http://www.rns-pdf.londonstockexchange.com/rns/9778M_1-2024-5-2.pdf

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