

24 June 2025

## AUSPOZZ™ PFS SUPPORTS DEVELOPMENT OF AUSTRALIA'S FIRST METAKAOLIN PRODUCTION FACILITY FOR LOW-CARBON CONCRETE

Emerging mineral processing technology company Zeotech Limited (ASX: ZEO, "Zeotech" or "the Company") is pleased to announce the outcomes of its Preliminary Feasibility Study ("PFS"), which has delivered a compelling business case and comprehensive technical and financial validation for the Company's AusPozz™ Project ("the Project").

### HIGHLIGHTS

- Project cashflow of \$1,014m after-tax and earnings before interest, tax, depreciation and amortisation ("EBITDA") of \$1,604m over Life of Mine ("LOM").
- Net Present Value ("NPV<sub>8</sub>") of \$406m after-tax, and Internal Rate of Return ("IRR") of 42% after-tax.
- Initial capital cost of \$115m, with a Payback Period of 2.1 years from free cash flow after commissioning the AusPozz™ Manufacturing Facility.
- Project life of 20 years supported by a subset of the total Mineral Resource comprising 10.87 Mt of plastic and kaolinite clay classified as Measured and Indicated Resource.
- Early cash flows from direct shipping ore ("DSO") operations reduce capital requirement to approximately \$95m, including all Project working capital needs.
- Production targets of 300,000 tpa AusPozz™ and 151,000 tpa of Kaolin DSO.
- Commercial interest validated by a sales/specifier opportunity pipeline of 65 active leads and Memorandums of Understanding ("MOUs") with major industry players - Holcim Australia ("Holcim") for AusPozz™ and Jiangsu Mineral Sources International Trading Co, China ("MSI") for Kaolin DSO products.
- Projected workforce of more than 140 skilled personnel across mining, logistics, manufacturing, and administration demonstrates the significant economic and social impact the Project could have in rural and regional Queensland.
- Substantial ongoing reduction of embodied carbon in the built environment would result from 1-for-1 replacement of cement with AusPozz™ in low-carbon concrete. At nameplate production, it could reduce carbon emissions by an estimated 229,800t CO<sub>2</sub>-e per annum.
- The Company intends to transition to a Definitive Feasibility Study ("DFS") in Q3 2025.

Zeotech, Chief Executive Officer, James Marsh commented:

*"We are excited by the positive outcomes of the AusPozz™ Project PFS, which presents a compelling business case for establishing Australia's first manufacturing facility dedicated to producing a world-class high-reactivity metakaolin. This advanced supplementary cementitious material ("SCM") product offers both significant environmental and technical benefits, making it a key enabler in accelerating the transition to low-carbon concrete across a broad range of applications."*

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“AusPozz™ is well-positioned to become a game changer in Australia’s building and construction materials sector, with the potential to make a substantial contribution to the nation’s net-zero carbon emission targets. We eagerly look forward to advancing the DFS and continue driving sustainable innovation.”

## BACKGROUND

Zeotech has completed its AusPozz™ PFS, which aimed to deliver a robust business case for the Company’s high-reactivity metakaolin product, AusPozz™. The PFS evaluated the technical and financial viability of AusPozz™ and Kaolin DSO, utilising its ultra-high purity kaolin from the Toondoon Kaolin Project (“Toondoon”) in Queensland.

AusPozz™ is a low-carbon SCM primarily targeting cement replacement in the domestic building materials market and potential export opportunities. The proposed AusPozz™ Manufacturing Facility is intended to be located at the Port of Bundaberg, Queensland.

The AusPozz™ Manufacturing Facility is proposed to comprise a single initial train with a nameplate capacity of 300,000 tpa. The Toondoon Kaolin Deposit will provide all kaolin ore required for the AusPozz™ Manufacturing Facility and export of Kaolin DSO products. Production targets for Kaolin DSO and Cosmetic Kaolin DSO products are 142,000 dtpa and 9,000 dtpa, respectively.

**Table 1: Key Project Parameters**

Parameter	Unit	Result	
<b>Mine Plan</b>			
LOM	Years	20	
Stripping Ratio (waste:ore)	t <sub>dry</sub>	0.3:1	
Mineral Resource supporting the LOM <sup>1</sup>	Mt <sub>dry</sub>	10.87	
<b>Production Summary</b>		<b>DSO</b>	<b>AusPozz™</b>
Mine Production (annual average)	kt <sub>dry</sub>	153	371
Production Target (annual)	kt <sub>dry</sub>	151	300
<b>Financial Metrics</b>		<b>Total LOM</b>	
		<b>pre-tax</b>	<b>after-tax</b>
Revenue	A\$m	3,385	
EBITDA	A\$m	1,604	
Initial Capital Cost	A\$m	115	
Capital Requirement (indicative)	A\$m	95	
Sustaining Capital	A\$m	17	
Net Cashflow	A\$m	1,455	1,014
NPV <sub>8</sub>	A\$m	548	406
IRR	%	56	42
Payback Period <sup>2</sup>	Years	2.1	

<sup>1</sup> Plastic clay, kaolinite clay (high-iron), kaolinite clay (low-iron) classified as Measured and Indicated Resource

<sup>2</sup> Payback period is calculated by dividing total Initial Capital Cost by free cashflow after AusPozz™ Manufacturing Facility is commissioned

The projected LOM is 20 years for the Project, and the financial analysis and overall economics of the Project have been completed with an accuracy expected to be +/- 25%.

A summary of the key AusPozz™ Project parameters is summarised in **Table 1**.

The Project's lifecycle analysis ("LCA") presents the potential of a substantial ongoing reduction of embodied carbon in the built environment, resulting from 1-for-1 replacement of cement with AusPozz™ in low-carbon concrete. At nameplate production, it could reduce carbon emissions by an estimated 229,800t CO<sub>2</sub>-e per annum. This is the equivalent<sup>3</sup> of:

- **Cars Off the Road:** taking about 53,600 petrol-powered cars off the road yearly.
- **Tree Planting:** planting each year and growing approximately 3.8 million tree seedlings for 10 years.
- **Energy Use:** annual carbon emissions from electricity use in over 30,860 homes.

## NEXT STEPS

The AusPozz™ Project PFS presents a compelling case for Zeotech's entry into the SCM market through the development of a vertically integrated operation. Independent concrete trials confirm that AusPozz™ delivers a superior SCM product with a range of technical advantages.<sup>4</sup>

The PFS demonstrates that the Project is technically feasible, economically viable, and strategically aligned with sustainability in the built environment, driven by domestic and global decarbonisation goals, which are accelerating the growing demand for low-carbon SCMs.

Key findings include:

- **Strong Business Case:** The PFS confirms that AusPozz™ can be produced efficiently with a light carbon footprint, at low cost and low risk, with robust margins supported by strong market demand evident in the domestic construction and infrastructure sectors.
- **High-Quality Resource:** The Toondoon Kaolin Deposit is confirmed to be of ultra-high purity, with a kaolinite content > 90% in the ore clays, making it ideal for Kaolin DSO, Cosmetic Kaolin DSO, and economic AusPozz™ production.
- **Scalable Production:** Proposed nameplate 300,000 dtpa AusPozz™ Manufacturing Facility at the Port of Bundaberg is well-supported by infrastructure, logistics, utilities, and offers the potential for future Train 2 expansion.
- **Market Readiness:** The Company has a growing sales/specifier opportunity pipeline of 65 active leads and has secured early MOUs with major industry players, including Holcim<sup>5</sup> for AusPozz™ and MSI<sup>6</sup> for Kaolin DSO products.
- **Environmental and Social Alignment:** The Project aligns with sustainability goals by offering a high-performance, low-carbon alternative to traditional cement, offering the potential to deliver a significant ongoing contribution to decarbonisation within the Australian built environment, while also supporting regional employment and community development.
- **Execution Pathway:** A clear roadmap has been established, with a DFS scheduled to commence in Q3 2025, leading to Final Investment Decision ("FID") in Q1 2026 and full AusPozz™ production achieved by Q1 2029.

<sup>3</sup> <https://www.epa.gov/energy/greenhouse-gas-equivalencies-calculator>

<sup>4</sup> ASX Announcement 15/04/2025 "Outstanding AusPozz Performance Independent Concrete Trials"

<sup>5</sup> ASX Announcement 28/10/2024 "Zeotech Executes MOU with Holcim Australia"

<sup>6</sup> ASX Announcement 05/05/2025 "MOU Executed with MSI for Toondoon DSO Kaolin and Bauxite"

The PFS concludes that the AusPozz™ Project is a strategically significant Australian first manufacturing opportunity for Zeotech to become a leading supplier of economic, high-performance, low-carbon metakaolin SCM.

AusPozz™ has the potential to transform the domestic building and construction materials sector, making a positive and ongoing contribution to Australia's Net-Zero carbon emission goals.

The Company has commenced planning for the transition to a DFS, which is scheduled to begin in Q3 2025. The DFS will refine technical, regulatory, and commercial aspects, including:

- Conducting further drilling to expand and upgrade the Toondoon Kaolin Resource and feasibility-level assessments to address outstanding Modifying Factors and support future Ore Reserve estimation.
- Finalising environmental approvals and regulatory submissions.
- Optimising mine planning and conducting advanced geotechnical studies.
- Undertaking comprehensive vendor(s) plant and equipment trials.
- Completing engineering design and securing utility agreements.
- Executing binding offtake agreements supported by customer trials.
- Completion of the Port of Bundaberg site agreement(s), including storage options.
- Evaluating expansion or duplication of production trains that could increase AusPozz™ output and support the Company's Horizon 2 initiatives.

Horizon 2 initiatives involve the development of high-value downstream products utilising high-reactivity metakaolin feedstock to produce manufactured zeolites.

Horizon 2 opportunities under advanced development include:

- **zeoteCH<sub>4</sub>**®: A proprietary zeolite formulation designed to eliminate landfill methane emissions.<sup>7</sup>
- **Animal Feed Supplements:** Offtake associated with a zeolite-based supplement aimed at preventing subclinical hypocalcemia, also known as milk fever, in cows.<sup>8</sup>

This announcement has been approved by the Zeotech Board.

- End -

For further information, please contact:

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#### About Zeotech

Zeotech Limited (ASX: ZEO) is a team of dedicated people working together to build a future-focused company, leveraging wholly-owned high-grade kaolin resources to produce high-reactivity metakaolin for the low-carbon concrete market and advanced materials for greenhouse gas (GHG) mitigation, such as zeolites for fugitive methane control.

<sup>7</sup> ASX Announcement 12/05/2025 "Successful Completion of Methane Control Program"

<sup>8</sup> ASX Announcement 06/03/2024 "MOU Executed with Protekta North America"

## Zeotech Limited - Social Media Policy

Zeotech Limited is committed to communicating with the investment community through all available channels.

Whilst ASX remains the prime channel for market-sensitive news, investors and other interested parties are encouraged to follow Zeotech on Twitter ([@zeotech10](#)) and [LinkedIn](#).

## Competent Persons Statement (Mineral Resources)

The information in this announcement that relates to Mineral Resources is based on information compiled by, or under the supervision of, Mr Graham Rolfe, a Competent Person who is a Fellow of the Australian Institute of Geoscientists and a Registered Professional Geoscientist - Exploration. Mr Rolfe is employed by Rock-Ex Enterprises, and has sufficient experience that is relevant to the style of mineralisation and type of deposit under consideration and to the activity being undertaken to qualify as a Competent Person as defined in the 2012 Edition of the 'Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves' (JORC Code). Mr Rolfe consents to the inclusion in the report of the matters based on his information in the form and context in which it appears.

## Competent Persons Statement (Processing Testwork and Mineral Processing)

Information in this announcement has been compiled by Mr James Marsh, a member of The Australasian Institute of Mining and Metallurgy (AusIMM). Mr Marsh is an employee of Zeotech Limited who holds performance rights in the company and has sufficient experience, which is relevant to the style of mineralisation, type of deposits and their ore recovery under consideration and to the activity being undertaken to qualify as a Competent Person under the 2012 Edition of the 'Australasian Code for reporting of Exploration Results, Mineral Resources and Ore Reserves' (JORC Code). This includes Mr Marsh attaining over 30 years of experience in kaolin and metakaolin processing and applications. Mr Marsh consents to the inclusion in the report of the matters based on the information in the form and context in which it appears.

## Cautionary Statement

The PFS referred to in this announcement has been undertaken to assess the technical and economic viability of the AusPozz™ Project. The study aims to identify the preferred mining, processing, and infrastructure requirements, but it is not final. Further evaluation work, including a Definitive Feasibility Study (DFS), is required before the Company can provide assurance of an economic development case.

This PFS is more than a preliminary technical and economic study given the work undertaken for the study, but it is not advanced sufficiently to support the estimate of Ore Reserves, and further technical work, including additional drilling and feasibility-level assessments, is planned to resolve the outstanding Modifying Factors and support a future Ore Reserve classification or provide any assurance of an economic development case.

The Production Target referred to in this announcement is based on this PFS and supported solely by Measured and Indicated resources and not an Ore Reserve. Zeotech has concluded that it has reasonable grounds for disclosing a Production Target; however, there is no certainty that the Production Target or the economic assessment will be realised.

The information in the PFS that relates to metallurgical results and processing assumptions is based on preliminary test work and should not be considered definitive.

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Additional test work, including vendor testing, is required to confirm the technical and economic viability of the proposed process flowsheet and product specifications.

The PFS is based on the material assumptions described in the body of this report and summarised in the Summary of Material Assumptions and Summary of Modifying Factors in Appendix 1. These include assumptions about the availability of funding and the pricing received for the Company's AusPozz™ and Kaolin DSO products. While the Company considers all of the material assumptions to be based on reasonable grounds, there is no certainty that they will prove to be correct or that the range of outcomes indicated by this PFS will be achieved. To achieve the range of outcomes indicated in the PFS, funding in the order of \$95m including working capital will likely be required. Investors should note that there is no certainty that the Company will be able to raise the amount of funding when needed.

It is also possible that such funding may only be available on terms that may be dilutive to or otherwise affect the value of the Company's existing shares. It is also possible that the Company could pursue other 'value realisation' strategies such as a sale, partial sale or joint venture of the project. If it does, this could materially reduce the Company's proportionate ownership of the Project.

Given the uncertainties involved, investors should not make any investment decisions based solely on the results of the PFS.

#### Forward-looking Statements

This release may contain certain forward-looking statements with respect to matters including but not limited to the financial condition, results of research and development, operations, and business of Zeotech, and certainty of the plans and objectives of Zeotech with respect to these items.

These forward-looking statements are not historical facts but rather are based on Zeotech's current expectations, estimates, and projections about the industry in which Zeotech operates, and its beliefs and assumptions.

Words such as "anticipates," "expects," "intends," "potential," "plans," "believes," "seeks," "estimates", "guidance," and similar expressions are intended to identify forward-looking statements and should be considered an at-risk statement.

Such statements are subject to certain risks and uncertainties, particularly those risks or uncertainties inherent in the process of developing technology and in the endeavour of building a business around such products and services.

These statements are not guarantees of future performance and are subject to known and unknown risks, uncertainties, and other factors, some of which are beyond Zeotech's control, are difficult to predict, and could cause actual results to differ materially from those expressed or forecasted in the forward-looking statements.

Zeotech is pleased to report this summary of the PFS in a fair and balanced way and believes that it has a reasonable basis for making the forward-looking statements in this announcement, including with respect to any mining of mineralised material, modifying factors, production targets and operating cost estimates.

This announcement has been compiled by Zeotech from the information provided by the various contributors to the Study. All financial assumptions and estimates are quoted in Australian Dollars ('A\$' or 'AUD') only, unless indicated otherwise.

# EXECUTIVE SUMMARY

## 1. PFS Overview

### Project Scope

Zeotech (ASX: ZEO, “Zeotech” or “the Company”) completed this AusPozz™ Project Preliminary Feasibility Study (PFS) with the aim of delivering a robust business case for the Company’s high-reactivity metakaolin product, AusPozz™.

The PFS evaluates the technical and financial viability of AusPozz™ and kaolin direct shipping ore (DSO) products - Kaolin DSO and Cosmetic Kaolin DSO - using its high-purity kaolin from Zeotech’s Toondoon Kaolin Project (Toondoon) Deposit in Queensland.

The financial analysis and overall economics of the Project have been completed with an accuracy expected to be +/- 25%.

The PFS provides the basis for a more detailed Definitive Feasibility Study (DFS) that Zeotech will require to provide assurance for the economic development case of the AusPozz™ Project.

### Project Description

- AusPozz™ is a low-carbon pozzolanic supplementary cementitious material (SCM) predominantly targeting domestic construction markets in Eastern Australia and potentially international export markets.
- The AusPozz™ Manufacturing Facility is proposed to be built and located at Port of Bundaberg, Queensland, on designated Bundaberg State Development Area (SDA) land outlined in a Letter of Intent executed between Zeotech and Gladstone Ports Corporation (GPC).<sup>9</sup>
- The AusPozz™ Manufacturing Facility is proposed to comprise a single train with a nameplate capacity of 300,000 dry tonnes per annum (dtpa), scheduled to be commissioned approximately 36 months after the commencement of the Project.
- The Toondoon Mine Site will provide all kaolin ore for the AusPozz™ Manufacturing Facility and export of Kaolin DSO and Cosmetic Kaolin DSO products. The projected life of mine (LOM) for the Project is 20 years.
- Zeotech has signed a memorandum of understanding (MOU) with Holcim Australia for AusPozz™ concrete pilot trials and potential offtake agreements.<sup>10</sup>
- Additional Kaolin DSO and Cosmetic Kaolin DSO products are planned, with production targets of 142,000 dtpa and 9,000 dtpa, respectively.
- Zeotech has signed an MOU with Jiangsu Mineral Sources International Trading Co, Ltd (MSI)<sup>11</sup> to negotiate the supply of 950,000 tonnes of Kaolin DSO products over five years.

### PFS Project Team

Zeotech produced the PFS with contributions from specialist consultants under the responsibilities shown in **Table 2**.

<sup>9</sup> ASX Announcement 24/02/2025 “Zeotech Executes LOI with Gladstone Ports Corporation”

<sup>10</sup> ASX Announcement 28/10/2024 “Zeotech Executes MOU with Holcim Australia”

<sup>11</sup> ASX Announcement 05/05/2025 “MOU Executed with MSI for Toondoon DSO Kaolin and Bauxite”

**Table 2: PFS Responsibilities**

Study Area	Consultants
Tenements and Ownership	Ardent Group
Legal, Regulatory, and Policy	Ardent Group
Geology and Mineral Resources	Rock-Ex Enterprises, MinEcoTech, Derisk
Environment	Ardent Group
Community and Stakeholder Engagement	Roundtable
Mining	MinEcoTech
Processing Testwork and Ore Characterisation	Pitch Black Group (PBG)
Mineral Processing and Plant Engineering	Pitch Black Group, Pentral Fultum
Infrastructure and Services	Pitch Black Group, Pentral Fultum
Administration and Workforce	Pitch Black Group, MinEcoTech
Logistics	Derisk
Marketing	HSPC Services, First Test Minerals
Financial	Pitch Black Group, MinEcoTech
Ore Reserves	MinEcoTech, Rock-Ex Enterprises
Risks and Opportunities	Derisk
Project Execution	Pitch Black Group

A technical peer review of the PFS was conducted by Derisk Geomining Consultants Pty Ltd (Derisk).

### Project Locations

The PFS proposed AusPozz™ Manufacturing Facility is to be located within the Port of Bundaberg, Burnett Heads, 15km north-northeast of the City of Bundaberg, and approximately 400km north of Brisbane (**Figure 1**).

The City of Bundaberg is a significant urban centre, with a population of approximately 73,800. Well-developed infrastructure and facilities are supported by commercial, tourism, agriculture, retail, general services, community support, education, and cultural services.

The Toondoon Area is in the Wide Bay Burnett region, approximately 350 km north-northeast of Brisbane, 230 km direct distance from the Port of Bundaberg, and 300 km from the Port of Gladstone (**Figure 1**).

The Toondoon Area comprises one granted mining lease (ML 80126) and two granted exploration permit minerals (EPMs 27866 and 27395) held by Zeotech covering an area of approximately 280 km<sup>2</sup> (28,000 hectares).

There is a Queensland Department of Transport and Main Roads (TMR) approved heavy-haulage transport route from the Toondoon Mine Site to the AusPozz™ Manufacturing Facility at the Port of Bundaberg. Mine access is by North Burnett Regional Council (NBRC) owned and controlled roads. Representatives of TMR and NBRC have been engaged to assess logistics requirements.



Figure 1: Location of Toondoon Mine Site and AusPozz™ Manufacturing Facility

## 2. Tenements and Ownership

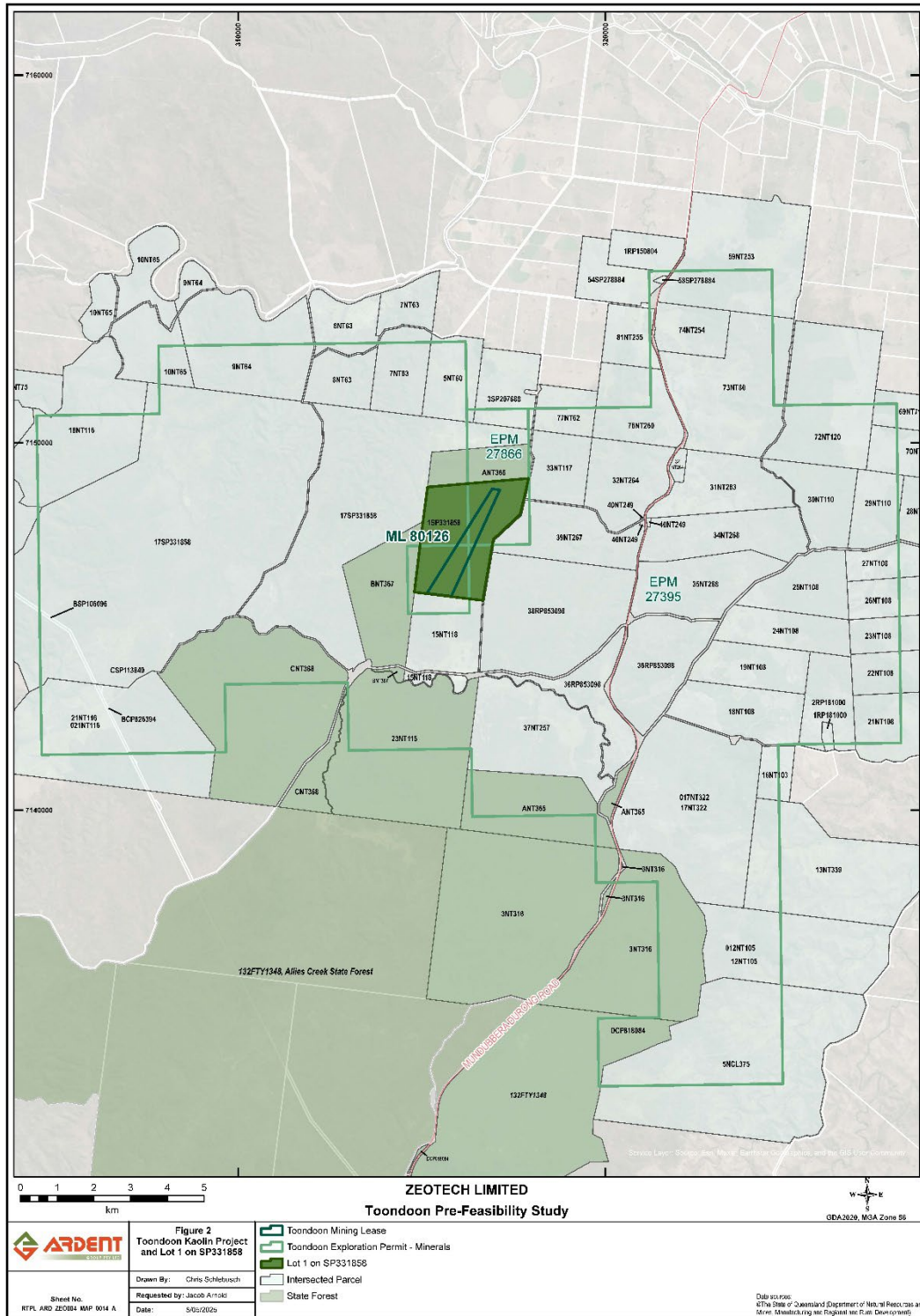
Kalotech Pty Ltd (Kalotech) is a wholly owned subsidiary of Zeotech Limited. Kalotech holds the Toondoon Area that includes Mining Lease (ML) 80126 and two Exploration Permit for Minerals (EPM) 27395 and EPM 27866 (**Table 3**). Kalotech is the owner of freehold land (Lot 1 SP331858) of approximately 682 hectares, which covers the whole of the ML and overlaps the adjacent EPMs (**Figure 2**).

Table 3: Tenement Details

Specifications	Details		
Permit ID	ML 80126	EPM 27395	EPM 27866
Status	Granted	Granted	Granted
Grant Date	24/11/2005	21/05/2020	01/02/2022
Expiry Date	30/11/2030	20/05/2025 <sup>^</sup>	31/01/2027
Current Term	25 years	5 years	5 years
Holder	Kalotech Pty Ltd (100%)	Kalotech Pty Ltd (100%)	Kalotech Pty Ltd (100%)
Area	133.393 ha	89 sub-blocks	3 sub-blocks

<sup>^</sup>EPM is granted with renewal pending. Application lodged 20 February 2025.

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**Figure 2: Tooodoon Area Tenements**

The proposed LOM is longer than the remaining term of ML 80126; therefore, Zeotech would apply for a renewal before its expiry in 2030.

At an appropriate time, Zeotech may establish a new operating entity for the AusPozz™ operations, with an ownership structure subject to further advice and ongoing commercial discussions.

### Cultural Heritage

A search of the cultural heritage database and register for the Toondoon Area and the proposed AusPozz™ Manufacturing Facility Area was undertaken. No records of Aboriginal or Torres Strait Islander cultural heritage sites were found for ML 80126, EPM 27866, or the proposed Facility Area. Six cultural heritage sites were identified near the western boundary of EPM 27395.

The Company, with legal support, plans to engage with the Auburn Hawkwood People to develop a cultural heritage management plan or agreement, including conducting a cultural heritage survey for the Toondoon Area.

### Native Title

Native Title for ML 80126 is extinguished due to the grant of freehold tenure. The Auburn Hawkwood People have a current Native Title Claim Determination over parts of the broader Toondoon Area. In areas where Native Title has not been extinguished, Zeotech will comply with the Native Title Act.

The proposed AusPozz™ Manufacturing Facility Area (Port of Bundaberg) is on Bundaberg SDA freehold land, and Native Title has been extinguished.

## 3. Legal, Regulatory, and Policy

The AusPozz™ Project is being developed in compliance with the applicable legal and regulatory frameworks of Queensland and the Commonwealth. Key approvals and compliance obligations include:

- **Environmental Protection Act 1994:** An Environmental Authority (EA) is required for mining and processing activities. ML 80126 currently operates under a Standard EA, with a site-specific EA expected as the Project expands.
- **Aboriginal Cultural Heritage Act 2003:** Activities will be conducted in accordance with the cultural heritage duty of care, regardless of land tenure or register status.
- **Planning Act 2016 and State Development and Public Works Organisation Act 1971:** The proposed AusPozz™ Manufacturing Facility, located in the Bundaberg SDA, requires SDA approval from the Coordinator-General.
- **Water Act 2000, Vegetation Management Act 1999,** and other environmental laws govern water use, vegetation clearing, and land access.
- **National Greenhouse and Energy Reporting Act 2007:** Zeotech will report emissions in accordance with NGER thresholds.
- **Native Title Act 1993:** The Auburn Hawkwood People will be engaged where Native Title has not been extinguished.

The project aligns with the Equator Principles (EP4) 2020 and is classified as a Category B Project, with limited, site-specific environmental and social impacts (EP Guideline specification).

## 4. Geology and Mineral Resources

### Geological Setting

The Toondoon Area is situated within Queensland's Surat Basin and features a geological profile that consists of Jurassic Evergreen Formation, overlain by Tertiary sediments.

The weathered surface is capped by pisolitic-bauxitic clays that overlie alumina-rich plastic clay, high-iron and low-iron white kaolinite clays, and a basal sandy clay layer - all of which are economically relevant for the AusPozz™ Project.

### Exploration and Drilling

Between 2012 and 2025, four drilling campaigns were conducted, utilising air-core, reverse circulation (RC), and diamond drilling methods. A total of 117 drillholes - comprising 94 air-core holes, 16 reverse circulation (RC) holes, and 7 large-diameter 4C core holes - were completed, contributing 3,088.6m of drilling data that inform the Mineral Resource Estimate (MRE).

In 2025, Zeotech conducted trench sampling and a drilling program, which provided updated dry bulk density (DBD) data and enhanced geotechnical insights, thereby improving the accuracy of the 2025 MRE.

### Sampling and Sub-sampling

All drillholes from the main drilling program completed in 2021 were sampled at 1.0 m intervals. All samples were dry and were split onsite using an 87.5:12.5 splitter (comprising three sets of riffles). The 87.5% fraction samples were retained. The 12.5% fraction was further split with a 50:50 splitter to produce an approximate 300 g sample for analysis.

### Analysis

All samples from the 2021 program were prepared and analysed at the ALS Group laboratory in Queensland. The clay samples were weighed and pulverised to a nominal -75 µm. The mill was cleaned with a silica sand flush after each sample.

Pulverised samples were analysed by X-ray fluorescence (XRF) method ME-XRF13n used typically to analyse bauxite samples. A 0.7 g fused disc was analysed and reported whole metal oxides (with detection limits) for Al<sub>2</sub>O<sub>3</sub> (0.02%), BaO (0.01%), CaO (0.01%), CoO (0.01%), Cr<sub>2</sub>O<sub>3</sub> (0.002%), Fe<sub>2</sub>O<sub>3</sub> (0.01%), K<sub>2</sub>O (0.002%), MgO (0.01%), MnO (0.002%), Na<sub>2</sub>O (0.01%), P<sub>2</sub>O<sub>5</sub> (0.002%), SiO<sub>2</sub> (0.05%), SO<sub>3</sub> (0.005%), SrO (0.001%), TiO<sub>2</sub> (0.004%), V<sub>2</sub>O<sub>5</sub> (0.001%), Zn (0.001%), and ZrO<sub>2</sub> (0.002%).

A Loss-on-Ignition (LOI) analysis using ALS method ME-GRA05 was used to determine the amount of hydroxyl water in the clay minerals.

### Quality Assurance/Quality Control

- Quality Assurance/Quality Control (QA/QC) protocols were implemented during sampling and analysis.
- An Independent Technical Specialist Report completed by Derisk<sup>12</sup> validated the geological model and resource estimation approach used in the 2022 MRE and recommended additional DBD data collection, which was completed in 2025.

<sup>12</sup> ASX Announcement 28/07/2022 – Notice of General Meeting/Proxy Form (Part 1 of 2) – Appendix D

### Clay Characterisation

- Geochemical and mineralogical analyses confirm high-quality kaolinite with low levels of iron and titanium.
- Screening and elutriation tests demonstrate high kaolin yield, particularly from kaolinite and sandy clay zones.
- Brightness testing indicates potential for high-value kaolin applications.

### 2022 Mineral Resource Estimation Methodology

In January 2022, Ausrocks prepared a MRE for Toondoon using all data from the 2021 drilling programs. The process used by Ausrocks comprised the following steps:

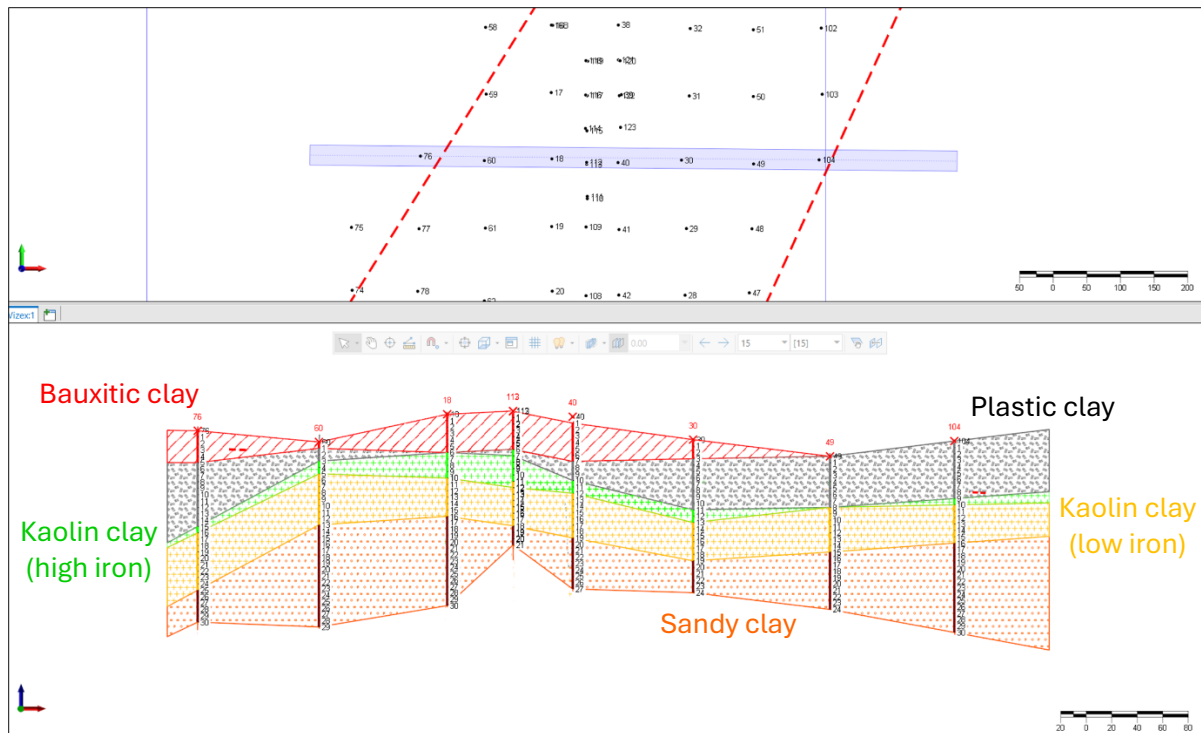
1. Digital files of drillhole data were imported into Micromine software for checking and validation.
2. Digital survey data of the topography was imported into Micromine as collected from a drone photogrammetry survey and reviewed.
3. Data validation checks were completed, focused on errors or inconsistencies in the drillhole collar and assay data.
4. QA/QC data was reviewed.
5. 3D interpretations of lithology and clay horizons were created based on the drillhole logs and assays. Five lithologies were interpreted – bauxitic clay, plastic clay, kaolinite clay (high iron), kaolinite clay (low iron) and sandy clay. The contact between the base of the low-iron kaolinitic clay and the top of the sandy clay horizon was guided by using a criterion of 32% Al<sub>2</sub>O<sub>3</sub> and 47.5% SiO<sub>2</sub>.
6. Statistical analysis of drillhole geochemical data was completed.
7. Drillhole composite lengths were selected, followed by composite statistics and a variographic analysis of the drillhole data.
8. A 3D block model was created (10 mE x 10 mN x 1 mRL), with sub-celling of parent blocks (1 mE x 1 mN x 1 mRL) to allow reasonable boundary definition to honour topography and geological features.
9. Estimation search parameters were developed, and estimates were generated using the ordinary kriging (OK) method.
10. Average DBD estimates of 2.05 t/m<sup>3</sup> were applied to bauxitic clay, 1.74 t/m<sup>3</sup> for plastic clay and kaolinite clay, and 1.69 t/m<sup>3</sup> for sandy clay.
11. Grade estimates were checked visually against the input data. Statistics for kriged estimates and a check estimate using the inverse distance weighting method was completed, together with swath plots.
12. Assignment of the Mineral Resource classification was completed, considering the confidence in the geological interpretation of the mineralisation, drillhole spacing, and estimation quality. Ausrocks classified the Mineral Resource into Measured, Indicated and Inferred categories.

### Geological Model and Domaining

The key inputs to the 2022 MRE comprised the geological logging and geochemical analyses derived from the 2021 drilling programs merged with the digital surface topography data.

Geological interpretation indicates that the plastic clay, kaolinite clay, and sandy clay sequence is folded into a series of northeast trending domal anticlines with associated synclines. The amplitude and frequency of the folded structures decrease away from the outcropping bauxitic clays to the southeast.

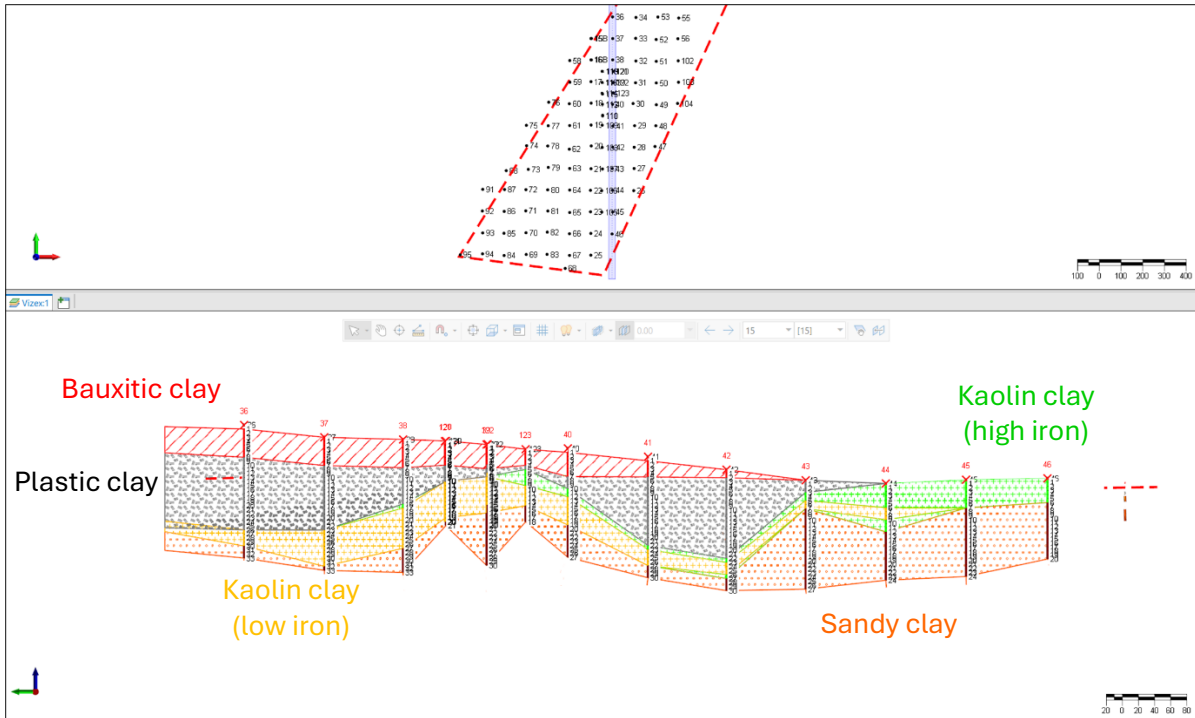
3D interpretations of lithology and clay horizons were created based on the drillhole logs and assays. Five domains based on lithologies were interpreted – bauxitic clay, plastic clay, kaolinite clay (high iron), kaolinite clay (low iron) and sandy clay. The contact between the base of the low-iron kaolinitic clay and the top of the sandy clay horizon was guided by using a criteria of 32%  $Al_2O_3$  and 47.5%  $SiO_2$ . **Figure 3** shows an east-west section and **Figure 4** shows a north-south section through the deposit.



(source: Ausrocks, 2022)

**Figure 3: East-west section through the centre of the deposit**

For personal use only



(source: Ausrocks, 2022)

**Figure 4: North-south section through the centre of the deposit**

### Variography

Ausrocks completed a variography analysis of the data and used the results of this assessment to inform an OK estimate of all grade parameters.

As would be expected variography generated very short ranges in the vertical orientation and ranges of several hundreds of metres in the horizontal orientation.

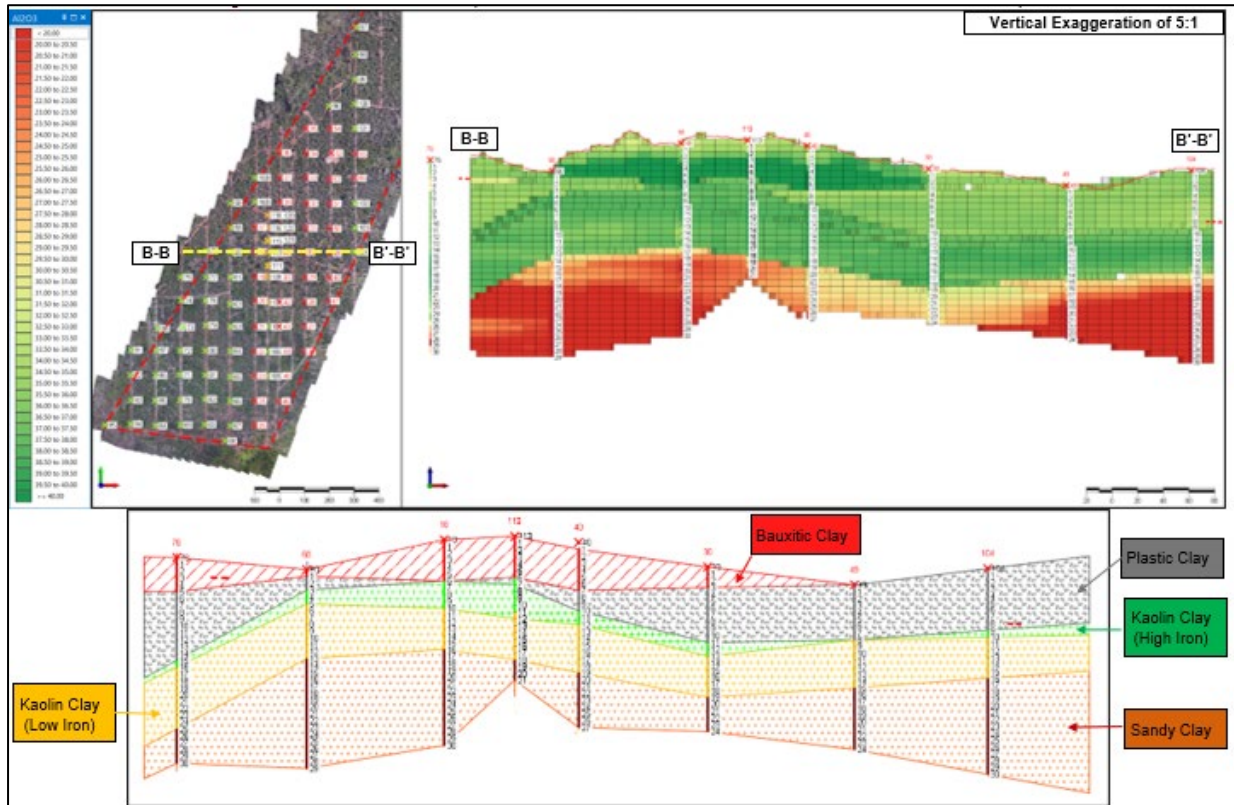
### Estimation

The resource model was created using a parent cell size of 10 m (east-west), 10 m (north-south), and 1 m (vertical), with sub-celling of 1 m by 1 m by 1 m respectively. Ausrocks estimated all analysed elements by OK using the variography completed for  $Al_2O_3$ . An Inverse Distance Weighted (IDW) estimate was also completed and used as a check of the OK model.

**Figure 5** presents a cross section through the deposit illustrating the drillholes, geological interpretation, and  $Al_2O_3$  grade distribution as modelled by Ausrocks.

### Validation

Ausrocks validated the model by visually assessing drillhole grades against the estimated model grades, and by preparing Swath plots of the drillhole data and block model for  $Al_2O_3$ ,  $Fe_2O_3$ ,  $SiO_2$ ,  $TiO_2$ , and LOI grades, which showed sufficient spatial correlation between estimates and input drillhole grades. Ausrocks also compared the OK estimate with the IDW estimate.



(source: Ausrocks, 2022)

**Figure 5: East-west section showing estimation of  $Al_2O_3$  grade in the centre of the deposit**

### Classification

Resource classification used the following criteria:

- Measured Resource: Drillholes had to show geological continuity between gridded drillholes with a confirmatory spacing (100 m x 100 m with infill holes with a minimum of one hole drilled within each 4 x 100 m drillhole 'square').
- Indicated Resource: Drillholes had to show geological continuity between gridded drillholes with a spacing of 100 m x 100 m.
- Inferred Resource: Drillholes had to show geological continuity between gridded drillholes with a spacing of 100 m x 100 m but where there was limited cross sectional control (only 2 or 3 drillholes in cross section).

A plan showing the Resource classification is presented in **Appendix 7**.

### DBD Assumptions

For the 2022 estimate, Ausrocks used DBD estimates of 2.05 t/m<sup>3</sup> for bauxitic clay, 1.74 t/m<sup>3</sup> for plastic clay and kaolinite clay, and 1.69 t/m<sup>3</sup> for sandy clay.

### Modifying Factors

The Competent Person for the 2022 Mineral Resource estimate reviewed the clay characterisation studies completed to date, as well as potential mining, processing, and marketing options to demonstrate that there are reasonable prospects for eventual economic extraction.

The Mineral Resource was reported using the cut-off criterion of 23% Al<sub>2</sub>O<sub>3</sub> for the sandy clay horizon and 32% Al<sub>2</sub>O<sub>3</sub> for the kaolinite clay. No cut-off was used for the remaining two clay horizons after considering plausible mining, processing, and economic parameters.

### Updated June 2025 Mineral Resource Estimate

The 2022 MRE was externally reviewed in 2022 when Zeotech engaged Derisk to prepare an Independent Technical Specialist Report of the Project. Derisk identified a key limitation in the 2022 MRE, namely the insufficient spatial and vertical distribution of dry bulk density (DBD) measurements across the deposit.

In response, Zeotech completed the 2025 DBD measurement program to rectify the lack of measurements identified by Derisk. The rationale for updating the previous 2022 MRE to the June 2025 MRE for the Toondoon Kaolin Deposit is grounded in several key technical and methodological improvements following data obtained from the 2025 drilling program.

A comprehensive commentary that presents the rationale is detailed in **Table 4**.

**Table 4: Rationale for Updating the JORC Mineral Resource Estimate**

Category	2022 Estimate (Previous)	June 2025 Update (Current)	Rationale for Update
<b>Dry Bulk Density (DBD)</b>	Based on 10 grab samples from the surface and trenches	Based on 2025 core drilling, lab testing, and multiple measurement methods	The 2022 estimate used limited and potentially unrepresentative DBD data. The 2025 update incorporates more robust and spatially distributed DBD measurements, improving accuracy.
<b>Sampling Methodology</b>	Air-core and RC drilling (2021)	Additional large diameter 4C core drilling (2025).  A total of 117 drill holes comprising: 94 air-core holes, 16 reverse circulation (RC) holes, and 7 large-diameter 4C core holes	Core drilling enabled direct measurement of DBD and geotechnical properties of varying ground conditions, enhancing confidence in resource estimation.
<b>DBD Values Used</b>	Bauxitic: 2.05 t/m <sup>3</sup> Plastic: 1.74 t/m <sup>3</sup> Kaolinite: 1.74 t/m <sup>3</sup> Sandy: 1.69 t/m <sup>3</sup>	Bauxitic: 1.66 t/m <sup>3</sup> Plastic: 1.46 t/m <sup>3</sup> Kaolinite (High Fe): 1.42 t/m <sup>3</sup> Kaolinite (Low Fe): 1.44 t/m <sup>3</sup> Sandy: 1.65 t/m <sup>3</sup>	Revised values reflect more accurate in-situ densities, reducing the risk of over or under-estimation of tonnage.
<b>QA/QC Protocols</b>	Field duplicates and standards; no blanks or umpire lab checks	Same protocols, but with additional DBD QA/QC	Reinforces data integrity; however, future updates may benefit from blanks and umpire lab checks.
<b>Mineral Resource Classification</b>	Measured, Indicated, Inferred	No change	The updated DBD data supports the classification confidence, particularly for Measured Resources.
<b>External Review</b>	Derisk (2022): DBD identified as a moderate risk	Addressed in the 2025 update	The update directly responds to Derisk's recommendation, strengthening the technical robustness of the Resource.

<b>Estimation Methodology</b>	Ordinary Kriging (OK) with IDW checks	Same volumes retained, but new DBDs applied	Estimation method remains valid; update focuses on input data quality, not algorithmic changes.
<b>Cut-off Grades</b>	32% Al <sub>2</sub> O <sub>3</sub> for kaolinitic / plastic / bauxitic clays  23% Al <sub>2</sub> O <sub>3</sub> for sandy clay	No change	Cut-offs remain appropriate based on processing and economic considerations.

Further details regarding the drilling, sampling, assaying, estimation methodology, and classification criteria used in the June 2025 Mineral Resource Estimate are provided in **Appendix 3 – JORC Code 2012 Edition Table 1**.

Zeotech has prepared an updated (June 2025) MRE for the Toondoon Kaolin Deposit as part of the PFS. The Competent Person for the Mineral Resource estimate has reviewed the data from both 2022 and 2025 and has concluded that revised DBD estimates of 1.66 t/m<sup>3</sup> for bauxitic clay, 1.46 t/m<sup>3</sup> for plastic clay, 1.42 t/m<sup>3</sup> for high iron kaolinitic clay, 1.44 t/m<sup>3</sup> for low iron kaolinitic clay, and 1.65 t/m<sup>3</sup> for sandy clay should be used for reporting an updated MRE.

The June 2025 MRE supports a 20-year LOM and underpins the Project's production targets. The June 2025 MRE updates the 2022 MRE, has been prepared in accordance with the JORC Code (2012), and incorporates new drilling and the DBD data collected in 2025.

#### Comparison of June 2025 Mineral Resource Estimate with 2022 Mineral Resource Estimate

A comparison of the Measured, Indicated and Inferred Resources reported in the June 2025 MRE for the Toondoon Area incorporating the new drilling data and revised DBD measurements of the various ore types is presented in **Table 5**. All other aspects of the 2022 MRE prepared by Ausrocks remain unchanged.

**Table 5: Comparison of Updated Mineral Resource Estimate**

Resource Category	Lithology	Volume (Mm <sup>3</sup> )	Current 2022 MRE		Updated 2025 MRE		Change
			Density (t/m <sup>3</sup> )	Tonnes (Mt)	Density (t/m <sup>3</sup> )	Tonnes (Mt)	Tonnes (Mt)
Measured	Bauxitic Clay	0.75	2.05	1.53	1.66	1.25	(0.29)
Measured	Plastic Clay	1.38	1.74	2.40	1.46	2.01	(0.39)
Measured	Kaolinite Clay (High Iron)	0.51	1.74	0.88	1.42	0.72	(0.16)
Measured	Kaolinite Clay (Low Iron)	0.90	1.74	1.57	1.44	1.30	(0.27)
Measured	Sandy Clay	0.80	1.69	1.35	1.65	1.32	(0.03)
<b>Measured</b>	<b>Total</b>			<b>7.73</b>		<b>6.60</b>	<b>(1.13)</b>
Indicated	Bauxitic Clay	1.51	2.05	3.09	1.66	2.51	(0.58)
Indicated	Plastic Clay	2.62	1.74	4.56	1.46	3.83	(0.73)
Indicated	Kaolinite Clay (High Iron)	0.95	1.74	1.66	1.42	1.35	(0.31)
Indicated	Kaolinite Clay (Low Iron)	1.15	1.74	1.99	1.44	1.66	(0.33)
Indicated	Sandy Clay	1.46	1.69	2.46	1.65	2.41	(0.05)
<b>Indicated</b>	<b>Total</b>			<b>13.76</b>		<b>11.75</b>	<b>(2.01)</b>
Inferred	Bauxitic Clay	0.48	2.05	0.99	1.66	0.80	(0.19)
Inferred	Plastic Clay	0.51	1.74	0.89	1.46	0.74	(0.15)
Inferred	Kaolinite Clay (High Iron)	0.11	1.74	0.19	1.42	0.16	(0.03)

Inferred	Sandy Clay	0.19	1.69	0.33	1.65	0.31	(0.02)
<b>Inferred</b>	<b>Total</b>			<b>2.40</b>		<b>2.01</b>	<b>(0.39)</b>
<b>All</b>	<b>Total</b>			<b>23.89</b>		<b>20.36</b>	<b>(3.53)</b>

The updated June 2025 MRE has significantly increased the confidence in the Resource, and importantly, supports the projected 20-year LOM for the AusPozz™ Project. A complete updated June 2025 MRE is included in **Appendix 5** and summarised in **Table 6**.

### June 2025 Mineral Resource Estimate

**Table 6** provides a summary of the updated June 2025 MRE for the five clay profiles across Measured, Indicated and Inferred Resources of 20.36 Mt.

**Table 6: Summary of total Mineral Resource Estimate as at June 2025**

Lithology	Resource Category	Tonnes (Mt)	Al <sub>2</sub> O <sub>3</sub> (%)	Fe <sub>2</sub> O <sub>3</sub> (%)	SiO <sub>2</sub> (%)	TiO <sub>2</sub> (%)	K <sub>2</sub> O (%)	LOI (%)
Bauxitic clay	All	4.55	36.42	17.52	22.40	4.11	0.05	18.86
Plastic clay	All	6.58	35.17	5.00	41.91	3.27	0.03	14.02
Kaolinite clay (high iron)	All	2.23	36.46	2.45	45.05	1.93	0.08	13.51
Kaolinite clay (low iron)	All	2.95	37.53	0.40	46.46	1.58	0.12	13.42
Sandy clay	All	4.04	26.48	0.86	61.53	1.21	0.05	9.41
<b>TOTAL</b>	<b>All</b>	<b>20.36</b>						

The updated June 2025 MRE that supports the LOM production schedule for the Project includes Measured and Indicated Resource categories only, for plastic, high-iron and low-iron kaolinite clays with high alumina content (35-38% Al<sub>2</sub>O<sub>3</sub>) and low impurities, as shown in **Table 7**.

**Table 7: Subset of Mineral Resource as at June 2025 for Plastic Clay and Kaolinite Clays only**

Lithology	Resource Category	Tonnes (Mt)	Al <sub>2</sub> O <sub>3</sub> (%)	Fe <sub>2</sub> O <sub>3</sub> (%)	SiO <sub>2</sub> (%)	TiO <sub>2</sub> (%)	K <sub>2</sub> O (%)	LOI (%)
Plastic clay	Meas., Ind.	5.84	35.30	4.89	41.85	3.23	0.03	14.11
Kaolinite clay (high iron)	Meas., Ind.	2.07	36.59	2.18	45.13	1.97	0.07	13.54
Kaolinite clay (low iron)	Meas., Ind.	2.95	37.53	0.40	46.46	1.58	0.12	13.42
<b>TOTAL</b>		<b>10.87</b>						

### Summary

The update from the 2022 MRE to the June 2025 MRE was driven by the need to improve the accuracy and reliability of the tonnage and grade estimates, particularly through enhanced DBD data. The 2025 drilling campaign provided core samples that enabled direct DBD testing using three different types of measurements, revealing that previous estimates were likely overestimated due to reliance on surface grab samples.

This update aligns with best practices in resource estimation and directly addresses concerns raised in the 2022 external review. The improved data quality supports the continued classification of resources into Measured, Indicated, and Inferred categories, providing a more defensible basis for future mine planning and feasibility studies.

## 5. Environment

Environmental context, regulatory requirements, and potential impacts associated with the Project were considered for the Toondoon Mine Site and the proposed AusPozz™ Manufacturing Facility at the Port of Bundaberg.

### Environmental Approvals

- The Toondoon Mine Site currently operates under a Standard Environmental Authority (EA).
- A site-specific EA and Progressive Rehabilitation and Closure Plan (PRCP) will be required as the Project scales.
- The AusPozz™ Manufacturing Facility will require an SDA approval and an EA for Environmentally Relevant Activities (ERAs) such as fuel burning, mineral handling, and crushing.

### Climate and Environmental Setting

- The Project areas have a subtropical climate with distinct wet and dry seasons.
- The Toondoon Area is characterised by gently undulating terrain, low erosion risk, and non-acid forming soils.
- The Port of Bundaberg site is low-lying coastal land, with potential for acid sulphate soils in some areas.

### Flora, Fauna, and Ecology

- The Toondoon Area includes non-remnant vegetation with adjacent remnant ecosystems.
- Several Matters of National and State Environmental Significance (MNES/MSES) have been identified, including threatened species and ecological communities.
- The Port of Bundaberg site is largely cleared but mapped as potential shorebird habitat.
- Groundwater-dependent ecosystems (GDEs) exist near the Mine Site but are not within the ML.

### Hydrology and Water Management

- The Toondoon Mine Site lies within the Burnett River catchment, with no mapped springs or high-risk flood zones within the ML.
- Effective surface and groundwater management will be crucial to prevent contamination and ensure sustainable use.

### Acid and Metalliferous Mine Drainage (AMD)

- A site-specific investigation into AMD potential has been conducted for the Toondoon Area (Arden Group Pty Ltd, 2023).
- The study included the testing of 23 samples (plus two quality control samples), as well as an assessment of the quality characteristics of the topsoil.
- Preliminary results indicate that the risk of AMD is very low. The quality characteristics of the topsoil were assessed as suitable for use in rehabilitation, with no amendments necessary to reach the proposed post-mining land use outcome of native ecosystem.

### Greenhouse Gas Emissions

- Estimated annual emissions: 56,788 tonnes of CO<sub>2</sub>-equivalent (tCO<sub>2</sub>-e), primarily resulting from diesel consumption and natural gas use for calcination.
- Zeotech will report under the National Greenhouse and Energy Reporting (NGER) Act.
- Mitigation strategies applying an “Avoid, Reduce, Substitute” hierarchical framework is planned to be implemented, including for energy efficiency, renewable energy options, and emissions monitoring.

### Potential Environmental Impacts

- Key risks include vegetation clearing, dust and noise, erosion, and water quality impacts.
- Environmental controls will be implemented through design, monitoring, and management plans.

## 6. Community and Stakeholder Engagement

Zeotech has undertaken a comprehensive assessment of community and stakeholder engagement as part of the PFS. This evaluates the social and reputational landscape, identifies key stakeholders, and outlines the Company’s approach to building trust, acceptance, and long-term support for the Project.

The Social and Reputational Risk Assessment (SRRA) conducted for the PFS found no significant indicators of community or stakeholder opposition. There are clear opportunities for Zeotech to align with regional development priorities, particularly those outlined in the NBRC’s Advocacy Plan 2024–2028 and the Bundaberg Regional Council’s (BRC’s) economic development strategies.

Zeotech has proactively engaged with key stakeholders, including:

- Queensland Government Departments of State Development, Infrastructure and Planning (DSDIP) and TMR
- GPC
- NBRC
- Wide Bay Burnett (WBB) Resource Group.

These engagements have been constructive, with strong in-principle support for the Project’s objectives, including the development of the AusPozz™ Manufacturing Facility within the Bundaberg SDA.

The Company has identified potential social risks such as:

- Increased traffic
- Workforce competition
- Housing availability
- Environmental concerns, particularly around dust and land use.

However, these are balanced by significant opportunities, including:

- Local employment
- Supporting local businesses
- Infrastructure upgrades
- Community investment.

Zeotech’s commitment to local procurement, training, and partnerships with educational institutions positions the Project to deliver meaningful regional benefits.

The SRRA also highlights the importance of engagement with Traditional Owners, including the Auburn Hawkwood People, and the need for culturally appropriate heritage management.

Zeotech is well-positioned to build a strong social licence to operate. Through early and ongoing engagement, alignment with regional priorities, and a commitment to responsible development, the Company aims to deliver a project that is not only economically viable but also socially and environmentally sustainable.

## 7. Mining

The Project will mine a shallow, flat-lying high-grade kaolin resource using a conventional open-pit mining operation from the Toondoon Mine Site. The operation is designed for a 20-year LOM, delivering approximately 9.28 million dry tonnes (Mdt) of kaolin ore to the Port of Bundaberg for processing into AusPozz™ or for direct shipping.

### Mineral Resource

June 2025 total Mineral Resource of 20.36 Mt comprise 10.87 Mt of plastic and kaolinite clays classified as Measured and Indicated Resources containing high alumina and low impurities as shown in .

Importantly, the Mine schedule is based solely on Measured and Indicated Resources. Inferred Mineral Resources were excluded from the production target and do not contribute materially to the Project economics or viability (refer to **Appendix 6** for further details).

The rationale for updating the previous 2022 JORC Mineral Resource estimate for the Toondoon Kaolin Deposit is outlined in **Section 4 - Table 4**.

### Product Streams

There are three mine product streams with the following production across the LOM:

• Kaolin DSO (low-iron):	2.87 Mt <sub>dry</sub> .
• Cosmetic Kaolin DSO (high-iron):	0.18 Mt <sub>dry</sub> .
• AusPozz™ Feed	6.23 Mt <sub>dry</sub> (74% plastic clay, 26% high-iron clay).
<b>Total</b>	<b>9.28 Mt<sub>dry</sub></b>

### Mine Design

- Based on the Mine design the final pit will be approximately 2,000 m long by 600 m wide with a maximum depth of 30 m.
- Pit optimisation was undertaken to reflect the production schedule and feedstock constraints.
- Conservative slope angles (18°–26°) with staged development.
- No drilling or blasting required; ore is ripped and loaded using graders and front-end loaders (FELs).

### Operations

- Mining is scheduled to start in Q1 2026.
- Initial production focuses on Kaolin DSO and Cosmetic Kaolin DSO, and AusPozz™ kaolin ore feed stockpiled until AusPozz™ Manufacturing Facility commissioning.
- Dry hire model assumed for equipment; eight site personnel at full operations required, excluding haulage and maintenance contractors.

### Environmental & Regulatory

- Progressive backfilling and revegetation with rehabilitation integrated into operations.
- First rehabilitated area to be returned to grazing within 18 months.
- Site-specific EA to be obtained as the project scales.

### Infrastructure

- Mine services compound includes a weighbridge, on-site laboratory, workshop, and utilities.
- New access roads and upgrades to Jankes and Myola Roads are planned.

## 8. Processing Testwork and Ore Characterisation

Comprehensive testwork and analysis were undertaken to validate the suitability of Toondoon kaolin clays for producing Kaolin DSO, Cosmetic Kaolin DSO, and AusPozz™ products. The PFS outlines the mineralogical and chemical characteristics of the resource, the results of extensive laboratory and pilot-scale testwork, and the rationale behind the selected processing technologies.

### Ore Characterisation

- Three primary kaolin domains (plastic clay, high-iron kaolinite, low-iron kaolinite) contain >90% kaolinite. This is an improvement on the previously reported kaolinite content of between 80-90%<sup>13</sup>.
- The justification for updating the kaolinite content in Toondoon ore clays to >90%, in accordance with JORC (2012) guidelines, is based on a more accurate understanding of thermal analysis data presented in the CQU report<sup>14</sup>, coupled with additional methods of indirectly determining kaolinite content based on mineralogical and chemical data completed for the PFS<sup>15</sup>.
- A comprehensive rationale supporting this update is presented in **Appendix 4**.
- Updated 2025 DBD and moisture data confirm suitability for processing and transport.
- The low-iron kaolinite is suitable for high-value DSO markets (e.g., ceramics, paints, catalysts), high-purity high-iron kaolinite with light-pink colouring is suitable for the high-value DSO cosmetics market.
- The plastic and high-iron kaolinite clays have high alumina content of >35% Al<sub>2</sub>O<sub>3</sub>, iron content <5% Fe<sub>2</sub>O<sub>3</sub> and low quartz impurities, making them ideal for calcination and conversion into high-reactivity metakaolin.
- These kaolinite clays are targeted for AusPozz™ production due to their excellent pozzolanic reactivity when converted into metakaolin.<sup>13</sup>

### AusPozz™ Production

- Testwork conducted by Central Queensland University (CQU)<sup>13</sup> and pilot-scale production runs have confirmed that Toondoon kaolins can be effectively calcined at 700–800°C to produce metakaolin with superior reactivity.

<sup>13</sup> ASX Announcement 22/04/2024 “High Reactivity Metakaolin to Advance Low Carbon Cement”

<sup>14</sup> “Investigation into the suitability of natural clays from Central South Queensland, Australia, deposits as supplementary cementitious material”. Central Queensland University (2024)

<sup>15</sup> Zeotech Limited (2024). Summary of tests available. Confidential.

### AusPozz™ Product Performance

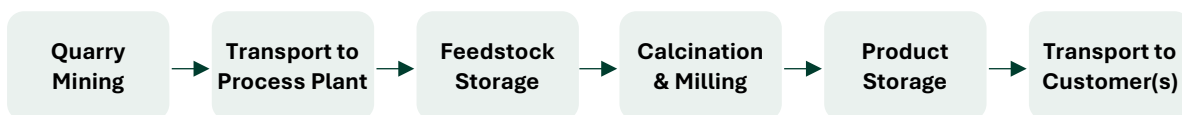
- Mortar and concrete trials<sup>16</sup> demonstrated that AusPozz™ significantly enhances compressive strength, reduces shrinkage, and improves durability compared to traditional SCMs like Fly Ash and Silica Fume.
- AusPozz™ meets AS 3582.4:2022 standards for manufactured pozzolans<sup>13</sup>.
- AusPozz™ gives typical Modified Chapelle Test results<sup>17</sup> of 1,350 mg Ca(OH)<sub>2</sub>/g, indicating high pozzolanic reactivity.

### AusPozz™ Concrete Testing and Applications

- AusPozz™ demonstrated superior strength, reduced shrinkage, and early strength gain suitable for general concrete, shotcrete, precast, and large-volume pours (e.g., wind turbine bases) applications<sup>18</sup>.
- Early strength gain and reduced thermal differential (cracking risk) support the use of AusPozz™ in demanding infrastructure projects.

### Process Flowsheet

- The process flowsheet for AusPozz™ production includes mining, transport to the Port of Bundaberg, feed storage, feed preparation, calcination, milling, and packaging or bulk storage ready for transport to the customer (**Figure 6**).



**Figure 6: Simplified Flowsheet for Processing Toondoon Kaolin to AusPozz™**

### Processing Technology Selection

- The PFS supports the use of a rotary kiln for drying and calcination.
- Rotary kiln technology was selected over flash calcination for industrial cost, low process complexity, reliability, ease of operation, and proven performance, due to compatibility with the kaolin's moisture content and particle size characteristics.
- A vertical roller mill (VRM) was chosen for energy-efficient post-calcination grinding and resultant product quality to achieve target particle size distribution (D<sub>50</sub>) of 20 microns.

## 9. Mineral Processing and Plant Engineering

The AusPozz™ Manufacturing Facility is proposed to have a nameplate capacity of 300,000 dtpa production output of AusPozz™ (Train 300) from kaolin ore feed, sourced from the Toondoon Mine Site. Train 300 is intended to enter full production in Q1 2029.

In the PFS design, 220,000 dtpa AusPozz™ is sold to customers in bulk, and 80,000 dtpa AusPozz™ is sold to customers in 1t bulk bags.

The front-end calcination operation is expected to run continuously, achieving 8,040 operational hours annually with an availability of 92%. The milling circuit is expected to operate slightly less, with 7,600 hours per year, reflecting an availability of 87%.

<sup>16</sup> ASX announcement 15/04/2025 "Outstanding AusPozz Performance Independent Concrete Trials"

<sup>17</sup> Zeotech in-house lab analysis

<sup>18</sup> ASX announcement 23/04/2025 "Maiden AusPozz Commercial-Scale Concrete Demo Trial"

Intermediate storage has been integrated into the process design between the calcination and milling circuits to manage the difference in availability.

The AusPozz™ product bagging operations are scheduled to be conducted five days per week. AusPozz™ bulk product can be continually transferred to bulk storage, with shipments anticipated monthly.

Items of note for the AusPozz™ Manufacturing Facility covered in the PFS are:

- **Project Design Criteria:** Contains key project and process design parameters for the conversion of kaolin ore to AusPozz™.
- **Process Flow Diagrams:** Includes the end-to-end process and material flows, and major equipment items and packages.
- **Mass Balance:** Key process streams and utilities.
- **Detailed Equipment List:** Name and type of equipment itemised with key properties such as capacities, flow rates, dimensions, installed motor power, fixed or variable speed drive and type, draw, and costs through vendor and consultant engagement.
- **Key Equipment:**
  - Kaolin feed and preparation.
  - Rotary kiln for drying and calcination.
  - Rotary cooler.
  - VRM circuit.
  - Baghouses for off-gas dust removal and recovery.
- **Product storage and dispatch:**
  - Bagging in 1t bulk bags for truck dispatch.
  - Bulk storage and ship loading.
- **Environmental Controls:**
  - Dust collection.
  - Compliance with emissions standards.

The process plant operation can be summarised by the following sequential activities:

#### 1. Ore Receival, Handling & Storage

Kaolin ore (plastic clay and high-iron kaolinite) is delivered via side or rear-tipping B-double trucks. A front-end loader (FEL) places the ore into one of two stockpiles based on type. Stockpiles are designed to hold at least seven days of production feed.

#### 2. Feed Preparation

Blending of the two kaolin types is controlled by the feed ratio into the feed bins.

#### 3. Drying & Calcination

Kaolin is dried and calcined in a single natural gas rotary kiln. Calcination (700–800°C) removes crystallisation water from kaolinite and converts it to metakaolin. Tail gases flow counter-currently to dry the production feed.

#### 4. Cooling

The product is cooled in a rotating drum using ambient air and lifting flights to enhance heat transfer.

#### 5. Intermediate Storage

Silos provide up to three days of buffer storage.

#### 6. Milling

Coarse AusPozz™ is ground in a VRM to a D<sub>50</sub> particle size of 20 microns.

## 7. Product Recovery & Dust Collection

Three baghouse systems recover product and control dust at the kiln feed, cooler, and milling circuit.

## 8. Packaging & Dispatch

Final product is transferred to a silo for bagging or bulk storage. It can then be dispatched in bulk bags, shipped in bulk, or transferred to dry bulk tankers for customer delivery.

The process plant operation would be supported by services including:

- Fire-fighting water storage tank, pumps, piping, and fixtures.
- Potable water supply/storage for human use, safety showers, truck washing, and process water.
- Natural gas to fuel the kiln burners.
- Compressed air for both process needs and instrumentation.
- Reticulated low-voltage and high-voltage electricity to power equipment and buildings.
- On-site diesel refuelling truck for on-site mobile equipment and vehicles.

# 10. Infrastructure and Services

## Scalable Production

The proposed 300,000 dtpa nameplate capacity AusPozz™ Manufacturing Facility at the Port of Bundaberg is well-supported by infrastructure, logistics, and utilities, with potential for future expansion.

## AusPozz™ Manufacturing Facility Area Location

The AusPozz™ Manufacturing Facility is proposed to be located at the Port of Bundaberg on Queensland Government SDA land, across the road from the Bundaberg Bulk Sugar Terminal, including Sugar Storage Sheds and Ship Loading Facilities (**Figure 7**).

The Port of Bundaberg location was selected for access to utilities (gas, power, water), labour, and export infrastructure. There is access to a shared multi-use conveyor (MUC) owned and operated by Sugar Terminals Limited (STL) for bulk ship loading of Kaolin DSO and AusPozz™ for export. The Facility Area is serviced by BRC-controlled roads within the Port of Bundaberg that connect to the TMR-controlled roads route from the Toondoon Mine Site.

## Facility Area Site Layout

The Facility Site Layout at the Port of Bundaberg location (refer to **Figure 8**) incorporates the kaolin ore stockpiles, Train 300 processing train (calcination, intermediate storage and milling), bagging shed, truck loading silo (back-up transport), transfer storage silo, bulk product storage, administration and laboratory building, workshop, roads, weighbridge, truck wash, and utilities.



Figure 7: Proposed AusPozz™ Manufacturing Facility Area at the Port of Bundaberg

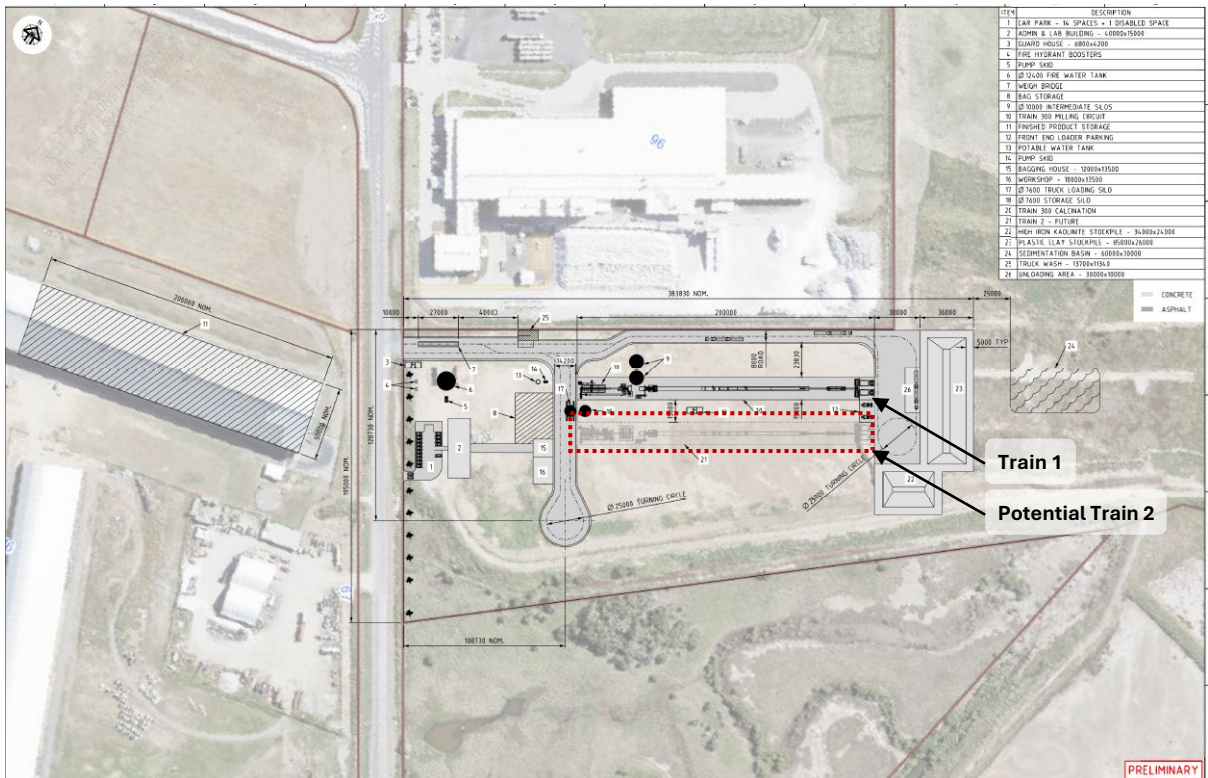


Figure 8: Proposed AusPozz™ Manufacturing Facility Area Site Layout

### Facility Utilities

Utilities services to meet the AusPozz™ Manufacturing Facility requirements have been assessed. State Government support has been provided for the following utilities required by Zeotech for operations of the Facility in the SDA at the Port of Bundaberg:

- **Gas:** Zeotech, supported by State Government Development, is in discussions with Jemena (Queensland Gas Pipeline) and AGIG (Wide Bay Pipeline and Port of Bundaberg Pipeline) regarding the expansion of the gas infrastructure needed to meet the requirements of Train 300 and potential future train expansion requirements of the Facility.
- **Electricity:** Ergon Energy is the provider to the Port of Bundaberg, and a major customer connection will be required by Zeotech for the Facility.
- **Water:** Potable water supply to the Port of Bundaberg is by the BRC, and there is potential to utilise irrigation water supplied by SunWater.

## 11. Administration and Workforce

Zeotech prioritises local employment at both the AusPozz™ Manufacturing Facility and the Toondoon Mine Site, with a focus on Work, Health and Safety and Fair Work legislation.

The Project represents a significant stable employment opportunity, especially for regional manufacturing in Bundaberg, which traditionally experiences seasonal fluctuations.

At full operation, it is proposed that 52 personnel will be employed at the Facility and 21 personnel will be employed at the Mine Site. Additionally, 56 contracted haulage personnel are proposed for logistics.

There are expected to be 12 full-time equivalent supporting corporate and administration personnel employed by Zeotech at the Port of Bundaberg and Brisbane Technology Park head office.

Zeotech emphasises inclusive recruitment and training programs.

The Company proposes to outsource mining and haulage operations with dry hire and full-service options considered.

## 12. Logistics

### Transport Model

The Transport Model for the Project involves transporting all kaolin ore and bagged Cosmetic Kaolin DSO approximately 260 km from the Toondoon Mine Site to the AusPozz™ Manufacturing Facility at the Port of Bundaberg.

### Product Flow

- Kaolin DSO is delivered to the Port of Bundaberg, stockpiled, and exported via the MUC.
- Cosmetic Kaolin DSO is bagged at the Toondoon Mine Site, delivered to the Facility, and containerised for shipping.
- AusPozz™ kaolin ore feed is delivered to the Facility and stockpiled for processing.

### Port Infrastructure

- Kaolin DSO stockyard adjacent to MUC.

- AusPozz™ stored in bulk storage for bulk shipping.
- AusPozz™ bagged for containerised shipping to customers and for further milling into AusPozz™ Max.

#### Haulage

- Heavy-haulage approved (TMR) for Class 10 B-double trucks on state-controlled roads from the Mine Site to the Facility.
- Road use contributions payable to TMR based on trucking volumes.
- Upgrades required for NBRC local-government roads and road infrastructure, including Toondoon Mine Site access.

### 13. Marketing

Zeotech has secured early commercial interest, validated through MOUs with major industry players, including Holcim Australia for AusPozz™ and MSI China for Kaolin DSO and Cosmetic Kaolin DSO. The Company has identified and is engaging with multiple domestic and international sales opportunities across various product lines, as summarised in **Table 8**.

AusPozz™ users consist of a tiered structure (Tier 1 and Tier 2, as outlined below) based on the position of the targeted cement producer/supplier customers in the building and construction industry supply chain and their potential offtake volumes.

- Tier 1 – major cement producers/suppliers;
- Tier 2 – companies that buy cement from Tier 1 cement producers/suppliers or import directly from offshore cement producers; and
- Tier 2 – engineering and design companies that play an essential role in specifying AusPozz™ in their concrete mix designs for projects they are involved in. This would oblige concrete supply companies to use AusPozz™ for specific applications in dedicated projects.

**Table 8: Summary of Sales and Specifier Opportunity Pipeline**

Product	Sub-Product	# Opportunities		Comment
		Domestic	Export	
AusPozz™	Tier 1	9	-	8 testing and 1 sample request
	Tier 2	32	4	4 testing and 7 trial requests
	Max	8	5	5 testing and 3 purchase requests
Kaolin	DSO	4	2	All testing and 1 under negotiation
	Cosmetic DSO	-	1	Under negotiation
<b>Total</b>		<b>53</b>	<b>12</b>	

#### Product Portfolio

- Kaolin DSO – High purity, low-iron kaolin for numerous potential applications, including ceramics, coatings, and catalysts.
- Cosmetic Kaolin DSO – High purity, high-iron kaolin with light-pink colouring for cosmetics.
- AusPozz™ – High reactivity metakaolin SCM for concrete and building product applications.
- AusPozz™ Max – Finer, high-performance variant for specialty high-value uses.

### Market Drivers – AusPozz™

- Domestic and global decarbonisation mandates.
- SCM demand due to Fly Ash and Blast Furnace Slag reducing in availability.
- Combination of low embodied carbon and a range of technical advantages when used to produce low-carbon concrete when compared to alternative SCMs.
- Continuing growth in domestic construction, in conjunction with the boom in Asia and, more broadly, infrastructure growth globally.
- Limited access to imported metakaolin to meet growing market demand.
- No current domestic producer/supplier of metakaolin.

### Competitive Advantage – AusPozz™

- High-reactivity metakaolin with proven properties for improving concrete performance.
- Low-cost producer due to relatively high kaolinite content in the raw Toondoon kaolin ore.
- Low carbon footprint due to fewer feed refinements required in processing stages.
- First domestic commercial-scale producer for the Australian market.

### Target Markets

- AusPozz™ into domestic and international cement and concrete producers (Tier 1 and Tier 2 customers).
- AusPozz™ small lots business via appointed distributors.
- Kaolin DSO business into coatings, ceramics, cosmetics, and specialty chemical sectors via mineral traders.

### Pricing & Sales Forecast

Targeted pricing by Zeotech for its product portfolio (**Table 9**) for Kaolin DSO is supported by equivalent commercial product pricing for kaolin and based on the relative high purity of the Toondoon Resource. The Toondoon kaolin characteristics are considered desirable by buyers in an environment where comparable products are becoming increasingly difficult to source.

AusPozz™ product pricing takes into consideration relative tiered cement pricing, technical advantages, and carbon reduction benefits when utilised to produce low-carbon concrete.

**Table 9: AusPozz™ Project Product Targeted Pricing**

Product	Price Range (A\$/t)		Sales Forecast tonnes (p.a.)
	Low	High	
Kaolin DSO (wet tonne)	170	200	158,000
Cosmetic Kaolin DSO (wet tonne)	500	1,000	10,000
AusPozz™ (dry tonne)	315	525	290,000
AusPozz™ Max (dry tonne)	600	1,000	10,000

### Sales Forecast

At full operation, the Project sales target is for 451,000 dtpa across all products.

### Customer Engagement

The PFS summarises MOU discussions and product trials for intended offtake agreements across all products with customers in each target market.

## Life Cycle Analysis

Zeotech engaged Pangolin Associates to conduct a lifecycle analysis (LCA) for AusPozz™. Pangolin uses a science-based approach to assess the environmental aspects and potential impacts of a product, process, or service by:

- Compiling an inventory of relevant energy and material inputs and environmental releases.
- Evaluating the potential environmental impacts of those inputs and releases.
- Interpreting the results to better inform decision-makers and communicate impact.

The goal of this work was to determine the LCA for AusPozz™ when used as a partial replacement for 30% of cement in concrete applications. The conclusions from this work indicate that AusPozz™ has a carbon footprint of approximately 204 kg CO<sub>2</sub>-e, based on the given assumptions. This equates to just over a 20% reduction in the total carbon footprint for 1m<sup>3</sup> of a typical 32MPa concrete where AusPozz™ is used to replace 30% of cement.

A 1-for-1 replacement of cement with the name plate AusPozz™ Manufacturing Facility output of 300,000 dtpa of AusPozz™ has the potential to avoid carbon emissions by an estimated 229,800 tpa.

For the above AusPozz™ calculation this is the equivalent of:

- **Cars Off the Road:** taking about 53,600 petrol-powered cars off the road yearly.
- **Tree Planting:** planting and growing approximately 3.8 million tree seedlings each year for 10 years.
- **Energy Use:** annual carbon emissions from electricity use in over 30,860 homes.

These equivalencies are illustrative only and are based on U.S. average emissions data. Comparisons - such as the number of cars taken off the road, the number of tree seedlings planted, or energy use by homes - can be derived using the [U.S. Environmental Protection Agency's Greenhouse Gas Equivalencies Calculator](#) on the website.

## Next Horizon Product – Zeolites

As outlined in the PFS, the second longer-term stage of the AusPozz™ Project (Horizon 2) involves the development of high-value product streams using metakaolin feed to manufacture zeolite. This aligns with Zeotech's broader mission to deliver innovative solutions that address global sustainability challenges.

Horizon 2 initiatives under advanced development include:

- **zeoteCH<sub>4</sub>®:** A proprietary zeolite-based formulation designed to reduce landfill methane emissions.
- **Animal Feed Additive:** A zeolite-based supplement aimed at preventing subclinical hypocalcemia, also known as milk fever, in cows.

Due to strong perceived market demand for AusPozz™, the full capacity of the initial 300,000 dtpa (Train 300) in the PFS has been fully allocated for potential offtake agreements for SCM applications (Horizon 1).

For this reason, it is proposed that metakaolin required for the commercialisation of zeolite will be catered for in the proposed next AusPozz™ Train (refer to **Figure 8**), which is beyond the scope of the PFS and is planned to be covered in the DFS.

## 14. Financial

The capital and operating cost estimates are presented in Australian dollars (A\$) and are based on prices assessed in Q1 2025. The cost estimates are based on a level of accuracy of +/- 25%. The capital cost estimate for the AusPozz™ Manufacturing Facility has been prepared to a level of completeness and accuracy consistent with an Association for the Advancement of Cost Engineering (AACE) Class 4 estimate.

No allowance for price escalation has been included within the capital cost estimate, as it has been assumed that this will be managed within the current allocated contingency provisions.

An allowance for price escalation of 2.0% per annum has been included in the operating cost estimate. This applies to revenue and all direct operating costs, as well as indirect costs, including mining, transportation, processing, storage, handling, general and administrative costs, and personnel costs.

Price escalation is set at the lower band of the Reserve Bank of Australia's inflation target range of 2% to 3%.

### Capital Cost Estimate

A summary of the PFS total capital cost estimate, including initial capital cost and sustaining capital, is presented in **Table 10**.

**Table 10: Summary of Capital Cost Estimate**

	Year 1 (A\$m)	Year 2 (A\$m)	Year 3 (A\$m)	Initial Capital (A\$m)	Sustaining Capital (A\$m)	LOM Total (A\$m)
Mining & DSO	4.8	2.8	-	7.6	2.7	10.3
AusPozz™	25.5	44.5	25.4	95.5	12.4	107.9
<b>Total (excl. contingency)</b>	<b>30.4</b>	<b>47.4</b>	<b>25.4</b>	<b>103.1</b>	<b>15.1</b>	<b>118.3</b>
Contingency	1.9	5.1	4.7	11.6	2.3	13.9
<b>Total (incl. contingency)</b>	<b>32.3</b>	<b>52.4</b>	<b>30.1</b>	<b>114.8</b>	<b>17.4</b>	<b>132.2</b>

The summary shows total initial capital cost of \$114.8m, including contingency of \$11.6m or 11.3% of the total initial capital cost over the first three years of the Project.

Over the LOM, total capital cost is \$132.2m, including sustaining capital of \$15.1m and total contingency of \$13.9m or 13.5% of LOM capital expenditure.

### Mining & DSO Operations

The mining estimate includes all direct costs for mine development, supporting infrastructure, and indirect costs associated with contractors, the Owner's team, and pre-production operations. Dry-hire mining equipment has been selected for the basis of costing for the PFS as it provides a good first-principles understanding of the mine cost drivers.

The estimate also includes ancillary equipment, such as a service trailer, light vehicles, pumps, lighting, site and services compound accommodation and infrastructure, water and power services.

The estimate includes the cost to form and upgrade local NBRC roads, as well as provide a mine access road to connect the Mine Site with the SCR network.

The estimate includes the Kaolin DSO storage area and the estimated upgrades and infrastructure for stockpiling the ore at a dedicated area adjacent to the MUC at the Port of Bundaberg.

The estimate includes sustaining capital of 3% per year of initial capital expenditure and a contingency of 15%. The total estimate is \$11.9m, including contingency and sustaining capital over LOM.

### AusPozz™ Manufacturing Facility

The estimate has been developed from the following project documentation and other inputs:

- Process Design Criteria and Mass Balance.
- Process flow diagrams.
- Preliminary site layout, general arrangement for major equipment, and non-process infrastructure.
- Mechanical equipment list.
- Vendor budget pricing quotations for major mechanical equipment.
- Material take-offs for:
  - Structural steel and ancillaries.
  - Reinforced concrete.
  - Civil works and bulk earthworks.
- Budget estimates/proposals from various contractors and construction materials suppliers
- Cost estimating database items for contractor bulks, construction materials, and minor equipment items.

The estimated total capital cost for the development of the AusPozz™ Manufacturing Facility is \$106.0m (incl. contingency) as shown in **Table 11**.

**Table 11: Capital Cost Summary – AusPozz™ Manufacturing Facility**

WBS	Area	Cost (A\$m)
<b>Project Direct Costs</b>		
200	Process Plant	54.3
300	Reagents/Fuels/Services	5.0
400	Buildings/User Areas	3.0
<b>Total PFS Project Direct</b>		<b>62.3</b>
<b>Project Indirect Costs</b>		
000	Construction Indirects	16.5
500	Management Costs	9.5
600	Owner's Project Costs	7.2
900	Contingency (11% of Capital Estimate)	10.5
<b>Total PFS Project Indirect Costs</b>		<b>43.7</b>
<b>Total PFS Capital Cost Estimate (excl. contingency)</b>		<b>95.5</b>
<b>Total PFS Capital Cost Estimate (incl. contingency)</b>		<b>106.0</b>

Contingency has been applied on a scale that reflects the relevant risk and the implemented mitigation strategy associated with the estimate component, project activity, or project element. The average contingency for the AusPozz™ Manufacturing Facility capital cost estimate is 11.0%.

### Estimating Methodology

The estimate has been developed with the requirements of an AACE Class 4 estimate as a key consideration. The estimate was completed to determine the expected cost of the Project for the preferred processing flow sheet. It is suitable for a high-level comparison of alternatives, a more detailed economic evaluation, and a basis for further detailed investigation or rejection of the Project.

The estimation methodology involves using major equipment pricing and then factoring in the remaining direct costs, which requires some measurement of quantities. These quantities are estimated from 3D models, drawings, sketches, and similar projects or studies previously undertaken. Equipment pricing has been sourced from known industry suppliers that can potentially service the Project. Bulk material and labour rates are budgetary. Provisions are allowed for areas where further definition was not possible.

### Contracting Strategy

The contracting strategy adopted for the estimate broadly follows an Engineering, Procurement, and Construction Management (EPCM) delivery model and assumes the following approach:

- Major and minor mechanical and electrical equipment is planned to be procured by Zeotech, with the EPCM Contractor acting on the Company's behalf, directly from vendors and free issued to site execution contractors for installation.
- Fabrication contracts are planned to be let by Zeotech, with the EPCM Contractor acting on the Company's behalf, directly with suitable fabricators.
- Site work execution contracts, such as concrete, are planned to be let by Zeotech, with the EPCM Contractor acting on the Company's behalf, directly with suitable contractors based on a 'horizontal' packaging strategy.

### Sustaining capital

An allowance of \$12.4m (excl. contingency) has been made for sustaining capital costs over the operating life of the AusPozz™ Manufacturing Facility of 17 years. Sustaining capital has been assessed at 1% of the total project direct costs. Added to this is the cost to reline the rotary kiln every four years based on vendor advice. This equates to 20.1% of the total project direct costs over the LOM.

A further 15% contingency has been applied to sustaining capital cost.

### Operating Cost Estimate

The operating cost estimate was prepared using the project design criteria, mass balance, equipment list, and input from the PBG cost database. The cost areas include:

- Mining
- Logistics
- Processing, comprising:
  - Labour
  - Natural gas
  - Power
  - Fuel
  - Water
  - Maintenance
  - Consumables, and
  - QA/QC.

- Personnel
- General & Administration

Estimated baseline operating costs for LOM, including contingency allowance, are presented in **Table 12** and includes all direct costs to produce the AusPozz™ range of products, and direct costs to mine, transport, store, and handle DSO products.

Indirect costs include personnel and general & administrative costs such as tenement management, corporate, administration, and sales & marketing.

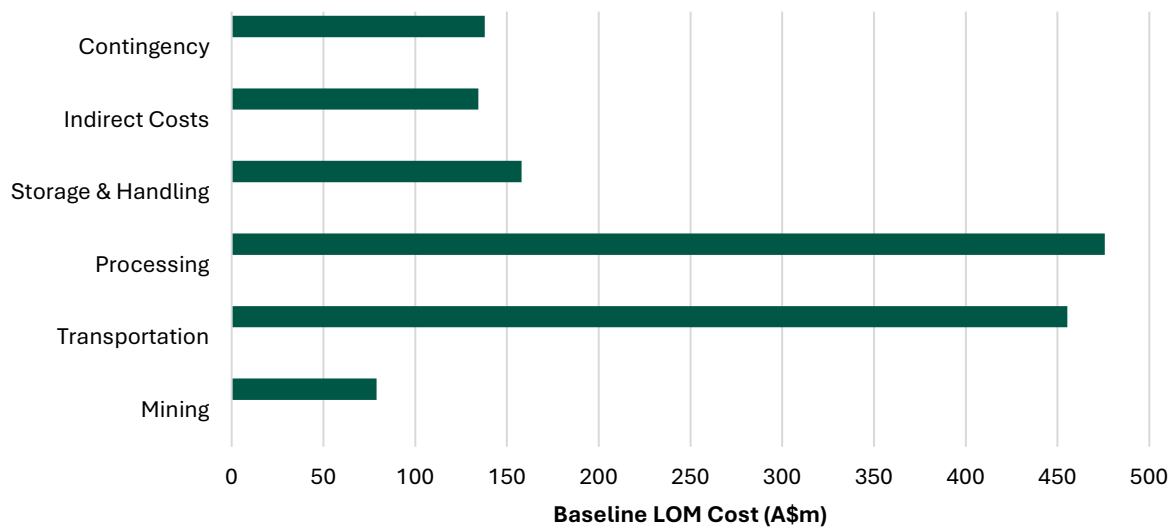
All costs are divided by the 20-year LOM, with the exception of processing costs (AusPozz™ only), which is divided by the approximate operating life of 17 years, to produce the annual average LOM cost.

**Table 12: LOM Baseline Operating Cost Estimate**

Cost Centre	Baseline LOM Operating Cost (A\$m)	Annual Average Operating Cost LOM (A\$m)^	Percentage of Total Cost
<b>Mining</b>	<b>79.0</b>	<b>4.0</b>	<b>5.4%</b>
Mining Cost	38.2	1.9	2.6%
Site Administration	13.0	0.6	0.9%
Royalties	27.9	1.4	1.9%
<b>Transportation</b>	<b>455.3</b>	<b>22.8</b>	<b>31.0%</b>
<b>Processing (AusPozz™ Only)</b>	<b>475.8</b>	<b>27.7</b>	<b>32.4%</b>
Labour	106.5	6.2	7.2%
Natural Gas	246.7	14.4	16.8%
Power	61.5	3.6	4.2%
Fuel	10.3	0.6	0.7%
Water	1.3	0.1	0.1%
Maintenance	32.7	1.9	2.2%
Consumables	15.1	0.9	1.0%
QA/QC	1.7	0.1	0.1%
<b>Storage &amp; Handling</b>	<b>157.9</b>	<b>7.9</b>	<b>10.7%</b>
<b>General &amp; Administration</b>	<b>134.1</b>	<b>6.7</b>	<b>9.1%</b>
Personnel	52.8	2.6	3.6%
General & Administration	81.3	4.1	5.5%
<b>Total (excl. contingency)</b>	<b>1,302.5</b>	<b>69.1</b>	<b>90.4%</b>
Contingency	137.9	7.3	
<b>Total (incl. contingency)</b>	<b>1,440.4</b>	<b>76.4</b>	<b>100.0%</b>

^ The annual average LOM processing cost is divided by approximately 17 years

The total baseline estimate is \$1,440.4m over LOM, excluding escalation, but including a contingency allowance of \$137.9m or an average of 10.6%, as shown in **Table 12** and **Figure 9**.



**Figure 9: Summary of LOM operating cost centres**

### Mining Operating Costs

Mining costs for the Project were estimated based on the mining schedule, assuming a dry hire equipment supply contract. Because of the long project life and simple mining method, it is assumed a mine owner operation with fully maintained dry hire, in which the equipment supplier is responsible for maintenance and availability and is remunerated on an hourly rate usage basis.

Operating costs for grade control, ripping, and load and haul were estimated using equipment operating hours, productivity, labour rates, fuel consumption, maintenance requirements, and consumables.

Total LOM average mine operating costs are \$5.46/t<sub>dry</sub> (excl. contingency) of ore produced.

Mining common and overhead costs include personnel at the Mine Site and the periodic hiring of equipment to support mining activities.

Mining operations are planned to be overseen by a full-time Mine Manager/Site Senior Executive.

### Logistics

Haulage of the ore from the Toondoon Mine Site to the AusPozz™ Manufacturing Facility and DSO Storage Area is intended to be contracted to trucking company(ies). Logistics costs have been developed based on modelling and quotes from the logistics companies following a formal request for quotation (RFQ) process.

### Processing Costs

The Facility operating labour costs were developed from a schedule of required labour prepared by Zeotech in collaboration with vendors and Pitch Black Group (PBG), with costs for each labour resource obtained from industry sources. The costs include the basic salary with a 21.4% payroll burden per position.

The cost of natural gas was evaluated in consultation with two energy providers, and discussions with the gas pipeline owners, Jemena for the Queensland Gas Pipeline (QGP) and Australian Gas Infrastructure Group (AGIG) for the Wide Bay Pipeline (WBP) and Port of Bundaberg Pipeline (PBP). The consumption rate of natural gas is 2.0 GJ/t of metakaolin, advised by equipment vendors based on the proposed plastic clay and high-iron kaolinite AusPozz™ feed blend.

The cost of power was evaluated in consultation with two energy providers. The power demand was derived from the equipment list, based on all normally operating equipment. Allowance was made for absorbed power by applying load factors to the actual installed motor kilowatts.

Maintenance costs for each plant area were estimated as a percentage of the total installed cost, based on complexity, type of equipment, and process conditions in each area. The percentages were sourced from vendors and PBG. The maintenance cost estimate covers lubricants, wear parts, and other smaller replacement items, but excludes parts required for major shutdowns, which are captured under Sustaining Capital.

### Storage & Handling

Storage and handling costs have been developed based on an operating flowsheet and estimated costs using equipment operating hours, productivity, labour rates, conveyor rates, port charges and fuel consumption.

Based on discussions with GPC, costs associated with AusPozz™ and Kaolin DSO storage and handling assume a two-part structure comprising a fixed cost for the storage area, together with a variable cost for in-loading (receiving) and out-loading (dispatching) the products.

### General & Administration

General & Administration (G&A) personnel include all personnel who are not directly involved in operations at the Toondoon Mine Site or AusPozz™ Manufacturing Facility. G&A personnel have been split into three phases:

- **Phase 1 (Year 1)** – DSO operations and AusPozz™ Manufacturing Facility detailed design and procurement.
- **Phase 2 (Year 2-3)** – DSO operations and AusPozz™ Manufacturing Facility construction and commissioning.
- **Phase 3 (Year 4+)** – Operational phase, including DSO and AusPozz™ Manufacturing Facility operations at nameplate capacity.

All personnel costs include a 21.4% payroll burden per position for items such as superannuation, payroll tax, workers' compensation, mental health levy, long service leave, and annual leave loading.

Administration costs for the Project have been developed over the three phases based on past actual expenditure and anticipated future expenditure.

Administration costs include:

- Office administration
- Insurance
- Occupancy costs at Head Office (Brisbane Technology Park) and the proposed AusPozz™ Manufacturing Facility Area
- Corporate costs
- Equipment leasing.

Corporate costs include:

- Legal
- Accounting and audit
- Insurance (Directors & Officers (D&O) insurance)
- Advisory
- Director and secretary fees.

## Contingency

Contingency has been applied on a scale that reflects the relevant risk and the implemented mitigation strategy associated with the cost component. The average contingency applied across the operating cost estimate is 10.6%.

## All-In Sustaining Cost

All-In Sustaining Cost (AISC) has been developed to provide a transparent measure of the total cost of producing the Project's AusPozz™, Kaolin DSO, and Cosmetic Kaolin DSO products. Kaolin DSO and Cosmetic Kaolin DSO are grouped as 'DSO' products. AusPozz™ is differentiated into 'bulk' and 'bagged' products, based on separate flowsheets and operating expenditures.

AISC encompasses all mining costs, including site administration, royalty payments, and progressive rehabilitation. All processing, storage, and handling costs are included, and common costs are apportioned between bulk and bagged products based on production volumes.

The AISC (including contingency) for Kaolin DSO and Cosmetic Kaolin DSO products is \$105.30/t<sub>dry</sub>. AusPozz™ bulk product has an AISC of \$224.80/t<sub>dry</sub> and AusPozz™ bagged product has an AISC of \$231.60/t<sub>dry</sub>.

## Financial Modelling

### Revenue

Revenue for the AusPozz™ Project is modelled from two core product streams:

- AusPozz™ products; and
- DSO products – Kaolin DSO and Cosmetic Kaolin DSO.

**Table 13** outlines the projected volumes over LOM based on dry metric tonnes of product sold, noting that DSO products are sold on a wet-basis with an assumed 10% moisture content.

The Project assumes that for years 1-3 inclusive, only DSO products will be sold. During this time, the AusPozz™ Manufacturing Facility is being constructed and commissioned, with a forecasted production ramp-up scheduled for Q4 of Year 3. From Year 4 onwards, it is assumed that all nameplate production capacity is sold over the remaining 17 years of the Project.

**Table 13: Target Product Volume Summary**

Product	UOM	Year 1	Year 2	Year 3	Year 4+	LOM
AusPozz™ Bulk – Tier 1	kt <sub>dry</sub>	-	-	25	150	2,575
AusPozz™ Bulk – Tier 2	kt <sub>dry</sub>	-	-	12	70	1,202
AusPozz™ Bulka Bag	kt <sub>dry</sub>	-	-	12	70	1,202
AusPozz™ Max	kt <sub>dry</sub>	-	-	2	10	172
Kaolin DSO	kt <sub>dry</sub>	142	142	142	142	2,840
Cosmetic Kaolin DSO	kt <sub>dry</sub>	9	9	9	9	180
<b>Total</b>	<b>kt<sub>dry</sub></b>	<b>151</b>	<b>151</b>	<b>201</b>	<b>451</b>	<b>8,170</b>

Target product pricing has been determined based on Zeotech's substantial experience in industrial minerals products, combined with market research, in-depth and ongoing discussions with industry stakeholders, industry peak bodies, and findings developed in the PFS. **Table 14** provides a summary of the weighted average sale price adopted in the financial model.

**Table 14: Target Product Pricing Summary**

Product	UOM	Weighted Average Sale Price (WASP) (A\$/t)
AusPozz™ products	A\$/t <sub>dry</sub>	403
DSO products	A\$/t <sub>wet</sub>	196

### Financial Summary

The Project's base case financial assessment has been modelled using the aforementioned capital costs, operating cost estimates, production volumes, and sales prices. The Project's NPV is derived on an after-royalty, and after-tax cashflow at a discount rate of 8.0%.

The financial assessment incorporates the updated Mineral Resource Estimate and a LOM of 20 years.

Key financial parameters are presented in **Table 15**. The financial assessment demonstrates that the Project is economically viable and delivers a strong business case. The after-tax NPV<sub>8</sub> is \$406m and after-tax IRR is 42%, with a payback period of the initial capital cost of 2.1 years.

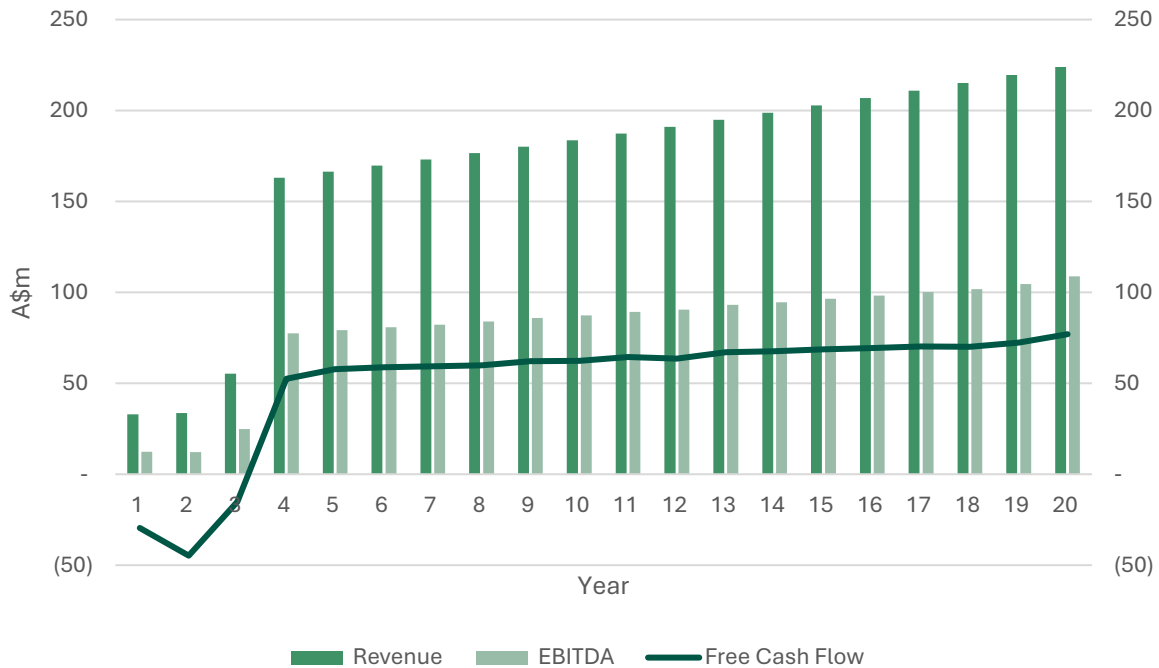
**Table 15: Key Financial Parameters**

Financial Metrics		Total LOM	
		pre-tax	after-tax
Revenue	A\$m	3,385	
EBITDA	A\$m	1,604	
Initial Capital Cost	A\$m	115	
Capital Requirement (indicative)	A\$m	95	
Sustaining Capital	A\$m	17	
Net Cashflow	A\$m	1,455	1,014
NPV <sub>8</sub>	A\$m	548	406
IRR	%	56	42
Payback Period <sup>19</sup>	Years	2.1	

Project generates profit and positive cashflow from operations from Year 1 from Kaolin DSO and Cosmetic Kaolin DSO operations, as shown in **Figure 10**. This supports a lower estimated initial capital requirement of \$95m, including all working capital needs associated with the Project.

The Project would provide an undiscounted net operating cashflow of \$1,014m over the LOM. Results are reported on a pre-tax and after-tax basis, noting that the Company has \$37.6m of accumulated losses to 30 June 2024, reducing taxes payable on future profits, subject to normal tax rules associated with carry-forward losses.

<sup>19</sup> Payback period is calculated by dividing total Initial Capital Cost by free cashflow after AusPozz™ Manufacturing Facility is commissioned



**Figure 10: Summary of Revenue, EBITDA and Free Cashflow over the life of the Project**

### Sensitivity Analysis

The impact of several key financial parameters has been modelled to evaluate their effect on Project value and rate of return. The analysis demonstrates that the Project is resilient with expected sensitivity to sales price and operating cost, but highlights the potential opportunities and upside the Project could deliver.

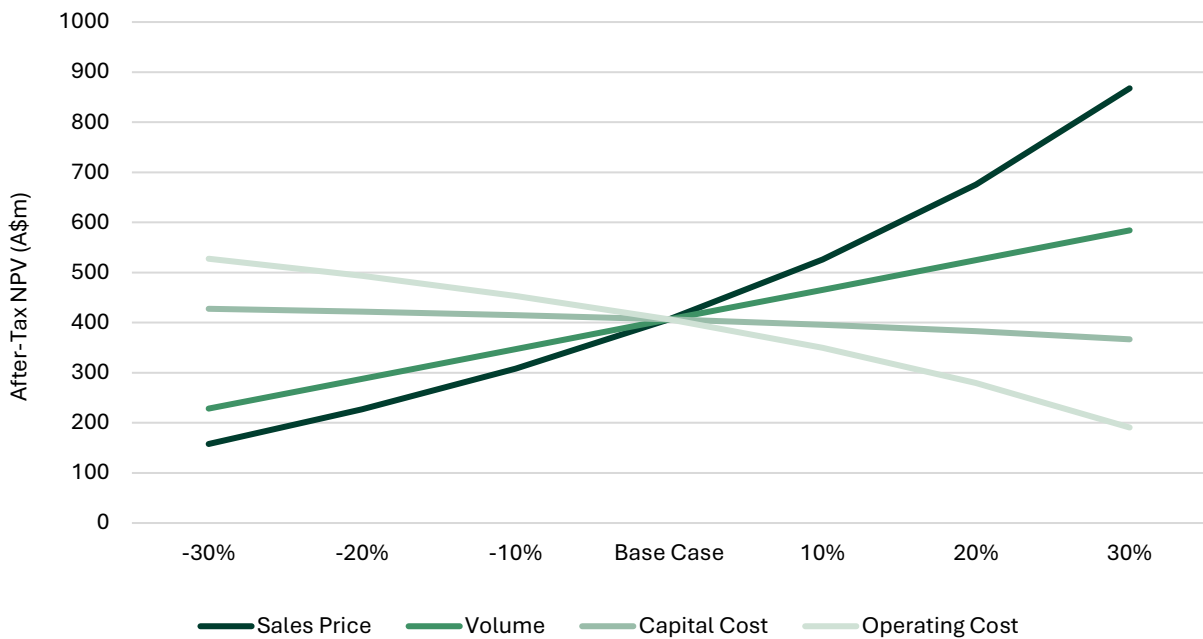
### NPV Sensitivity

Sensitivity analysis is outlined in **Table 16** below and models the impact on the after-tax NPV of the Project by changing the key drivers of sales price, production volume, capital cost, and operating cost by +/- 30%.

**Table 16: NPV Sensitivity Analysis Table**

% Change	After-Tax NPV (A\$m)			
	Sales Price	Volume	Capital Cost	Operating Cost
-30%	158	228	428	528
-20%	227	288	422	493
-10%	308	347	415	453
<b>Base Case</b>	<b>406</b>	<b>406</b>	<b>406</b>	<b>406</b>
10%	526	466	396	350
20%	675	525	383	280
30%	868	584	367	191

The analysis table and spider graph (**Figure 11**) show that the Project is most sensitive to changes in sale price or operating cost (margin), and more resilient to changes in capital cost items and sales volume. At a 30% reduction in sales price or volume, which extends beyond the level of accuracy of this report, the Project continues to show a positive NPV.



**Figure 11: NPV Sensitivity Analysis Spider Graph**

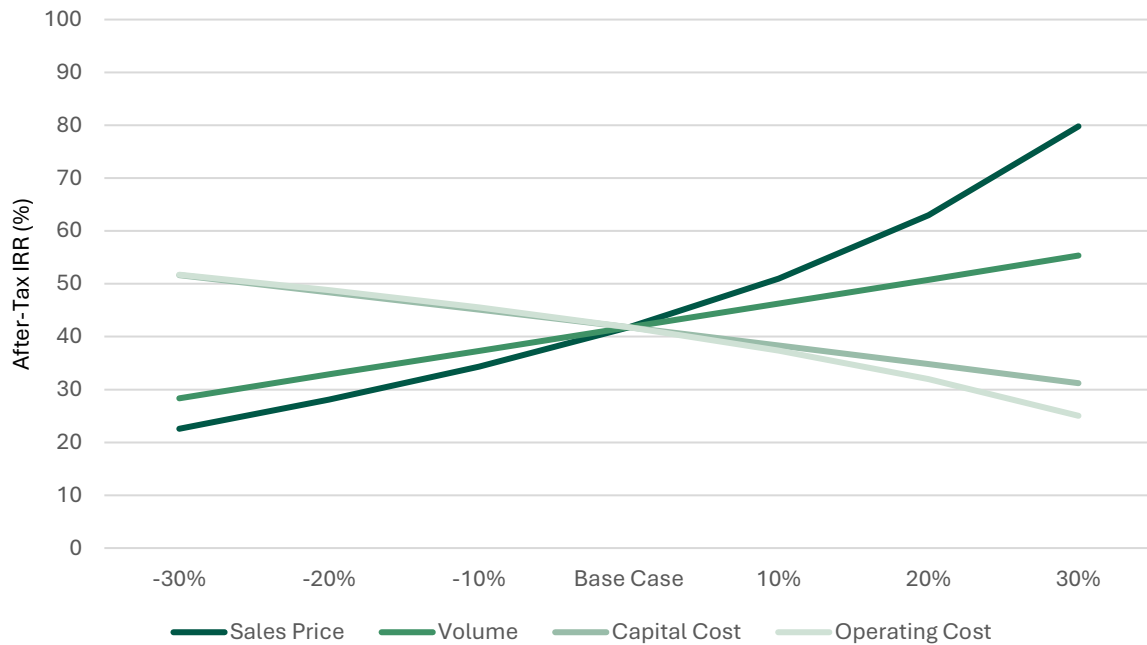
### IRR Sensitivity

Sensitivity analysis is outlined in **Table 17** below and models the impact on the after-tax IRR of the Project by changing the key drivers of sales price, production volume, capital cost, and operating cost by +/- 30%.

**Table 17: IRR Sensitivity Analysis Table**

% Change	After-Tax IRR (%)			
	Sales Price	Volume	Capital Cost	Operating Cost
-30%	23	28	52	52
-20%	28	33	48	49
-10%	34	37	45	46
<b>Base Case</b>	<b>42</b>	<b>42</b>	<b>42</b>	<b>42</b>
10%	51	46	38	37
20%	63	51	35	32
30%	80	55	31	25

The analysis table and spider graph (**Figure 12**) corroborates the NPV sensitivity analysis, which indicates that the Project is most sensitive to changes in the sale price or operating cost (margin), and more resilient to changes in the capital cost and sales volume. At a 30% reduction in sales price or volume, which extends beyond the level of accuracy of this report, the Project continues to show a positive IRR that is greater than 20%.



**Figure 12: IRR Sensitivity Analysis Spider Graph**

### Project Financing

To achieve the range of outcomes indicated in the PFS, Zeotech estimates that approximately \$95 million in funding will be required to support initial capital expenditure and working capital for the AusPozz™ Project. The Company has undertaken a detailed assessment of its funding strategy and confirms that it has satisfied itself of the requirements, and has formed its financial projections and funding assumptions based on reasonable grounds, including:

- **Independent technical and financial inputs** from the PFS, including capital and operating cost estimates prepared to AACE Class 4 standards.
- **Market validation** through signed MOUs with Holcim Australia and MSI, supporting early-stage offtake interest.
- **Detailed production schedules** based solely on Measured and Indicated Mineral Resources, excluding Inferred Resources from the financial model.
- **Sensitivity analysis** demonstrating the Project's resilience to changes in key variables such as sales price, capital cost, and operating cost
- **Engagement with potential funding partners**, including equity investors, debt providers, and government agencies.

Zeotech is actively considering a multi-source funding strategy, which may include:

- **Equity capital raising**, leveraging the Company's strong project economics and strategic positioning as Australia's first domestic metakaolin producer supported by the track record of the Board and Executive team, and proven ability to attract new capital.
- **Debt financing**, supported by robust cash flows from early Kaolin DSO sales and a short payback period of 2.1 years.
- **Strategic partnerships or joint ventures**, particularly with downstream users of supplementary cementitious materials (SCMs).

- **Government funding support**, including grants or concessional finance aligned with achieving Australian Net-Zero emissions targets and regional development priorities.

The Company believes that these funding pathways are consistent with market practice for projects of this scale and maturity and that it has reasonable grounds to believe that the required capital can be secured on terms that are not materially adverse to existing shareholders.

Zeotech will continue to refine its funding strategy as part of the proposed DFS, including engagement with financial advisors and potential financiers.

## 15. Ore Reserves

The technical and economic viability of the AusPozz™ Project has been assessed in the PFS with all the relevant Modifying Factors considered in accordance with the JORC Code (2012). This includes mining, processing, metallurgical, infrastructure, economic, marketing, legal, environmental, social, and governmental aspects.

An Ore Reserve has not been declared in the PFS due to unresolved mining, processing, and marketing-related Modifying Factors. Specifically for mining - aspects of the mine plan need to be sufficiently defined, processing - aspects of AusPozz™ particle size, feed blend and colour need to be optimised, and marketing - binding offtake agreements for AusPozz™ and Kaolin DSO products need to be executed, to apply Modifying Factors with the level of confidence required for Ore Reserve classification under the JORC Code (2012).

Importantly, the economic analysis within the PFS is based solely on Measured and Indicated Resources. Inferred Mineral Resources were excluded from the production target and do not contribute materially to the Project economics or viability.

Following completion of the PFS, Zeotech intends to undertake further technical work, including additional drilling and feasibility-level assessments, to resolve the outstanding Modifying Factors and support future Ore Reserve classification.

## 16. Risks and Opportunities

A comprehensive risk and opportunity assessment, including risk mitigation measures, was conducted for the AusPozz™ Project as part of the PFS. The evaluation was conducted with input from specialists in legal, regulatory, policy, geology, environmental, community engagement, processing, engineering, logistics, marketing, finance, and project delivery.

### Risks

Project risks with a high-risk rating identified in the PFS are set out in **Table 18** below:

**Table 18: High-Rated Risks**

Risk Cause	Impact	Risk Mitigation Measures
Delay to the commencement of Kaolin DSO operations	Delayed revenue, increased project funding, and reputational damage	<ul style="list-style-type: none"> <li>• MOU in place with potential major offtaker.</li> <li>• Advanced and proactive discussions with government representatives.</li> <li>• Continued marketing efforts.</li> <li>• Early engagement with mining and civil contractors.</li> </ul>

Major mining (Kaolin DSO and AusPozz™ feed) and processing production interruptions resulting in insufficient supply of Kaolin DSO, Cosmetic Kaolin DSO and AusPozz™ products	Loss of revenue	<ul style="list-style-type: none"> <li>• Implement conventional open pit mining operations and proven process technologies.</li> <li>• Implement a detailed logistics plan for transporting Kaolin DSO, Cosmetic Kaolin DSO, and AusPozz™ feed.</li> <li>• Maintain equipment to the manufacturer's specifications.</li> <li>• Maintain ROM stockpiles to cover potential interruptions in mining operations.</li> </ul>
Decline in realised selling prices for Kaolin DSO, Cosmetic Kaolin DSO, and AusPozz™ products	Reduced revenue	<ul style="list-style-type: none"> <li>• Seek long-term contracts with multiple competing customers.</li> <li>• Include annual price escalation clauses in agreements.</li> </ul>
Significant delay of AusPozz™ Manufacturing Facility project delivery	Delayed revenue, increased project funding, and reputational damage	<ul style="list-style-type: none"> <li>• Proactive and disciplined project management.</li> <li>• Early engagement with consultants with a proven track record and experience in industrial minerals.</li> <li>• Early engagement with equipment vendors, contractors, and community stakeholders.</li> <li>• Complete representative feed test work to confirm product parameters, variability, and process design criteria.</li> </ul>

### Opportunities

A summary of potential opportunities with a high rating identified during the PFS follow:

- Mineral Resource Expansion**  
 The Toondoon Kaolin Resource is proposed to be open in all directions, offering potential to expand and upgrade the resource base by further exploration drilling in the DFS.
- Early Revenue Through Third-Party Processing**  
 Potential to use a commercial calcination operator for early AusPozz™ production before the AusPozz™ Manufacturing Facility is operational, based on successful trials.
- Capital Savings**  
 Opportunity to reduce capital costs through early vendor engagement (EVE) with two vendors, including product testing to validate kaolin ore processing properties and complete detailed design for optimised kiln selection in the DFS.
- Carbon Reduction Marketing**  
 AusPozz™, as an SCM, offers a compelling carbon reduction profile that can be leveraged in sustainability-focused markets, accompanied by an easy-to-follow carbon reduction impact statement.
- Price Upside**  
 Any increase in realised product prices (Kaolin DSO, Cosmetic Kaolin DSO, AusPozz™, AusPozz™ Max) would positively impact project economics.
- Global Market Entry**  
 Strong international interest in AusPozz™ positions Zeotech for export expansion.

- **Local Economic Development**

Potential creation of local jobs, reskilling, traineeships, apprenticeships, and business opportunities, including for indigenous owned businesses, through Project mining and manufacturing operations and facility and infrastructure construction.

- **Alternative Gas Supply**

An alternative gas supply option, utilising Coal Mine Site Waste gas, for the AusPozz™ Manufacturing Facility has been identified and planned to be further investigated in the DFS.

## 17. Project Execution

A comprehensive plan for executing the AusPozz™ Project details the governance, structure, methodology, and strategy for delivering the design, engineering, procurement, construction, commissioning, and handover into operations.

The critical path for the Project is the completion of the DFS and delivery of long lead equipment items for the AusPozz™ Manufacturing Facility. The Facility site is scheduled to be constructed in parallel with the equipment being manufactured to reduce the overall delivery time of the Project.

### Key Objectives

- Develop kaolin mining operations at the Toondoon Mine Site.
- Construct and commission the AusPozz™ Manufacturing Facility at Port of Bundaberg.
- Enable early revenue through Kaolin DSO and Cosmetic Kaolin DSO sales.
- Deliver 300,000 dtpa of AusPozz™ at nameplate capacity (Train 300).

### Governance and Management

- Zeotech Board approves overall strategy, direction, and funding for the Project.
- A Project Steering Committee (Zeotech Executive Team) oversees strategic direction and funding.
- A Project Sponsor (Chief Operating Officer/General Manager) ensures alignment and progress.
- A dedicated Owner's Team would manage execution, including engineering, procurement, and construction.

### Execution Strategy

The Project is planned to follow a waterfall methodology across lifecycle phases:

1. Pre-Feasibility Study (PFS)
2. Definitive Feasibility Study (DFS)
3. Final Investment Decision (FID)
4. Financing and Approvals
5. Detailed Design
6. Execution, Commissioning, and Handover
7. Closure and Rehabilitation.

**Table 19: Project Key Milestones**

Project Key Milestone	Date
<b>DFS</b>	
• Commence	Q3 2025
• Complete	Q1 2026
<b>Toondoon Mine Site Development</b>	
• Commence	Q4 2025
<b>Kaolin DSO and Cosmetic Kaolin DSO</b>	
• Commence Ore Transport to Port	Q1 2026
• First Shipment	Q1 2026
<b>AusPozz™ Manufacturing Facility</b>	
• Project Execution FID	Q1 2026
• Train 300 Ordered	Q1 2026
• Detailed Design Commencement	Q1 2026
• Detailed Design Complete	Q3 2026
• Train 300 Delivered to Site	Q4 2027
• Site Construction Commencement	Q3 2026
• Train 300 Mechanically Complete	Q2 2028
• Train 300 Commissioned	Q4 2028
• Nameplate Production (300,000 tpa)	Q1 2029
<b>AusPozz™</b>	
• First Shipment	Q4 2028

A Project execution schedule has been prepared, and a summary of the schedule is provided in **Appendix 2**.

## 18. Conclusion

### Business Case

The AusPozz™ Project PFS presents a compelling case for Zeotech’s entry into the SCM market through the development of a vertically integrated operation. The study demonstrates that the Project is technically feasible, economically viable, and strategically aligned with sustainability in the built environment, driven by domestic and global decarbonisation goals, which are accelerating the growing demand for low-carbon SCMs.

Key findings include:

- **Strong Business Case:** The PFS confirms that AusPozz™ can be produced efficiently with a light carbon footprint, at low cost and low risk, with robust margins supported by strong market demand evident in the domestic construction and infrastructure sectors.
- **High-Quality Resource:** The Toondoon Kaolin Deposit is confirmed to be of ultra-high purity, with a kaolinite content > 90% in the ore clays, making it ideal for Kaolin DSO, Cosmetic Kaolin DSO, and economic AusPozz™ production.

- **Scalable Production:** Proposed nameplate 300,000 dtpa AusPozz™ Manufacturing Facility at the Port of Bundaberg is well-supported by infrastructure, logistics, utilities, and offers the potential for future Train 2 expansion.
- **Market Readiness:** The Company has a growing sales/specifier opportunity pipeline of 65 active leads and has secured early Memoranda of Understanding (MOUs) with major industry players, including Holcim Australia<sup>5</sup> for AusPozz™ and Jiangsu Mineral Sources International Trading Co. China (MSI)<sup>6</sup> for Kaolin DSO products.
- **Environmental and Social Alignment:** The Project aligns with sustainability goals by offering a high-performance, low-carbon alternative to traditional cement, offering the potential to deliver a significant ongoing contribution to decarbonisation within the Australian built environment, while also supporting regional employment and community development.
- **Execution Pathway:** A clear roadmap has been established, with a Definitive Feasibility Study (DFS) scheduled to commence in Q3 2025, leading to Final Investment Decision (FID) in Q1 2026 and full AusPozz™ production achieved by Q1 2029.

The PFS concludes that the AusPozz™ Project is a strategically significant Australian first manufacturing opportunity for Zeotech to become a leading supplier of economic, high-performance, low-carbon metakaolin SCM.

AusPozz™ has the potential to transform the domestic building and construction materials sector, making a positive and ongoing contribution to Australia's Net-Zero carbon emission targets.

### Next Steps

The PFS confirms the commercial viability of the AusPozz™ Project. The DFS will provide the technical, regulatory, and commercial detail required to support an FID and planned to include a focus on the following key next steps:

- Finalising and lodging submissions for environmental and regulatory approvals.
- Developing and implementing an Environmental and Social Risk Management System and a Community and Stakeholder Engagement Strategy.
- Conducting further geotechnical, hydrological, and hydrogeological studies, and commence environmental baseline monitoring at the Toondoon Mine Site.
- Optimising the mine plan and pit design.
- Conduct large-scale calcination and milling trials with selected vendors and finalise the engineering design for the AusPozz™ Manufacturing Facility.
- Completion of the Port of Bundaberg site agreement(s), including storage options.
- Finalising, with State Government support, utility (gas, power, water) agreements for the AusPozz™ Manufacturing Facility.
- Confirming logistics infrastructure and haulage contracts.
- Executing binding offtake agreements for Kaolin DSO, Cosmetic Kaolin DSO, and AusPozz™ products supported by customer product trials.
- Conducting further drilling and feasibility-level assessments to address outstanding Modifying Factors and support future Ore Reserve classification.
- Conducting a detailed risk review and refining risk mitigation strategies.

The DFS is scheduled to commence in Q3 2025, with completion expected in Q1 2026.

### Next Horizon Product – Zeolite

As outlined in the PFS, the second longer-term stage of the AusPozz™ Project (Horizon 2) involves the development of high-value product streams using metakaolin feed to manufacture zeolite. This aligns with Zeotech's broader mission to deliver innovative solutions that address global sustainability challenges.

Horizon 2 initiatives under advanced development include:

- **zeoteCH<sub>4</sub>**®: A proprietary zeolite-based formulation designed to reduce landfill methane emissions.
- **Animal Feed Additive:** A zeolite-based supplement aimed at preventing subclinical hypocalcemia, also known as milk fever, in cows.

Due to strong perceived market demand for AusPozz™, the full capacity of the initial 300,000 dtpa (Train 300) in the PFS has been fully allocated for potential offtake agreements for SCM applications (Horizon 1).

For this reason, it is proposed that metakaolin required for the commercialisation of zeolite will be catered for in the proposed next AusPozz™ Train, which is beyond the scope of the PFS and is planned to be covered in the DFS.

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## APPENDIX 1

### Summary of Material Assumptions

The key assumptions relevant to the financial analysis are presented in **Table 20**.

**Table 20: Summary of Material Assumptions**

Item	Assumption	Comment
Currency	\$AUD	
Exchange Rate (AUD/USD)	0.65	
Exchange Rate (AUD/EUR)	0.60	
Pricing Basis	Q1 2025	
Study Accuracy	+/- 25%	
Corporate Tax Rate	30%	
<b>Mine</b>		
Mineral Resource supporting the LOM production schedule	10.87 Mt	Plastic clay, kaolinite clay (high-iron), kaolinite clay (low-iron) classified as Measured and Indicated Resource
Life of Mine (LOM)	20 years	
Ore loss	6%	5% mining, 1% handling
Dilution	5 to 10%	5% low-iron & plastic clay, 10% high-iron
Transport loss	1%	
Ore moisture (pit)	10%	
Total ore mined (LOM)	9.3 Mt	AusPozz™ and DSO
Total waste mined (LOM)	3.1 Mt	
Average Strip Ratio (LOM)	0.3:1	waste:ore
<b>AusPozz™ Manufacturing</b>		
Nameplate capacity (annual)	300,000 tpa	dry tonnes
Production (LOM)	5.2 Mt	
Process losses	3%	
Dehydroxylation	14%	
<b>Direct Shipping Ore</b>		
Annual Production	151,000 tpa	dry tonnes (product to be sold on a wet-basis)
Production (LOM)	3.0 Mt	dry tonnes (product to be sold on a wet-basis)
<b>Financial</b>		
Sales price AusPozz™	\$403 / t <sub>dry</sub>	Weighted average sale price
Sales price DSO	\$196 / t <sub>wet</sub>	Weighted average sale price
Sale terms (domestic)	EXW Bundaberg	
Sale terms (export)	FOB Port of Bundaberg	
CPI/escalation (operations)	2%	Lower band of RBA target range
CPI/escalation (capital)	nil	Assumed to be covered under contingency
Royalties (Govt.)	\$1.00 / t <sub>dry</sub>	
Royalties (private)	\$2.00 / t <sub>dry</sub>	
Initial capital cost estimate	\$114.8m	
Sustaining capital	\$17.4m	
Construction commencement	Q3 2026	
Commissioning	Q4 2028	
Production ramp-up	3 months 67% nameplate capacity	

Discount rate	8.00%	Assessment of Weighted Average Cost of Capital (WACC) and peer review.
Exclusions	<p>No allowance has been made for the following items</p> <ul style="list-style-type: none"> <li>• Exchange rate variations. It is assumed this will be managed within the current allocated contingency provisions.</li> <li>• Project financing costs.</li> <li>• Interest charges.</li> <li>• All goods and services tax (GST), import duties, surcharges and any other statutory taxation, levies or government duties are excluded.</li> </ul>	

### Summary of Modifying Factors

Criteria	Comment
Mineral Resources	<ul style="list-style-type: none"> <li>• The AusPozz™ Project PFS was based on the June 2025 Mineral Resource Estimate prepared by a Competent Person – Mineral Resources (Graham Rolfe) that updates the 2022 Mineral Resource Estimate, prepared by Ausrocks, incorporating the new drilling data and revised DBD measurements of the various ore types which was completed in 2025.</li> </ul>
Site Visits	<ul style="list-style-type: none"> <li>• The Competent Person (Mineral Resources) for the PFS visited the Toondoon Area (February and March 2025) to supervise the drilling campaign, sample collection, documentation, and density analysis.</li> <li>• The Competent Person (Processing Test work and Mineral Processing) for the PFS visited the Toondoon Mine Site and proposed AusPozz™ Manufacturing Facility site at Port of Bundaberg in February 2025 to observe mineral behaviour and characteristics during extraction and handling, and assess the Facility site suitability for the planned production process.</li> <li>• Specialist consultants site visits in February 2025 included: <ul style="list-style-type: none"> <li>○ Ardent (Toondoon Mine Site) to observe drilling and test pit excavation, and oversight of the installation of a groundwater monitoring bore for completion of a Groundwater Baseline Study.</li> <li>○ MineEcoTech (Toondoon Mine Site) to view drill core and supervising the test pit deeper excavation.</li> <li>○ Derisk (Toondoon Mine Site access and Facility site at Port of Bundaberg) - to assess transport route from the Toondoon mine site to the Facility site.</li> <li>○ Pitch Black Group (Facility site at Port of Bundaberg) to assess the Facility site suitability for the planned production process.</li> </ul> </li> </ul>
Study Status	<ul style="list-style-type: none"> <li>• The PFS has been completed to assess the technical and economic viability of the AusPozz™ Project. The study considered all relevant Modifying Factors in accordance with the JORC Code (2012), including mining, processing, metallurgical, infrastructure, economic, marketing, legal, environmental, social, and governmental aspects.</li> <li>• The AusPozz™ Project PFS indicates the Project is technically and financially viable.</li> <li>• The PFS was completed by Zeotech with input from specialist consultants.</li> <li>• Financial modelling completed as part of the PFS shows that the project is economically viable under current assumptions.</li> </ul>
Cut-off Parameters	<ul style="list-style-type: none"> <li>• With kaolinite contents in excess of 90% in the ore clays, a normal kaolinite grade economic cut-off has not been used. Instead, product quality criteria, derived from product specifications, were applied for mine scheduling.</li> <li>• These quality criteria were used to evaluate the 1Ha x 5m scheduling blocks as follows: <ul style="list-style-type: none"> <li>○ &lt; 35% alumina or &gt;5% iron = waste</li> <li>○ ≥ 35% alumina and &lt; 0.5% iron = Kaolin DSO</li> <li>○ ≥ 35% alumina and ≥0.5% and &lt; 1.0% iron = Cosmetic Kaolin DSO</li> <li>○ ≥ 35% alumina and ≥ 1.0% iron and &lt; 5% iron = AusPozz™ Feed</li> </ul> </li> <li>• The economics of each scheduling ore block were evaluated considering the following parameters: product prices, operating costs, process yield</li> </ul>

	and recovery, transport costs, general and administrative costs and royalty costs.
Mining factors or assumptions	<ul style="list-style-type: none"> <li>• Conventional open-pit mining of shallow, flat-lying kaolin resource at Toondoon Mine Site.</li> <li>• 20-year Life of Mine (LOM) with 9.3 Mt of ore mined.</li> <li>• No blasting is required; ore is ripped and loaded using graders and FELs.</li> <li>• Pit optimisation undertaken to reflect the production schedule and feedstock constraints</li> <li>• Mine design includes conservative slope angles (18°-26°) for unconsolidated stability and progressive rehabilitation.</li> <li>• An allowance for underlying and overlying dilution was made with dilution of: 5% for the carefully mined deep low-iron kaolin, 10% for the thin high-iron kaolin, and 5% for the thicker plastic clay.</li> <li>• Loss allowances were made for the diluted bulk materials of 5% for mining, 1% for ROM pad handling, and 1% for the transport process.</li> <li>• Inferred Mineral Resources were excluded from the calculation of the mining inventory, so the PFS Production Schedule incorporated no Inferred Mineral Resources.</li> <li>• Further geotechnical studies, hydrogeological assessment and pit optimisation are planned for the DFS.</li> </ul>
Processing factors or assumptions	<ul style="list-style-type: none"> <li>• Rotary kiln calcination and vertical roller milling selected for AusPozz™ production. This technology is common at full plant scale to produce metakaolin.</li> <li>• Processing flowsheet includes mining, transport, feed storage, feed preparation, calcination, milling, and packaging or bulk storage ready for transport to customers.</li> <li>• 300,000 tpa nameplate capacity for the AusPozz™ Manufacturing Facility at Port of Bundaberg.</li> <li>• Processing validated through laboratory and pilot-scale testwork.</li> <li>• Further large-scale vendor calcination and milling testing is planned to validate key assumptions in the DFS.</li> </ul>
Metallurgical factors or assumptions	<ul style="list-style-type: none"> <li>• High-grade kaolin (&gt;90% kaolinite in the ore clays) with low purities confirmed.</li> <li>• Extensive laboratory and pilot-scale testwork confirmed mineralogical and chemical characteristics of the resource.</li> <li>• Testwork confirmed calcination at 700-800°C produces high-reactivity metakaolin.</li> <li>• Mortar and concrete trials demonstrated that AusPozz™ significantly enhances compressive strength, reduces shrinkage, and improves durability compared to traditional SCMs.</li> <li>• AusPozz™ meets AS 3582.4:2022 standards for manufactured pozzolans.</li> <li>• Further large-scale vendor trials, feed variability, material flow properties and product performance studies are planned for the DFS.</li> </ul>
Infrastructure	<ul style="list-style-type: none"> <li>• Mine infrastructure includes weighbridge, laboratory, workshop, and utilities.</li> <li>• The AusPozz™ Manufacturing Facility at Port of Bundaberg is well-supported with access to roads, gas, power, and water.</li> <li>• The Facility utilises existing port infrastructure, including storage sheds and a multi-use conveyor for shipping.</li> <li>• Utilities to meet Facility requirements have been assessed, and discussions are in progress for utility agreements.</li> <li>• There is access to a skilled workforce in Bundaberg that could support the AusPozz™ Manufacturing Facility.</li> <li>• The workforce for the Toondoon Mine Site could be sourced from the local region, within driving distance of Toondoon.</li> </ul>
Economic	<ul style="list-style-type: none"> <li>• All project costs have been identified, assessed, and calculated by Zeotech and in consultation with expert contributors responsible for various sections of the PFS.</li> </ul>

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	<ul style="list-style-type: none"> <li>All costs are as of Q1 2025 with an expected level of accuracy of +/-25%</li> </ul> <p><b>Capital Cost Estimate</b></p> <ul style="list-style-type: none"> <li>Capital cost estimate: \$132.2m (including contingency and sustaining capital LOM).</li> <li>The capital cost estimate has been prepared to a level of completeness and accuracy consistent with an AACE Class 4 estimate.</li> <li>The estimate methodology is to use major equipment pricing and then factor the remaining direct costs but involving some measurement of quantities.</li> <li>Equipment pricing has been sourced from known industry suppliers that can potentially service the AusPozz™ Project. Bulk material and labour rates are budgetary.</li> <li>The contracting strategy adopted for the estimate broadly follows an EPCM delivery model.</li> <li>The mining estimate includes all direct costs for mine development, supporting infrastructure, and indirect costs associated with contractors, the owner’s team, and pre-production operations.</li> <li>No allowance for price escalation has been included within the capital cost estimate, as it is assumed that this will be managed within the allocated contingency.</li> </ul> <p><b>Operating Cost Estimate</b></p> <ul style="list-style-type: none"> <li>The operating cost estimate was prepared using the project design criteria, mass balance, equipment list, and input from the expert consultant cost database</li> <li>Cost areas include mining, logistics, processing, labour, gas, power, fuel, water, maintenance, consumables, QA/QC, indirect personnel, and general &amp; administration.</li> <li>Utility costs are based on quoted budget prices provided by utility providers.</li> <li>Transport costs are based on quoted budget prices.</li> <li>Labour costs have been built up from an organisational structure typical of a processing facility of this scale and input from expert consultants.</li> <li>Dry-hire mining equipment has been selected for the basis of costing for the PFS.</li> <li>Calculations include escalation of 2.0% p.a. applied to the baseline operating cost estimate. This applies to revenue and all direct operating costs and indirect costs. Price escalation is at the low end of the Reserve Bank of Australia’s inflation target range of 2% to 3%.</li> <li>Royalties of \$1.00/t<sub>dry</sub> (Government) and \$2.00/t<sub>dry</sub> (Private) are included.</li> </ul> <p><b>Financial Model</b></p> <ul style="list-style-type: none"> <li>The financial model used to assess the economic viability of the Project has been prepared by Zeotech using inputs and assumptions detailed in the PFS.</li> <li>Project NPV at a discount rate of 8% and IRR indicate strong economic viability.</li> <li>Payback period of approximately 2.1 years from commissioning of the AusPozz™ Manufacturing Facility.</li> <li>Sensitivity analysis completed by adjusting key model inputs such as sale price, volume, capital cost, and operating cost by +/- 30%. Analysis shows resilience to changes in capital cost items and sales volume, and sensitivity to changes in operating margin (sales price or operating cost).</li> <li>A variety of funding source options are being actively considered.</li> <li>Exchange rate of 0.65 (AUD/USD) and 0.60 (AUD/EUR) based on current and historical settings.</li> </ul>
Marketing	<ul style="list-style-type: none"> <li>MOUs have been signed with Holcim (AusPozz™) and MSI (Kaolin DSO and Cosmetic Kaolin DSO).</li> <li>Target markets are:             <ul style="list-style-type: none"> <li>Domestic and international cement and concrete producers (Tier 1 and Tier 2)</li> <li>Ceramics, cosmetics, and specialty chemical sectors.</li> </ul> </li> <li>AusPozz™ is positioned as a low-carbon SCM with strong market demand.</li> </ul>

	<ul style="list-style-type: none"> <li>Product pricing is supported by market research and product quality.</li> </ul>
Legal	<ul style="list-style-type: none"> <li>Kalotech (wholly owned Zeotech subsidiary) holds the Toondoon Area, including the Mining Lease (80126) and two Exploration Permits for Minerals (EPM 27395 and EPM 27866).</li> <li>Kalotech is the owner of the freehold land (Lot 1 SP331858) of approximately 682 hectares, which covers the whole of the ML and overlaps the adjacent EPMs.</li> <li>Legal compliance with Queensland and Commonwealth laws confirmed.</li> <li>Cultural heritage and Native Title obligations acknowledged and managed.</li> </ul>
Environmental	<ul style="list-style-type: none"> <li>A Standard EA is in place for the Toondoon Mine Site.</li> <li>A site-specific EA and PRCP will be required for Project expansion in the future.</li> <li>Environmental impact assessment identified potential risks.</li> <li>There is a low AMD risk, and the topsoil is suitable for rehabilitation.</li> <li>Emissions are estimated at 56,788 tCO<sub>2</sub>-e/year.</li> <li>Environmental controls include dust suppression, water management, and progressive rehabilitation.</li> </ul>
Social	<ul style="list-style-type: none"> <li>A comprehensive assessment of community and stakeholder engagement was undertaken.</li> <li>No significant community opposition identified.</li> <li>Engagement with State government departments and regional councils is ongoing.</li> <li>Social risks (traffic, workforce competition, housing, environmental concerns) balanced by employment and economic benefits.</li> <li>Traditional Owners and further stakeholders to be engaged.</li> <li>Zeotech intends to develop a Community and Stakeholder Engagement Strategy in the DFS phase.</li> </ul>
Governmental	<ul style="list-style-type: none"> <li>The Project aligns with regional development priorities and sustainability goals.</li> <li>Approvals required include under: <ul style="list-style-type: none"> <li>Environmental Protection Act</li> <li>Aboriginal Cultural Heritage Act</li> <li>Planning Act</li> <li>State Development and Public Works Organisation Act</li> <li>Water Act</li> <li>Native Title Act.</li> </ul> </li> <li>The Project will be compliant with Equator Principles and NGER Act.</li> <li>Zeotech intends to develop and implement an Environmental and Social Risk Management System.</li> </ul>
Classification	<ul style="list-style-type: none"> <li>No Ore Reserve has been declared at this stage due to unresolved mining, processing, and metallurgical-related Modifying Factors.</li> <li>The economic analysis within the PFS is based solely on Measured and Indicated Resources. Inferred Mineral Resources were excluded from the production schedule and do not materially contribute to the Project economics or viability.</li> <li>Further technical work, including additional drilling and feasibility-level assessments, is planned to resolve the outstanding Modifying Factors and support future Ore Reserve classification.</li> </ul>
Audits or Reviews	<ul style="list-style-type: none"> <li>A technical peer review of the PFS was conducted by Derisk Geomining Consultants Pty Ltd (Derisk).</li> </ul>
Study Accuracy	<ul style="list-style-type: none"> <li>The estimates in this PFS have been completed with an accuracy expected to be +/- 25%.</li> </ul>

APPENDIX 2

Summary of Project Execution Schedule

Task	2025			2026				2027				2028				2029
	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1
<b>Pre-construction</b>																
DFS																
Regulatory Approvals																
Financing																
<b>Toondoon Mine Site</b>																
Toondoon Mine Site Development																
<b>Kaolin DSO and Cosmetic Kaolin DSO</b>																
Kaolin Ore Transport and First Shipment																
<b>AusPozz™ Manufacturing Facility (T300)</b>																
Project Execution FID																
Detailed Design																
Equipment Order and Delivery																
Site Construction																
Mechanical Work																
Commissioning																
Production Ramp-Up																
<b>AusPozz™</b>																
Stockpiling and First Shipment																

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## APPENDIX 3

### JORC Code 2012 Edition – Table 1

#### Section 1: Sampling Techniques and Data

Criteria	Commentary	Competent Professional – Graham Rolfe
<b>Sampling techniques</b>	<p>Phase 1 &amp; 2: The only sampling was from the Air Core and Reverse Circulation Hammer Drilling.</p> <p>The sample was delivered directly from the rig to a cyclone. The total sample was bagged and split with an onsite riffle splitter, mounted on a 4wd tray-back.</p> <p>The drill sampling was completed at one metre intervals and split onsite using an 87.5:12.5 splitter (3 sets of riffles). The 87.5% fraction retention samples have been removed from the drill sites and stored in a Mundubbera storage shed. The 12.5% fraction was further split with a 50:50 splitter to produce a sample for analyses by ALS. The remaining split was used for duplicate sampling and kept on the Gold Coast for further analyses.</p> <p>The sample number incorporated the hole number and depth e.g. Sample from hole TDAC 15 and 5-6m depth = TDAC 1516, and TDRC 108 and 9-10m depth = TDRC10810.</p> <p>All samples were bagged in plastic bags to reduce the loss of the very fine-grained clay minerals.</p> <p>Phase 3 (4C core drill): The 4C drill core was split using a spatula as the clay material was soft. Samples of up to 4 metres of 40 to 55% of the core were collected and dispatched for chemical analyses.</p>	
<b>Drilling techniques</b>	<p>The <b>Phase 1</b> Air Core Drill Program consisting of 42 holes (TDAC 15-56) for 1042.5 metres was completed in February 2021. The <b>Phase 2</b> Air Core Drill Program consisted of 52 holes (TDAC 58-107) and TDAC15B and 16B twinning TDAC15 &amp; 16 were completed in November 2021. The air-core program totalled 1475m.</p> <p>Sixteen reverse circulation hammer holes TDRC 108 to 123 for 373m were drilled on 50m centres on lines 315800mE and 315850mE. At six sites the TDRC holes were twinned (110 to 121) and TDRC122 twinned the Phase 1 TDAC39. The drill contract was completed by Associated Exploration Drilling Pty Ltd using a truck-mounted AusRoc 4000 Multipurpose Rig with a 250/350 psi Sullair Air Compressor.</p> <p>The air core drill string consisted of 75mm (OSD) x 3-metre length rods with an 85mm diameter tungsten rotary bit. The clay was drilled using the Air Core Technique. The TDRC holes were drilled with a 4.5 inch or 115mm hammer.</p> <p>Phase 3 (4C Core Drill) drilling in February 2025 was completed by Rockhampton based Depco. Seven holes TD4C 124-130 were drilled for 158.6 metres using the 4C coring method with a UDR 650 rig and 39.5m of reverse circulation drilling for the extension of TD4C126 to 60m depth as a water monitoring bore.</p>	

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Criteria	Commentary	Competent Professional – Graham Rolfe
	<p>The 4C holes were located centrally between 4 previous air core holes, which were located on a 100m x 100m grid. The 4C core diameter was nominally 10cm. The 4C core holes were drilled for density measurements and geotechnical evaluation. Hole TD4C126 was equipped as a water monitoring bore.</p>	
<p><b>Drill sample recovery</b></p>	<p>The 12.5% sample split was within 350-500gm, comparable to the theoretical total weight of 3.3kg i.e. 420gm in the 12.5% split</p> <p>The compressor air pressure was turned down to 200psi to reduce the loss of the fines. However, a fraction of the super-fine clay was lost in the updraft from the cyclone. The Phase 2 drilling used a larger diameter cyclone with a reduced updraft of the finer fraction.</p>	
<p><b>Logging</b></p>	<p>The drill chips/powder were graphically logged on paper by the Competent Person at 1:100 scale, noting the colour, the pearly sheen of kaolinite, the plasticity of the grey clay, quartz (sand and silt fraction), and iron content as hematite and limonite/goethite) and later transferred to an Excel spreadsheet.</p> <p>All samples from the drilling were logged.</p>	
<p><b>Sub-sampling techniques and sample preparation</b></p>	<p>The drill samples were consistently powder clay with quartz as sand and silt size fractions.</p> <p>The drilling was completed dry. The drill sampling was at one-metre intervals and split onsite using an 87.5:12.5 splitter (3 sets of riffles). The 87.5% fraction retention samples have been removed from the drill sites and stored in a Mundubbera storage shed. The 12.5% fraction was further split with a 50:50 splitter to produce a sample for dispatch to and analyses by ALS</p> <p>The samples were dispatched in self-seal plastic bags to reduce the loss of the fine clay fractions.</p> <p>In addition to ALS's QA/QC services, the company submitted a random duplicate sample from each of the dominant lithologies (i.e., bauxitic clay, grey plastic clay, kaolinite clay, and sandy clay) from each hole along with a standard sample. (OREAS – 999)</p> <p>Remnants of the 12.5% split, stored on the Gold Coast, and the retention samples (the 87.5% split) stored in Mundubbera are available for further evaluation and testing.</p> <p>The 4C drill core was logged at 1:100 scale as was the air core samples. Core recoveries were measured and lithological contacts recorded on the split tube before being placed in plastic core trays holding 2 x 1metre core sections. Placing the core in the core trays commonly resulted in breaking of the core runs.</p>	

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Criteria	Commentary	Competent Professional – Graham Rolfe
<b>Quality of assay data and laboratory tests</b>	<p>The clay samples for analysis were weighed, dried and milled to a nominal -75um before an XRF assay in the Brisbane lab of ALS using the XRF-ME method. A Loss –On –Ignition (LOI) to ascertain the amount of hydroxyl water in the clay minerals was also completed.</p> <p>Kalotech has supplied a standard (OREAS 999) sample with each hole along with a duplicate of each rock type from each hole. The reproducibility of the alumina and trace element values has been excellent. Several standards for the XRF and LOI analyses were also included by ALS. The reproducibility of these standards has been satisfactory.</p> <p>An evaluation of the repeatability is good. The duplicate samples showed low scatter and good linear correlation with the original assay values. Overall, there was a high level of precision and good accuracy with no evidence of bias in the sampling method of the assays based on the QC analysis.</p> <p>The 4C core was weighed by ALS laboratories on receipt, i.e. wet, then dried and weighed again i.e. dried weight. The samples were then crushed, and a 1-kilogram fraction was milled with a 200gm split sample for assay were retained in paper sachets. The same XRF method as used for the air core samples was used for the 4C drill samples</p>	
<b>Verification of sampling and assaying</b>	<p>RC twining of air-core holes has been completed at 9 sites, testing the desired spacing for converting the Indicated Resource to a Measured Resource and producing larger bulk samples of clay for further evaluation and for marketing purposes.</p>	
<b>Data Storage</b>	<p>The .xlsx data from ALS are stored along with the .csv and .pdf files on computer and external hard disk. A further copy is stored on a Company Director’s computer. These data have been entered into the Excel database as separate files and added to the drill log as a composite file.</p>	
<b>Location of data points</b>	<p>The holes were filled and capped with a 1m long PVC tube. The hole number was recorded on the PVC cap with a black paint marker. The hole drill collars were surveyed with a Garmin GPS map 60CSx GPS using Datum: MGA94 Zone:56J.</p> <p>The averaging mode was used until an accuracy of &lt;2m was obtained. This process generally took 20-30 minutes to achieve the &lt;2m accuracy.</p> <p>A drone photo-grammatic survey was subsequently completed by consultants, Ausrocks.</p>	
<b>Data spacing and distribution</b>	<p>The drill pattern was completed at on a 100m spaced holes on lines 100 metres apart. The holes were drilled on surveyed MGA94 North trending Long Sections and the holes were spaced to achieve 100m spaced holes on the GDA 94 East trending Cross Sections. On 2 sections 315800E and 315850E holes at a 50m spacing was completed.</p>	

Criteria	Commentary	Competent Professional – Graham Rolfe
	<p>Within the resource modelling software, Micromine, the different lithologies, i.e., bauxitic clay, grey plastic clay, white kaolinite clay, and sandy clay, were modelled on both the long and cross sections to produce 3D solids. All TDAC and TDRC drill holes were logged and sampled at 1m length intervals, and no further compositing was performed.</p> <p>The Competent Person’s opinion is that in the drilled area, the geological and grade continuity at the data spacing is adequate for classification of mineral resource as Measured and Indicated Class, with the class dependent on the data spacing. At the northern end of the drilled area, a small area has an Inferred Resource due to the paucity of drill holes.</p>	
<b>Orientation of data in relation to geological structure</b>	<p>The geological nature of the clay zones is generally near flat lying with gentle folding into domal structure with a long section length of 1 kilometre and a width of +400m. This drill program is not considered to be biased.</p> <p>This drill orientation is vertical across a shallow dipping stratigraphy, so the drill orientation is at a high angle to the sediments.</p>	
<b>Orientation of data in relation to geological structure</b>	<p>All drill-holes were drilled vertically intersecting the full zone width of the near flat lying stratigraphy. Therefor there is low risk of bias due to an unfavourable drill orientation.</p>	
<b>Sample security</b>	<p>The Retention Samples were removed from the drill site and securely stored in a Mundubbera storage shed. The 12.5% samples for XRF analysis were transported from site to the ALS Laboratory in Brisbane after the insertion of the duplicate and standard samples. The 200g duplicate assay pulps are stored in the Company’s Gold Coast Storage Shed.</p> <p>The 4C drill core has also been stored in the Mundubbera storage shed.</p>	

## Section 2: Exploration Results

(Criteria listed in section 1, and where relevant in section 1, also apply to this section.)

Criteria	Commentary	Competent Professional – Graham Rolfe
<b>Mineral tenement and land tenure status</b>	<p>The tenure for the Toondoon Project consists of ML 80126 issued by the Queensland Government. The tenements previously 100% owned by Ms Glenys Brown have been acquired by Zeotech. The surrounding tenements EPM 27866 and EPM 27395 are now owned by Zeotech.</p>	
	<p>ML 80126 covering an area of 131.22 hectares is valid until 30<sup>th</sup> November 2030.</p> <p>A standard Environmental Authority allowing a 10-hectare disturbance is in place.</p> <p>ML80126 is located on a block of freehold land currently owned by Zeotech.</p>	

Criteria	Commentary	Competent Professional – Graham Rolfe			
<b>Exploration done by other parties</b>	<p>14 RC drill holes were completed by Australian Bauxite in an earlier evaluation for bauxite. The data from these holes is not used in the Clay Resource estimation.</p> <p>Kalotech drilled 2 phases of air-core drilling in February and November 2021, investigating the kaolin occurrence. The Drilling Contract was assigned to Associated Exploration Drilling Pty Ltd.</p>				
<b>Geology</b>	<p>The kaolin mineralisation, being investigated as having economic potential, occurs within white claystone and clayey sandstone, under a surficial hematite rich bauxitic clay and an underlying grey plastic clay.</p> <p>The bauxite clay- grey plastic clay- white kaolinite clay and sandy clay sequence has been mapped by the GSQ as a Tertiary sedimentary sequence on the Jurassic Evergreen Formation. The flat lying bauxitic horizon has been formed as a regolith on a gently folded plastic clay-kaolinite clay-sandy clay sequence of the Jurassic Evergreen Formation.</p>				
<b>Drill hole Information</b>	<b>Phase 1 – February 2021 Drill Summary Data:</b>				
	<b>Hole No TDAC</b>	<b>GDA 96 Easting m</b>	<b>GDA 96 Northing m</b>	<b>RL – m</b>	<b>Depth m</b>
	15	315751	7146903	305	25
	16	315751	7146804	304	24
	17	315748	7146704	302	30
	18	315750	7146606	300	30
	19	315749	7146505	298	30
	20	315750	7146409	295	27
	21	315749	7146304	293	24
	22	315746	7146205	292	20
	23	315747	7146106	293	20
	24	315748	7146007	293	20
	25	315748	7145907	289	20
	26	315945	7146203	287	20
	27	315948	7146305	289	20
	28	315948	7146403	292	20

Criteria	Commentary				Competent Professional – Graham Rolfe	
	29	315950	7146502	295	24	
	30	315942	7146604	296	24	
	31	315954	7146699	298	24	
	32	315955	7146799	300	24	
	33	315955	7146903	299	24	
	34	315956	7146999	301	24	
	35	315953	7147101	303	27	
	36	315848	7147002	305	30	
	37	315849	7146903	302	33	
	38	315848	7146805	302	33	
	39	315853	7146701	300	30	
	40	315848	7146600	299	27	
	41	315849	7146500	297	30	
	42	315849	7146403	294	30	
	43	315847	7146304	292	27	
	44	315847	7146205	291	24	
	45	315848	7146105	292	24	
	46	315846	7146004	292	20	
	47	316043	7146406	292	20	
	48	316047	7146501	291	20	
	49	316050	7146598	293	24	
	50	316049	7146698	296	24	
	51	316049	7146798	298	24	
	52	316049	7146898	297	24	
	53	316057	7147001	297	24	
	54	316049	7147100	300	30	
	55	316153	7146997	294	24	
	56	316149	7146902	295	20	

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Criteria	Commentary						Competent Professional – Graham Rolfe	
				<b>Total</b>			<b>1042.5</b>	
	<b>Phase 2 – November 2021 Drill Summary Data:</b>							
	<b>Hole</b>	<b>Easting</b>	<b>Northing</b>	<b>RL</b>	<b>Depth</b>	<b>Sub Total</b>	<b>Total</b>	
		<b>WGS84 m</b>	<b>WGS84 m</b>	<b>m</b>	<b>m</b>			
	15B	315748	7146903	305	42			
	16B	315749	7146804	304	40			
				<b>Total</b>		<b>82</b>		
	58	315651	7146801	305	40			
	59	315652	7146702	301	36			
	60	315649	7146603	295	29			
	61	315650	7146503	294	30			
	62	315649	7146394	295	30			
	63	315650	7146305	295	30			
	64	315651	7146206	295	30			
	65	315651	7146103	295	30			
	66	315650	7146005	294	30			
	67	315650	7145906	294	30			
	68	315630	7145846	293	30			
	69	315450	7145910	291	30			
	70	315449	7146010	291	27			
	71	315448	7146110	288	27			
	72	315449	7146208	290	24			
	73	315460	7146301	289	24			

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Criteria	Commentary							Competent Professional – Graham Rolfe		
	74	315452	7146410	284	24					
	75	315451	7146503	285	27					
	76	315554	7146610	297	30					
	77	315552	7146502	288	29					
	78	315550	7146408	288	27					
	79	315552	7146310	292	27					
	80	315549	7146207	297	30					
	81	315550	7146110	291	27					
	82	315548	7146013	292	27					
	83	315546	7145910	294	27					
	84	315348	7145905	292	27					
	85	315348	7146007	288	24					
	86	315349	7146108	286	21					
	87	315351	7146209	285	21					
	88	315358	7146295	284	20					
	89	315349	7146406	281	20					
	90	315247	7146301	279	24					
	91	315250	7146209	284	20					
	92	315248	7146110	288	20					
	93	315250	7146009	290	24					
	94	315249	7145913	293	24					
	95	315147	7145908	299	36					
	96	316047	7147191	304	30					
	97	316157	7147507	307	30					
	98	316153	7147397	306	30					
	99	316152	7147297	305	30					

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Criteria	Commentary							Competent Professional – Graham Rolfe	
	100	316149	7147200	300	30				
	101	316150	7147101	297	30				
	102	316150	7146800	296	30				
	103	316152	7146702	293	30				
	104	316147	7146604	296	30				
	105	315798	7146105	292	30				
	106	315798	7146203	291	30				
	107	315802	7146303	291	30				
				<b>Total</b>		<b>1393</b>	<b>1475</b>		
	<b>TDRC</b>								
	108	315800	7146402	294	24				
	109	315800	7146504	298	36				
	110	315802	7146546	299	27				
	111 - T	315802	7146550	299	24				
	112	315801	7146600	300	21				
	113 - T	315801	7146598	300	20				
	114	315799	7146651	301	24				
	115 - T	315802	7146647	301	20				
	116	315800	7146701	302	24				
	117 - T	315802	7146700	301	20				
	118	315800	7146752	302	27				
	119 - T	315803	7146751	302	27				
	120	315851	7146751	301	21				
	121 - T	315849	7146753	301	20				
	122	315851	7146700	300	20				
	123	315852	7146652	299	18				

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Criteria	Commentary							Competent Professional – Graham Rolfe	
				<b>Total</b>		<b>373</b>	<b>1848</b>		
	<b>Phase 3: March 2025 4C Core Drilling</b>								
	<b>TD4C</b>	<b>Easting mE</b>	<b>Northing mN</b>	<b>RL m</b>	<b>Depth m</b>	<b>SubTotal m</b>	<b>Total m</b>		
	124	315700	7146649	294	21.8	21.8			
	125	315700	7146448	291	27.0	27.0			
	126	315602	7145942	295	20.5	20.5			
	126RC				60.0	39.5	39.5(RC)		
	127	316101	7146650	288	18.1	18.1			
	128	315902	7146851	293	28.6	28.6			
	129	316204	7147050	285	18.0	18.0			
	130	316301	7147353	292	24.60	24.60	158.6 (4C)		
<b>Data aggregation methods</b>	No weighting or cut off grades have been applied at this stage.								
<b>Relationship between mineralisation widths and intercept lengths</b>	The geological strata are flat lying to shallow dipping and therefore the vertical RC drill holes of the 2021 Air Core Drilling intersected the kaolin mineralisation at a high angle.								

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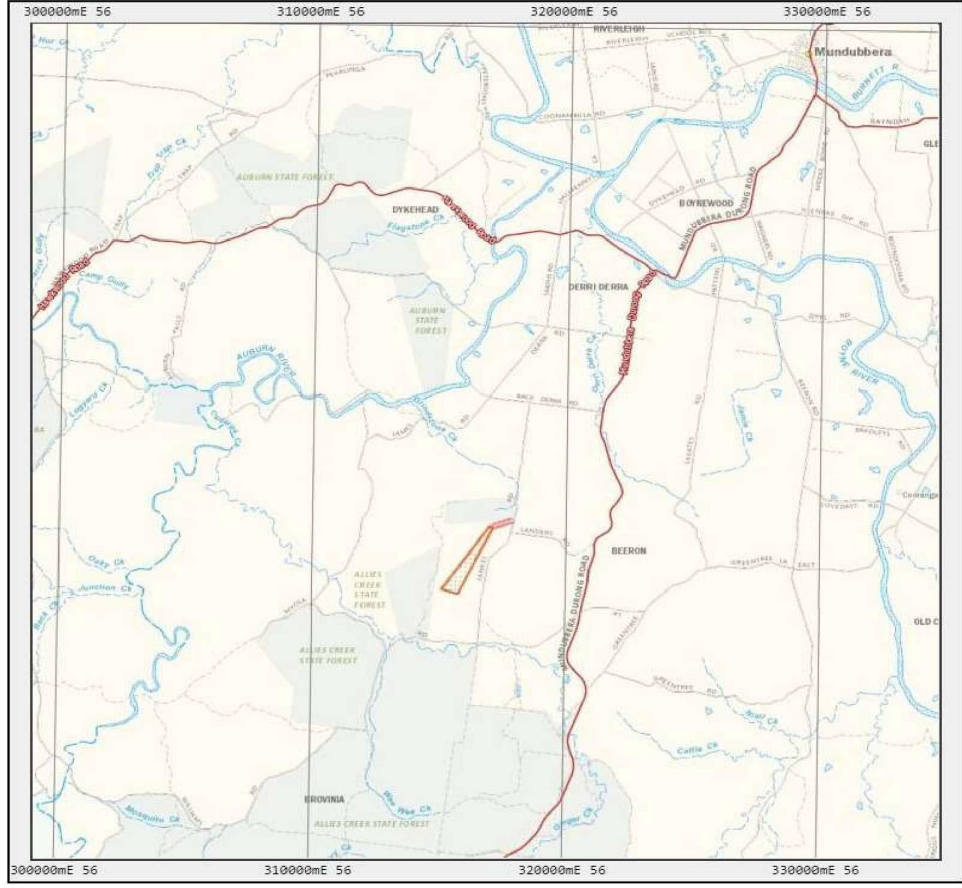
Criteria	Commentary	Competent Professional – Graham Rolfe
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**Diagrams**

**Toondoon ML 80126**

**Location**



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Legend located on next page

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Scale: 1:200000

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Print date: 20/4/2021  
Projection: Web Mercator EPSG 102100

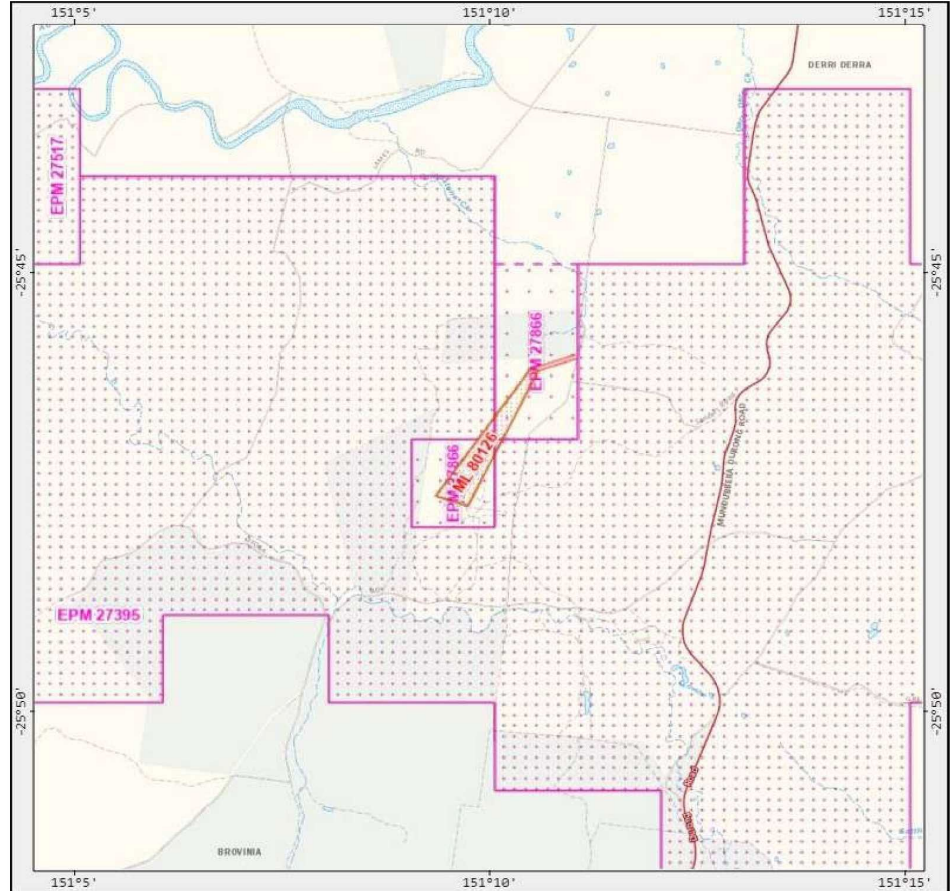
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Criteria	Commentary	Competent Professional – Graham Rolfe
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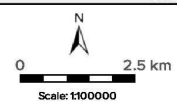
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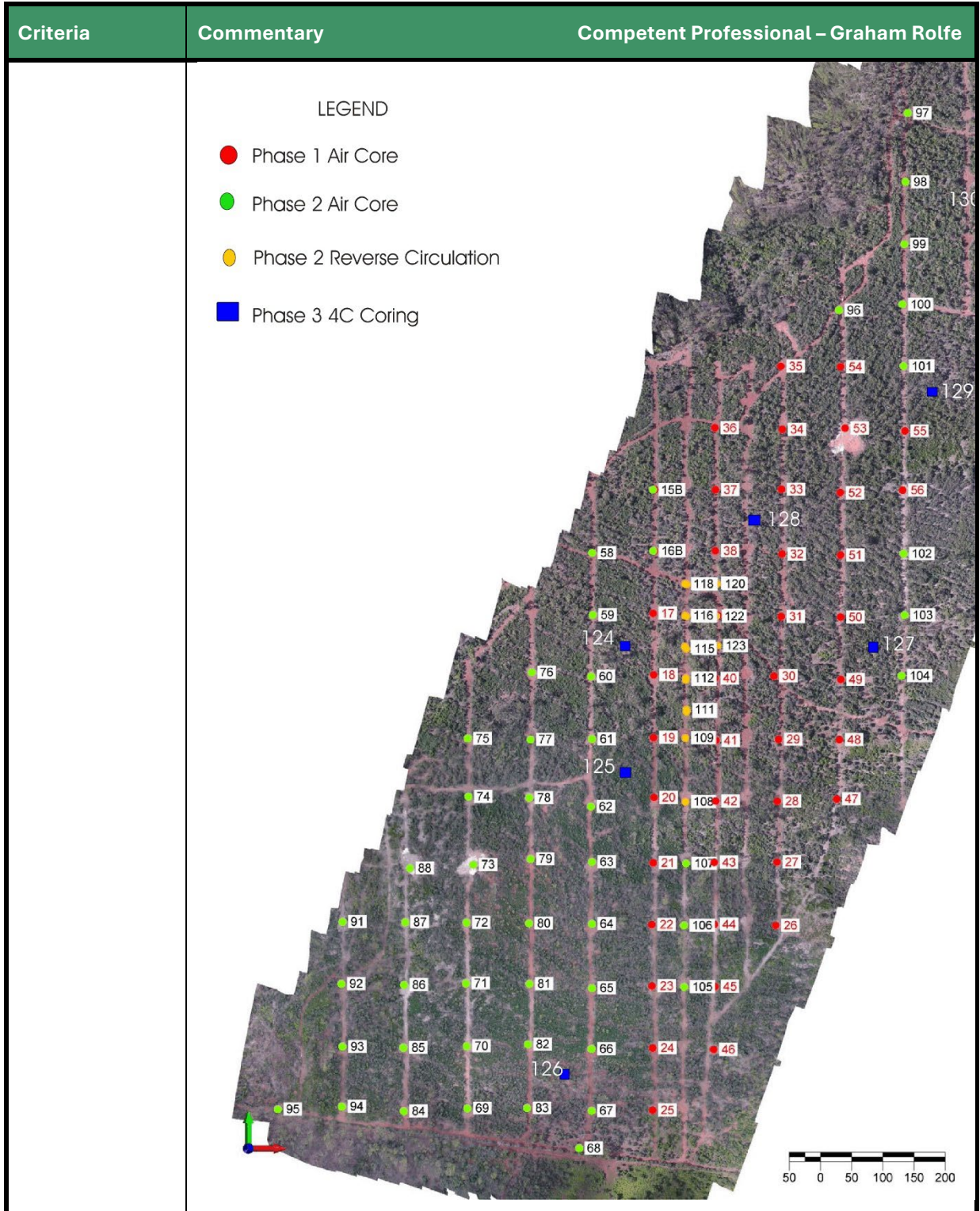
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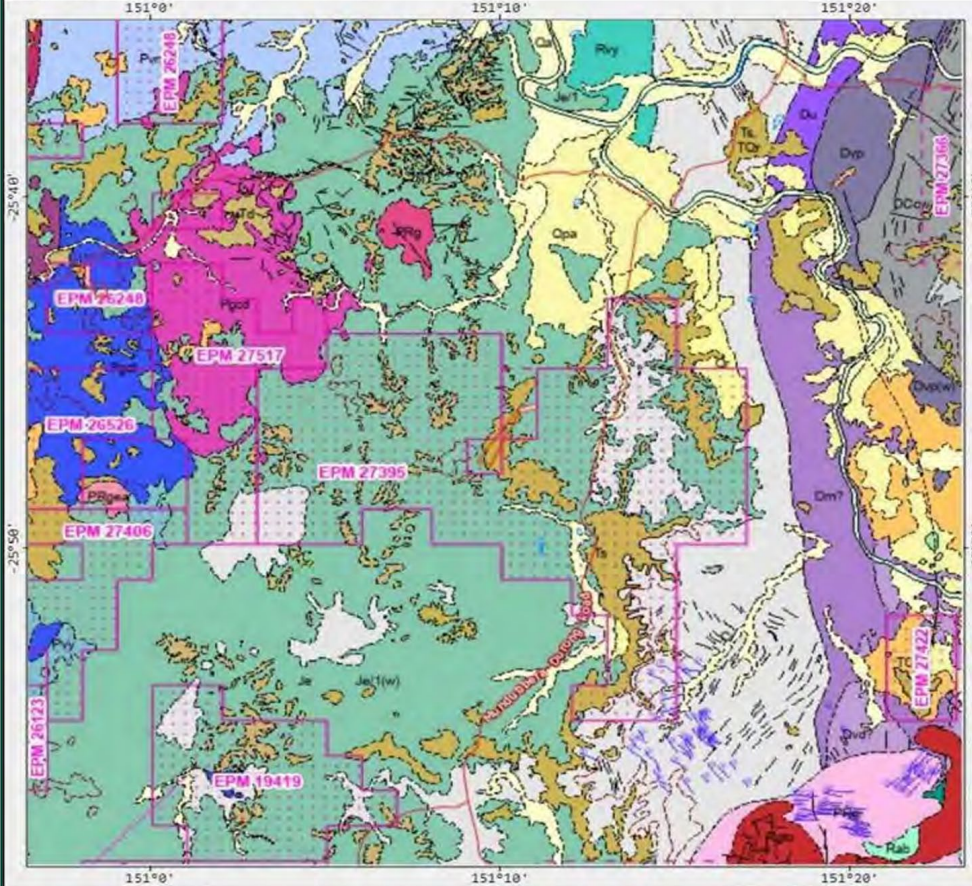
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Criteria	Commentary	Competent Professional – Graham Rolfe
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<p><b>Other substantive exploration data</b></p>	<p>No other meaningful exploration data exists to the knowledge of the competent person completing this JORC Table.</p>	
<p><b>Further work</b></p>	<p>Now the full drill hole geochemistry is available a resource evaluation will be completed using Micromine software. Subsequently these data will be tested with further drilling inside and external to the resource, testing the continuity of the resource and the potential for extensions of the resource.</p>	

### Section 3 Estimation and Reporting of Mineral Resources

(Criteria listed in section 1, and where relevant in section 2, also apply to this section.)

Criteria	Description	Competent Professional – Chris Ainslie/Graham Rolfe
<b>Database integrity</b>	<p>The database was originally constructed, validated and electronically provided by Graham Rolfe (Rock-Ex-Enterprises Pty Ltd) to Ausrocks Pty Ltd. Ausrocks reformatted the database into appropriate file formats checking the veracity of the assay results. The data was further validated and cross-checked against the geological logs. Micromine software 2022 validated the files which were used for the Mineral Resource Estimate. To ensure continuity and validity across the data sets, three separate files which cross-referenced the data were used. These were as follows:</p> <ul style="list-style-type: none"> <li>• Collar File – This file contains the Hole ID, Location (Northing, Easting and Z value), Azimuth and Inclination of each hole.</li> <li>• Interval File – A file containing the information collected at intervals (depth from, depth to) downhole. This included colour, hue and sample assay values.</li> <li>• Survey File – Showing the azimuth, orientation, or each hole. Note all holes were drilled vertically, which simplified the data.</li> </ul> <p>Sample intervals were collected at 1m throughout the drilling program. No sample bias based on the sample interval length.</p>	
<b>Site visits</b>	<p>The Competent Person (Graham Rolfe) undertook a site visit and was present for all drilling campaigns.</p> <p>The original resources estimation Competent Person (Chris Ainslie) undertook a site visit on 10 December 2021.</p>	
<b>Geological Interpretation</b>	<p>5 lithologies have been determined by geochemistry and geological interpretation – Bauxitic Clay, Plastic Clay, Kaolinite Clay (High Iron), Kaolinite Clay (Low Iron) and Sandy Clay.</p> <p>The interpreted geology of the Toondoon Kaolin Project is relatively robust, and any alternative interpretation of the deposit is considered unlikely to have a significant influence on the Mineral Resource Estimate undertaken. The known nature and formation of the deposit, together with consistent high grades achieved in drillholes, places a high degree of confidence in the geological interpretation. The detailed level of drilling has enabled confidence of the interpreted geology. Continuity of geology and grade (assays) can be readily identified and traced between drillholes.</p>	
<b>Dimensions</b>	<p>The Resource is approximately 2,000 long (NE-SW) and averages 500m wide (NW-SE) covering a surface area of approx. 82.5 hectares.</p> <p>The approximate average depth for each domain is as follows:</p> <ul style="list-style-type: none"> <li>• Bauxitic Clay: 4.0m</li> <li>• Plastic Clay: 5.7m</li> <li>• Kaolinite Clay (High Iron): 2.0m</li> <li>• Kaolinite Clay (Low Iron): 4.3m</li> </ul>	

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	<ul style="list-style-type: none"> <li>Sandy Clay: 13.3m (open at depth)</li> </ul>
<b>Estimation and modelling techniques</b>	<p>Micromine Software 2022 was used to complete the Upgraded Mineral Resource Estimate in accordance with the JORC 2012 Code. A block model was generated to model the overall deposit shape and volume. The block model was defined by the top of the resource (topography), the base of the resource (base of the drillholes), and the interpreted geological boundaries. Parent blocks were sized at 10mE x 10mN x 1mRL. Sub-blocks were sized at 1mE x 1mN x 1mRL. The block model was optimised, and the average Al<sub>2</sub>O<sub>3</sub> grade and quantity of the resource at varied reporting levels were computed.</p> <p>The block model was subjected to statistical and geostatistical analysis and the Ordinary Kriging (OK) method was used to populate the blocks. The Inverse Distance Weighting (IDW) method was used to check the model and yielded similar results. Swath plots were used to validate the interpolation technique to ensure accuracy. All assayed elements were modelled in the block model.</p> <p>The following parameters and assumptions formed the basis for the MRE Maiden in accordance with the JORC Code (2012).</p> <ul style="list-style-type: none"> <li>5 lithologies determined by geochemistry and geological interpretation – Bauxitic Clay, Plastic Clay, Kaolinite Clay (High Iron), Kaolinite Clay (Low Iron) and Sandy Clay.</li> <li>Topography – DEM sourced by drone survey.</li> <li>The resource boundary was determined by a combination of Mining Lease Boundary, geological interpretation and area of influence considerations.</li> <li>Density values as provided by Project Geologist.</li> <li>All assayed elements were reported as secondary elements constrained to the cut-off grade of Al<sub>2</sub>O<sub>3</sub>.</li> </ul>
<b>Moisture</b>	Mineral resource tonnages are estimated and reported as dry metric tonnes.
<b>Cut-off parameters</b>	A cut-off grade of 32% Al <sub>2</sub> O <sub>3</sub> was applied to the white kaolin clay data for the modelling and estimation process. The cut-off grade aided with determination of the domain boundaries which were determined by analysis of raw assay data down each individual drill hole. The cut-off grade applied is consistent with industry practice for these types of Kaolin deposits.
<b>Mining factors or assumptions</b>	No specifics have been factored into this MRE. Mining by open cut method is assumed and the block model vertical dimension of 1m reflects this assumption for small-medium equipment.
<b>Metallurgical factors or assumptions</b>	No metallurgical factors or assumptions have been included or deemed required at this stage of the resource estimation.
<b>Environmental factors or assumptions</b>	No environmental factors or assumptions have been included at this stage of the resource estimation.
<b>Bulk density</b>	<b>2021 Phase 2:</b> Ten samples from bull-dozed trenching were submitted to ALS for specific gravity analyses using the OA-GRA 08a method. The method records the specific gravity relative to unity with submersion of a wax coated sample into water.

	<p>The average SG for the rock types bauxitic clay, kaolinite clay and sandy clay were determined and the average for the respective rock types was calculated. No plastic clay was recovered so no analysis was conducted for this rock type.</p> <p>The sandy clay consists of kaolinite clay and fine to medium grained quartz. It could be anticipated that the SG of the sandy clay would be higher than the kaolinite. However, it is generally lower indicating there must be more pore space, resulting in a lower SG.</p> <p>The grey plastic clay generally consists of kaolinite with iron oxides and anatase. As the amount of quartz, iron oxide and anatase in the kaolinite does not have a consistent effect on the SG measurements, these elements will have little effect on the SG of the grey plastic clay. It was assumed that the SG of the plastic clay would be similar to the kaolinite clay i.e., 1.74 t/m<sup>3</sup>.</p> <p>The assumed density values first used in the MRE were Bauxitic Clay - 2.05 t/m<sup>3</sup>; Grey Plastic Clay - 1.74 t/m<sup>3</sup>; Kaolinite Clay: 1.74 t/m<sup>3</sup> and Sandy Clay: 1.69 t/m<sup>3</sup></p> <p><b>2025 Phase 3:</b> With the 4C core drilling, further DBD measurements were completed on the drill core. The initial batch, 158051, of white clay and the immediate overlying grey plastic clay samples were split, sampled, and dispatched to ALS Laboratories, Brisbane. Core splitting was affected by using a metal spatula because the core was sufficiently soft. The broken nature of the core after splitting made it very difficult to estimate the 50% sampling of the core. The effective fraction of sampled core was calculated using the retained core weight and the dispatched weight received by ALS Laboratories.</p> <p>For the initial batch, 158051 ALS weighed the dispatched samples as received by the laboratory. The samples were then dried, crushed, and split resulting in about 1kg of material which was pulverized. After ALS had finished assaying batch 158051, The dried reject crushed fraction, the bulk milled fraction and the smaller assay packet were collected and returned to the Mundubbera shed. Two weighing machines were used, a larger platform machine suitable for weighing tared core trays and a smaller one suitable for weighing smaller pieces of core and the smaller bags of samples. For the assayed samples of Batch 158051 the dried weight of the crushed fraction and the two pulverized sample bags were weighed and summed to give the dried weight of each sample. The dispatched sample split was the weighed as a wet sample received by ALS. The remaining core of the whole core and the split and sampled sections were weighed. This resulted in the retained core weights of the samples of the initial batch. The weight of the retained core of the split and sampled sections were added to the dispatched weights of the samples received by ALS, to calculate the weight of the whole wet core of these samples.</p> <p>As the core was not exactly a 50% split, the percentage of the dispatched sample was calculated as a fraction of the total wet core weight, i.e. retained wet core weight plus the dispatched sample weight. The percentage of free water in the samples was calculated by subtracting the dried sample weight from the dispatched wet weight of the sample, expressed as a percentage.</p> <p>The density of the dried sample was calculated by dividing the total dried sample weight by the calculated volume of the dried split. The volume of the dried sample was calculated by using the core surface area multiplied by the sample length, i.e. <math>22/7 \cdot r^2 \cdot l</math>, and reduced by the dispatched fraction of the total volume.</p> <p>The second batch 158052 was treated differently. The whole core was initially weighed, i.e. wet core weight. The core was split and sampled after the individual samples were processed. As with the first batch, the dispatched wet samples were weighed by ALS, prior to drying. After drying before crushing, splitting, and pulverizing</p>
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	<p>the sample was weighed again, i.e. dried weight. Like Batch 158051, the density of the dried samples and the free water contents were calculated.</p> <p>The drill recovery factor resulted in slightly higher dried densities, due to the slightly higher weights of recovered core with the same volume.</p> <p>The density of the bauxite clay, the grey plastic clay, the high iron white kaolin clay, the low iron (&lt;0.5%) white kaolin clay and the sandy clay were calculated using the weight of dried core, corrected by recovery factors and the volumes of the sample interval.</p> <p>The resultant DBD of the lithologies are:</p> <table data-bbox="507 577 1082 801"> <tr> <td>Bauxitic clay -</td> <td>1.66 t/m<sup>3</sup></td> </tr> <tr> <td>Gray plastic clay -</td> <td>1.46 t/m<sup>3</sup></td> </tr> <tr> <td>High iron (&gt;0.5%) white kaolin clay -</td> <td>1.42 t/m<sup>3</sup></td> </tr> <tr> <td>Low iron (&lt;0.5%) white kaolin clay -</td> <td>1.44 t/m<sup>3</sup> and</td> </tr> <tr> <td>Sandy Clay -</td> <td>1.65 t/m<sup>3</sup></td> </tr> </table>	Bauxitic clay -	1.66 t/m <sup>3</sup>	Gray plastic clay -	1.46 t/m <sup>3</sup>	High iron (>0.5%) white kaolin clay -	1.42 t/m <sup>3</sup>	Low iron (<0.5%) white kaolin clay -	1.44 t/m <sup>3</sup> and	Sandy Clay -	1.65 t/m <sup>3</sup>
Bauxitic clay -	1.66 t/m <sup>3</sup>										
Gray plastic clay -	1.46 t/m <sup>3</sup>										
High iron (>0.5%) white kaolin clay -	1.42 t/m <sup>3</sup>										
Low iron (<0.5%) white kaolin clay -	1.44 t/m <sup>3</sup> and										
Sandy Clay -	1.65 t/m <sup>3</sup>										
<p><b>Classification</b></p>	<p>The Toondoon Kaolin Project has been broadly defined by drilling, and the geological controls are reasonably well understood. The drill spacing and interpreted geological continuity allowed three resource categories to be defined (Measured, Indicated, and Inferred Mineral Resource) in accordance with the JORC 2012 Code</p> <p>In accordance with the JORC Code (2012), requirements were developed to allow for areas of the Toondoon Kaolin Project to be classified as a Measured, Indicated, and Inferred Mineral Resource.</p> <ul style="list-style-type: none"> <li>• To meet the requirements of a Measured Mineral Resource, drillholes had to show geological continuity between gridded drillholes with a confirmatory spacing (100m x 100m with infill holes with a minimum of one hole drilled in between each 4 x 100m drillhole ‘square’).</li> <li>• To meet the requirements of an Indicated Mineral Resource, drillholes had to show geological continuity between gridded drillholes with a reconnaissance spacing (100m x 100m)</li> <li>• To meet the requirements of an Inferred Mineral Resource, drillholes showed geological continuity between gridded drillholes with a reconnaissance spacing (100m x 100m) but had limited cross-sectional control (2 or 3 drillholes in cross section).</li> </ul> <p>The result appropriately reflects the Competent Persons view of the deposit.</p>										
<p><b>Audits or reviews</b></p>	<p>All calculations have been reviewed internally by Ausrocks.</p>										
<p><b>Discussion of relative accuracy/ confidence</b></p>	<p>It is the opinion of the Competent Persons that the relative accuracy and confidence level across the reported geological intervals is adequate, given the drill density and the continuity of geochemical samples.</p>										

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## APPENDIX 4

### Kaolinite Content of Toondoon Ore Clays

The rationale for updating the kaolinite content in Toondoon ore clays from 80-90% to >90%, in accordance with JORC (2012) guidelines, is based on a more accurate understanding of thermal analysis data presented in the CQU Final report<sup>14</sup>, coupled with additional methods of indirectly determining kaolinite content based on mineralogical and chemical data<sup>15</sup>.

A comprehensive rationale for this update is presented in **Table 21**.

**Table 21: Kaolinite Content of Toondoon Ore Clays**

Aspect	Previous Estimate (>80%)	Updated Estimate (>90%)	Rationale for Update
<b>Testing Methods</b>	TGA (350–650°C), limited XRD	TGA (350–750°C), XRF Al <sub>2</sub> O <sub>3</sub> reconciliation, qXRD, LOI	Multiple complementary methods now used, aligning with best practice under JORC (2012) for mineralogical confidence.
<b>Analytical Basis</b>	Based on conservative interpretation of TGA data <sup>20</sup> (350–650°C) from CQU report	Incorporates broader TGA range (350–750°C), XRF reconciliation, qXRD, and LOI	The previous method underestimated kaolinite due to a narrow temperature range. Updated methods capture full dehydroxylation range, improving accuracy. <ul style="list-style-type: none"> <li>Plastic clay = 91.2%</li> <li>High-iron kaolinite = 91.9%</li> <li>Low-iron kaolinite = 92.8%.</li> </ul>
<b>XRF Al<sub>2</sub>O<sub>3</sub> Reconciliation</b>	Not emphasised	Used to calculate kaolinite content, assuming minimal Al-bearing impurities	For example, 35.5% Al <sub>2</sub> O <sub>3</sub> / 39.5% (theoretical max) = ~90% kaolinite. Valid if muscovite and other Al phases are minor (confirmed by XRD).
<b>qXRD and XRD Support</b>	Limited or qualitative	Quantitative XRD confirms kaolinite dominance in PC, HI, and LI domains	qXRD shows minimal impurities and confirms kandite phase dominance, supporting high kaolinite purity. Σkandite and amorphous material = >90% for all 3 domains.
<b>LOI and Elemental Closure</b>	Not fully integrated	Al <sub>2</sub> O <sub>3</sub> + SiO <sub>2</sub> + LOI = >90%	High elemental closure supports minimal non-kaolinite phases, reinforcing high kaolinite content. <ul style="list-style-type: none"> <li>Plastic clay = 91.7%</li> <li>High-iron kaolinite = 95.2%</li> <li>Low-iron kaolinite = 97.4%</li> </ul>
<b>Consistency with Mineral Resource Update</b>	Based on older data	Aligned with 2025 Mineral Resource update and DBD data	Ensures internal consistency across technical documentation and supports classification confidence.
<b>JORC (2012) Compliance</b>	Conservative, possibly under-representative	More representative of actual mineralogy	JORC requires reasonable prospects for eventual economic extraction. Higher kaolinite content supports this by indicating higher-grade feed.

### Summary

The decision to update the kaolinite content from >80% to >90% is supported by a more comprehensive and technically robust dataset.

<sup>20</sup> CQU (2024). Zeotech TGA-DTG Nitrogen. Confidential Excel spreadsheet.

The previous estimate, while not incorrect, was based on a narrower interpretation of thermal analysis data and did not fully leverage the available mineralogical and chemical data.

The updated estimate integrates:

- Thermogravimetric Analysis (TGA) over a broader temperature range (350–750°C),
- XRF-based Al<sub>2</sub>O<sub>3</sub> reconciliation assuming minimal interfering phases,
- Quantitative XRD (qXRD) confirming kaolinite dominance,
- Loss on Ignition (LOI) and elemental closure supporting mineralogical purity.

These methods collectively provide a more accurate and defensible basis for the >90% kaolinite claim, aligning with JORC (2012) principles of transparency, materiality, and competence.

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APPENDIX 5

Updated Mineral Resource Estimate

Toondoon Mineral Resource Estimate as of January 2022:

Resource Category	Lithology	Volume (Mm3)	Density (t/m3)	Tonnes (Mt)	Al <sub>2</sub> O <sub>3</sub> %	Fe <sub>2</sub> O <sub>3</sub> %	SiO <sub>2</sub> %	TiO <sub>2</sub> %	LOI %	K <sub>2</sub> O %	Cut-Off Grade
Measured	Bauxitic Clay	0.75	2.05	1.53	38.81	13.86	21.92	4.53	20.07	0.06	No cut-off applied
Measured	Plastic Clay	1.38	1.74	2.40	35.45	4.98	41.39	3.38	14.20	0.02	No cut-off applied
Measured	Kaolinite Clay (High Iron)	0.51	1.74	0.88	36.79	1.92	44.92	2.19	13.63	0.05	No cut-off applied
Measured	Kaolinite Clay (Low Iron)	0.90	1.74	1.57	37.48	0.41	46.50	1.59	13.43	0.12	No cut-off applied
Measured	Sandy Clay	0.80	1.69	1.35	26.79	0.73	61.24	1.21	9.52	0.05	23% Al <sub>2</sub> O <sub>3</sub>
Indicated	Bauxitic Clay	1.51	2.05	3.09	37.04	16.05	22.62	4.19	19.43	0.05	No cut-off applied
Indicated	Plastic Clay	2.62	1.74	4.56	35.22	4.84	42.09	3.15	14.06	0.03	No cut-off applied
Indicated	Kaolinite Clay (High Iron)	0.95	1.74	1.66	36.48	2.32	45.24	1.85	13.49	0.08	No cut-off applied
Indicated	Kaolinite Clay (Low Iron)	1.15	1.74	1.99	37.57	0.40	46.43	1.58	13.41	0.12	No cut-off applied
Indicated	Sandy Clay	1.46	1.69	2.46	26.10	0.76	62.15	1.21	9.25	0.05	23% Al <sub>2</sub> O <sub>3</sub>
Inferred	Bauxitic Clay	0.48	2.05	0.99	30.73	27.86	22.44	3.19	15.18	0.03	No cut-off applied
Inferred	Plastic Clay	0.51	1.74	0.89	34.19	5.88	42.41	3.55	13.31	0.03	No cut-off applied
Inferred	Kaolinite Clay (High Iron)	0.11	1.74	0.19	34.81	6.00	44.02	1.46	13.07	0.15	No cut-off applied
Inferred	Sandy Clay	0.19	1.69	0.33	28.04	2.22	57.93	1.19	10.12	0.06	23% Al <sub>2</sub> O <sub>3</sub>

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**Toondoon Mineral Resource Estimate as of June 2025:**

Resource Category	Lithology	Volume (Mm3)	Density (t/m3)	Tonnes (Mt)	Al <sub>2</sub> O <sub>3</sub> %	Fe <sub>2</sub> O <sub>3</sub> %	SiO <sub>2</sub> %	TiO <sub>2</sub> %	LOI %	K <sub>2</sub> O %	Cut-Off Grade
Measured	Bauxitic Clay	0.75	1.66	1.25	38.81	13.86	21.92	4.53	20.07	0.06	No cut-off applied
Measured	Plastic Clay	1.38	1.46	2.01	35.45	4.98	41.39	3.38	14.20	0.02	No cut-off applied
Measured	Kaolinite Clay (High Iron)	0.51	1.42	0.72	36.79	1.92	44.92	2.19	13.63	0.05	No cut-off applied
Measured	Kaolinite Clay (Low Iron)	0.90	1.44	1.30	37.48	0.41	46.50	1.59	13.43	0.12	No cut-off applied
Measured	Sandy Clay	0.80	1.65	1.32	26.79	0.73	61.24	1.21	9.52	0.05	23% Al <sub>2</sub> O <sub>3</sub>
Indicated	Bauxitic Clay	1.51	1.66	2.51	37.04	16.05	22.62	4.19	19.43	0.05	No cut-off applied
Indicated	Plastic Clay	2.62	1.46	3.83	35.22	4.84	42.09	3.15	14.06	0.03	No cut-off applied
Indicated	Kaolinite Clay (High Iron)	0.95	1.42	1.35	36.48	2.32	45.24	1.85	13.49	0.08	No cut-off applied
Indicated	Kaolinite Clay (Low Iron)	1.15	1.44	1.66	37.57	0.40	46.43	1.58	13.41	0.12	No cut-off applied
Indicated	Sandy Clay	1.46	1.65	2.41	26.10	0.76	62.15	1.21	9.25	0.05	23% Al <sub>2</sub> O <sub>3</sub>
Inferred	Bauxitic Clay	0.48	1.66	0.80	30.73	27.86	22.44	3.19	15.18	0.03	No cut-off applied
Inferred	Plastic Clay	0.51	1.46	0.74	34.19	5.88	42.41	3.55	13.31	0.03	No cut-off applied
Inferred	Kaolinite Clay (High Iron)	0.11	1.42	0.16	34.81	6.00	44.02	1.46	13.07	0.15	No cut-off applied
Inferred	Sandy Clay	0.19	1.65	0.31	28.04	2.22	57.93	1.19	10.12	0.06	23% Al <sub>2</sub> O <sub>3</sub>

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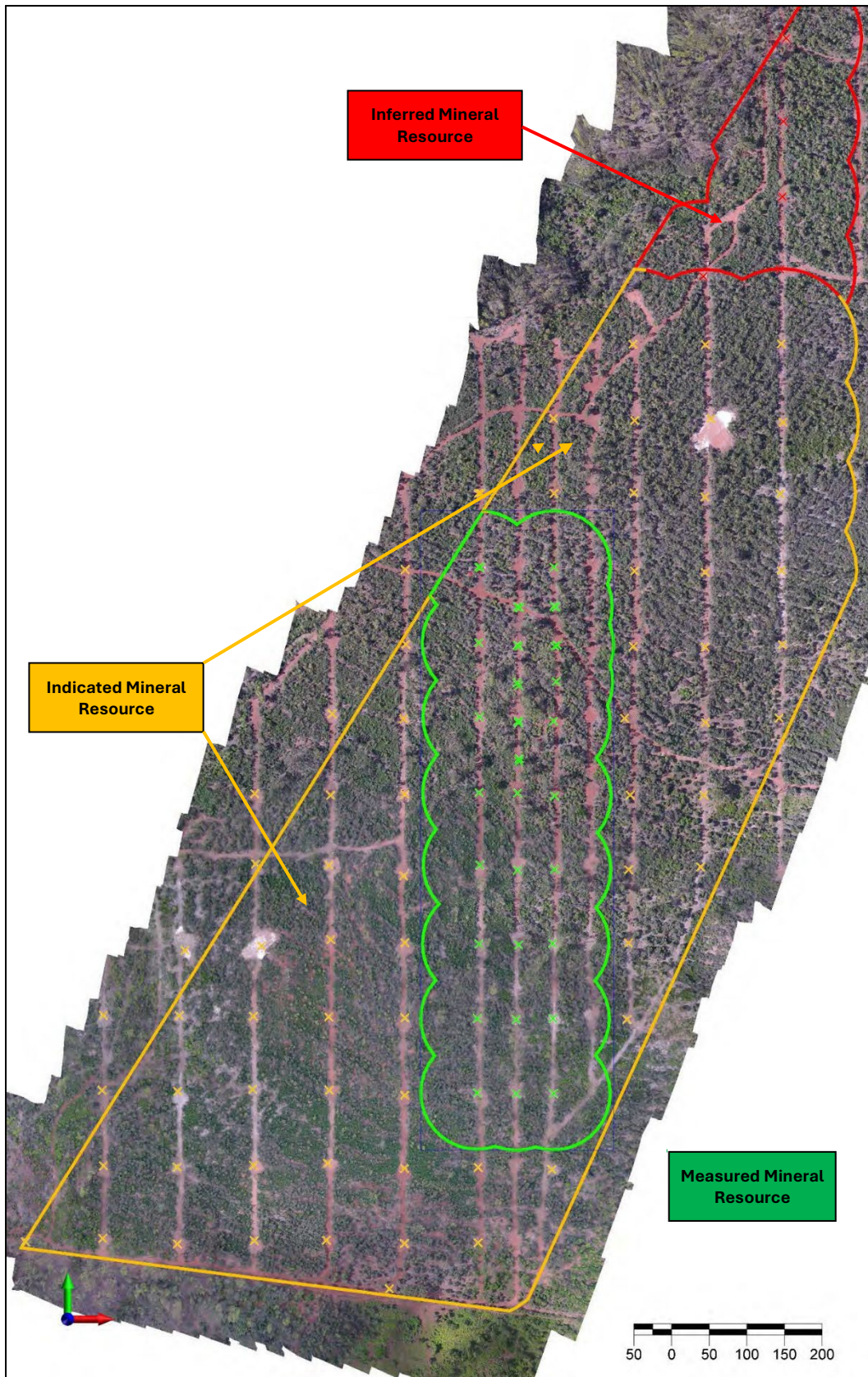
APPENDIX 6

Annual Production Schedule from the Toondoon Mine Site

	Kaolin DSO	Cosmetic Kaolin DSO	AusPozz™ Feed	Total	Resource Category (%)	
					Measured & Indicated	Inferred
Year 1	143,434	9,000	-	152,434	100%	-
Year 2	143,434	9,000	-	152,434	100%	-
Year 3	143,434	9,000	60,846	213,280	100%	-
Year 4	143,434	9,000	363,259	515,693	100%	-
Year 5	143,434	9,000	363,259	515,693	100%	-
Year 6	143,434	9,000	363,259	515,693	100%	-
Year 7	143,434	9,000	363,259	515,693	100%	-
Year 8	143,434	9,000	363,259	515,693	100%	-
Year 9	143,434	9,000	363,259	515,693	100%	-
Year 10	143,434	9,000	363,259	515,693	100%	-
Year 11	143,434	9,000	363,259	515,693	100%	-
Year 12	143,434	9,000	363,259	515,693	100%	-
Year 13	143,434	9,000	363,259	515,693	100%	-
Year 14	143,434	9,000	363,259	515,693	100%	-
Year 15	143,434	9,000	363,259	515,693	100%	-
Year 16	143,434	9,000	363,259	515,693	100%	-
Year 17	143,434	9,000	363,259	515,693	100%	-
Year 18	143,434	9,000	363,259	515,693	100%	-
Year 19	143,434	9,000	363,259	515,693	100%	-
Year 20	143,434	9,000	363,259	515,693	100%	-
<b>Total LOM Dispatched</b>	<b>2,868,687</b>	<b>180,000</b>	<b>6,236,242</b>	<b>9,284,929</b>	<b>9,284,929</b>	<b>Nil</b>
<b>Transport loss</b>	<b>1%</b>	<b>nil</b>	<b>1%</b>			
<b>Total Delivered</b>	<b>2,840,000</b>	<b>180,000</b>	<b>6,173,880</b>	<b>9,222,567</b>		
<b>Closing Mine Stock</b>	<b>21,633</b>	<b>Nil</b>	<b>78,744</b>	<b>100,376</b>		

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APPENDIX 7



Plan showing resource classification (source: Ausrocks, 2022)

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