



THUNDERBIRD MINERAL SANDS PROJECT A LONG-LIFE ZIRCON RICH DEVELOPMENT IN THE KIMBERLEY

Thunderbird large scale, undeveloped zircon-rich mineral sands deposit

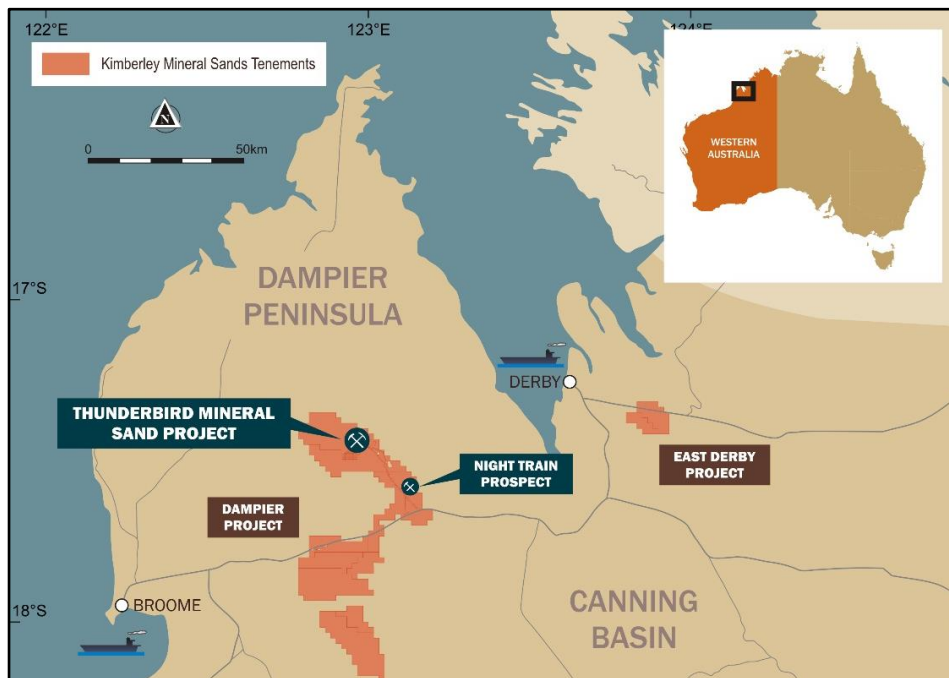
Stage One of Thunderbird is an AUD 361 million development

Stage one of Thunderbird will create 365 jobs during construction and 335 jobs during operations (jobs include direct and contractor employees)

Government support with AUD 160 million financing from Northern Australia Infrastructure Facility

Low environmental impact due to continuous rehabilitation process

Stage 1 mining inventory of 370mt at 13.5% HM, including 1.03% zircon and 3.74% ilmenite



Kimberley Mineral Sands is a 50:50 joint venture between Sheffield Resources Limited and Yansteel

Sheffield Resources is an ASX listed mining company and Yansteel is a wholly owned subsidiary of Tangshan Yanshan Iron & Steel Co. Ltd – a privately owned steel manufacturer headquartered in Hebei, China

The Thunderbird Mineral Sands Project is one of the world's largest, undeveloped zircon-rich mineral sands deposit.

Located in northern Western Australia – a low risk mining jurisdiction with a close proximity to the Asian markets

Thunderbird is targeting production to commence in H1 2024

Thunderbird is a technically low risk, modest capex project that is expected to generate strong cash margins over an exceptionally long mine-life spanning multiple decades

Thunderbird will produce three mineral sand products:

- 1) An ilmenite rich magnetic concentrate
- 2) A zircon rich non-magnetic concentrate and
- 3) A paramagnetic concentrate containing high value titanium minerals and rare earths

Thunderbird products contain the industrial minerals ilmenite and zircon. Ilmenite is used as a titanium pigment used in the production of paint, plastics and paper, and zircon is used for ceramics, refractories and foundry casting

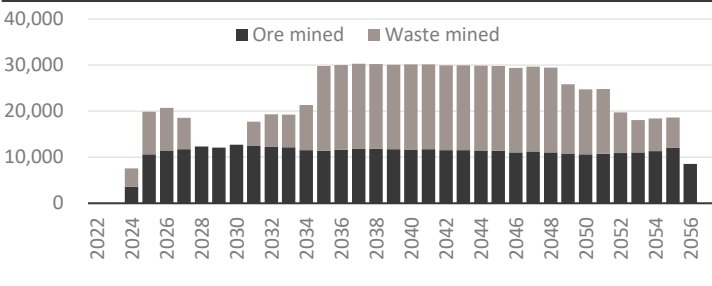


THUNDERBIRD MINERAL SANDS PROJECT PROJECT ECONOMICS

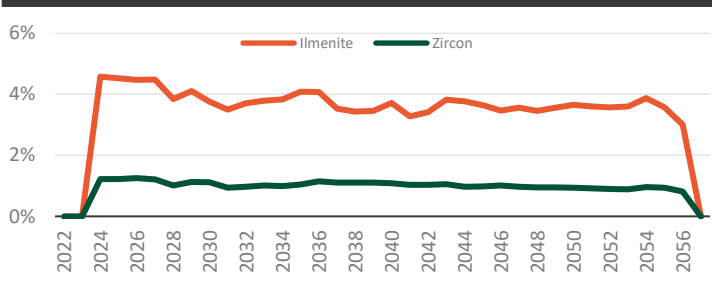
2022 Bankable Feasibility Study Outcomes

Metric	Stage 1+2	Stage 1 (only)
Thunderbird post tax NPV_g	AUD 1,279m	AUD 724m
Post tax project IRR	27.5%	26.9%
Project Gross Revenue	AUD 16.8bn	AUD 10bn
Project EBITDA	AUD 8.1bn	AUD 4.1bn
Revenue to Cost Ratio (Yr 1-10)	2.4:1	2.1:1
Mining inventory		
<i>Reserves</i>	754Mt	370Mt
<i>Grade</i>	11.0% HM	13.5% HM
Mine life	36 years	33 years
Annual average product sales		
<i>Magnetic concentrate</i>	996kt	653kt
<i>Non-magnetic concentrate</i>	279kt	183kt
<i>Paramagnetic concentrate</i>	119kt	78kt
Annual avg sale price (FOB)		
<i>Magnetic concentrate</i>	US\$130/t	US\$126/t
<i>Non-magnetic concentrate</i>	US\$745/t	US\$753/t
<i>Paramagnetic concentrate</i>	US\$107/t	US\$108/t
Life of Mine Revenue Split		
<i>Magnetic concentrate</i>	37%	36%
<i>Non-magnetic concentrate</i>	59%	60%
<i>Paramagnetic concentrate</i>	4%	4%
Development Capital Expenditure	AUD 361 +Stage 2 AUD 258m in for Yr 5	AUD 361m

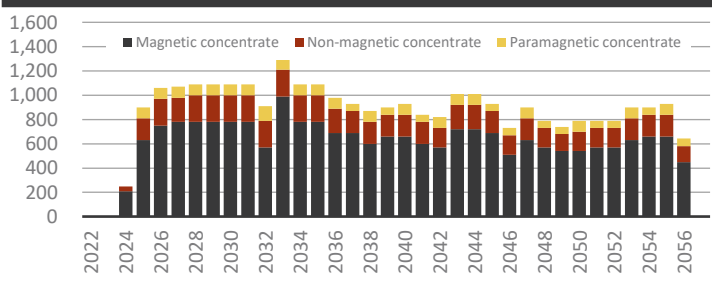
Total Material mined per year (kt)¹



In-situ grade (as % of ore mined)¹



Final product sold per year (kt)¹



BFS financials post tax output (AUDm)¹

