



MINOTAUR EXPLORATION LIMITED
ACN 108 483 601
ASX: MEP

MINOTAUR
EXPLORATION

24 June 2020

ASX Release

ADI grant recognises Peake and Denison project potential, South Australia

Minotaur Exploration Ltd (ASX: MEP, 'Minotaur') has been awarded a \$300,000 Accelerated Discovery Initiative (ADI) grant by South Australia's Department of Energy and Mining for Minotaur's 100% owned Peake and Denison project, located 750km NNW of Adelaide (Figure 1). The grant, adjudicated from a competitive field, provides funding support for a program of work comprising geophysical surveys and follow-up drilling.

ADI Grant

The South Australian Government's ADI grant recognises the technical merits of Minotaur's planned ground-based Audio Magnetotelluric (AMT) surveys and follow-up diamond drilling within the Peake and Denison area. Minotaur will receive up to \$300,000 toward work program costs.

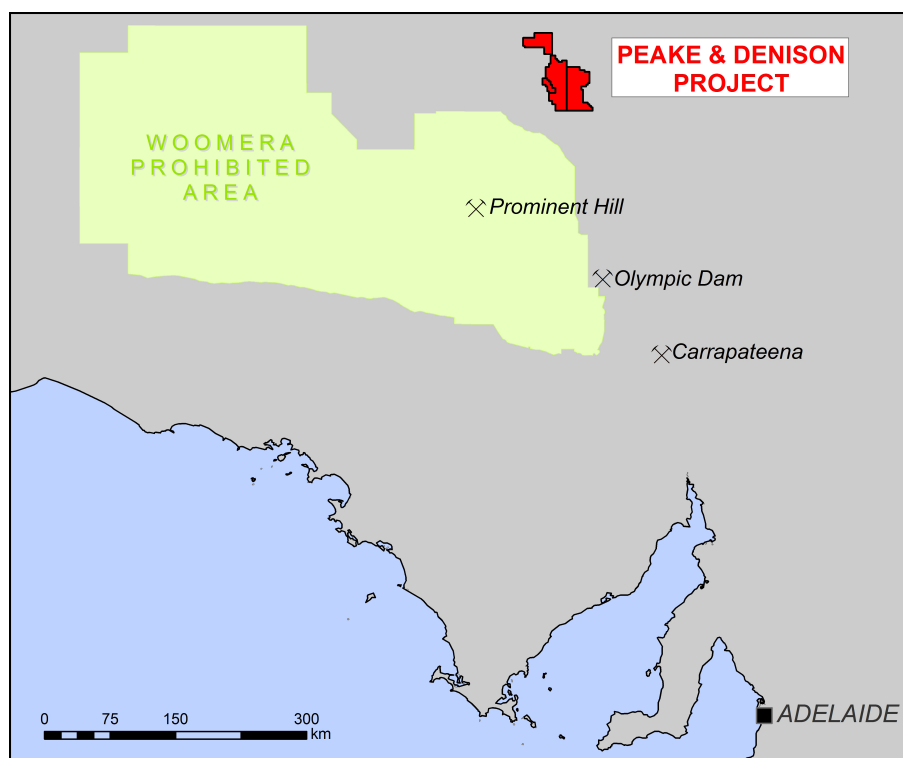


Figure 1: Location of Peake and Denison Project

Exploration Model

Potential for Iron Oxide Copper Gold (IOCG) style mineralisation is evident within the Peake and Denison area with copper mineralisation in magnetite-chalcopyrite-pyrite breccia recorded in historic drilling. Intense Fe-Na-Ca alteration was recently dated by Minotaur. The dates of the alteration assemblages are broadly the same age (1520-1470Ma) as pre-mineralisation alteration in the Cloncurry district of NW Qld which is known to be associated with IOCG deposits in that region, including the very large Ernest Henry Cu-Au deposit. Granite intrusion at Peake and Denison occurred at ~1530Ma - correlating with the same age range as the Williams – Naraku granites at Cloncurry (1547-1493Ma) linked to local copper-gold mineralisation.

Magnetite-associated Broken Hill Type (BHT) zinc-lead-silver mineralisation in metasedimentary and metavolcanic sequences subjected to later high-grade metamorphism, similar in style to the world-class Cannington silver-lead-zinc deposit in NW Qld, is similarly considered a possible mineralisation style at Peake and Denison.

Multiple strong magnetic anomalies occur across the Peake and Denison area. Minotaur considers these represent targets prospective for both IOCG and BHT styles of mineralisation (Figure 2). A select number will be tested through ADI funding support.

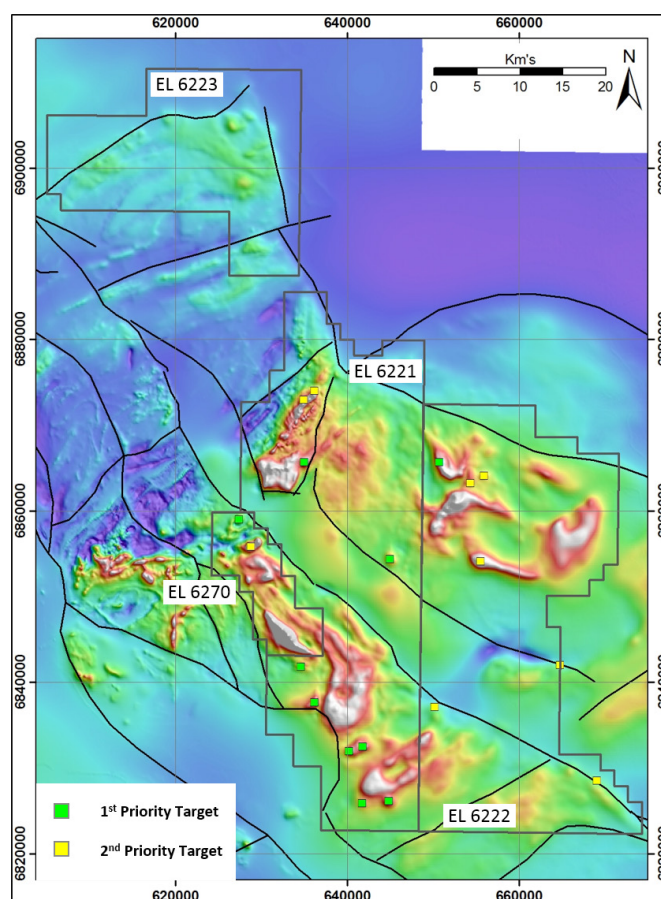


Figure 2: Priority magnetic anomalies throughout the Peake and Denison project area

Work Plan

Several discrete priority targets have been defined using innovative 3D magnetic cube modelling and conventional 2D and 3D magnetic and gravity modelling. Minotaur proposes to collect AMT data over 4-6 targets to help rank them prior to drill testing. All of the targets lie under cover, with modelled depth to top ranging 100-300m. AMT is a geophysical technique that maps conductivity possibly related to mineralisation and is particularly well suited to areas of deeper cover where other electrical geophysical techniques such as IP and EM are not suitable.

Two targets are presented below for illustration: the Leichhardt/A7V3 IOCG target (Figures 3-5) and Mawson BHT target (Figures 6-8), with AMT planned across both anomalies.

Subject to results of the AMT survey, it is expected 2-3 targets could proceed to drilling status.

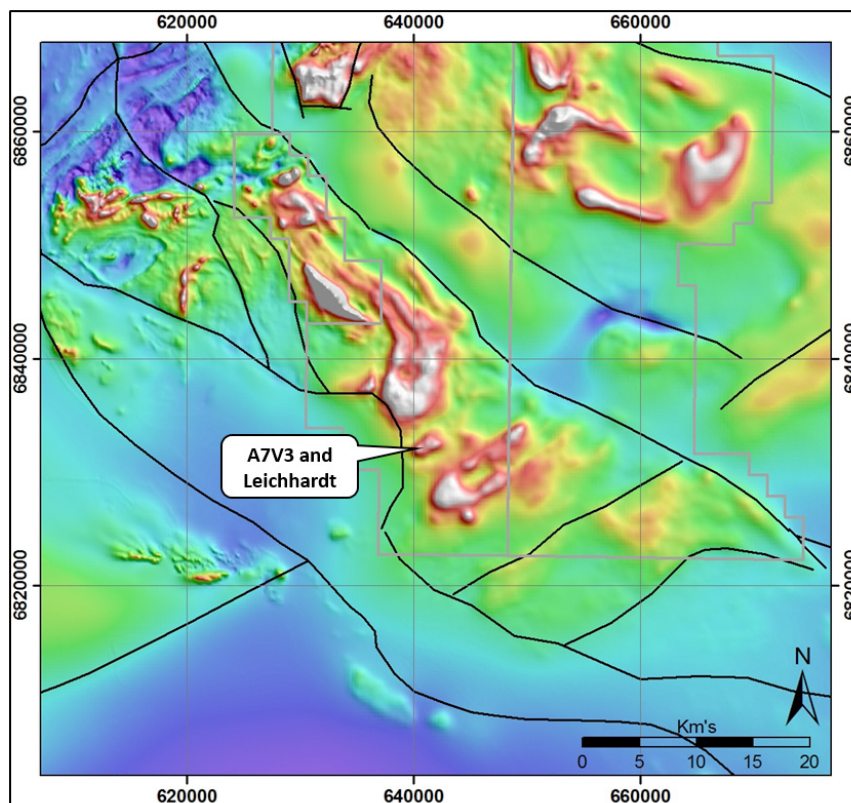


Figure 3: Twin-peaked A7V3 - Leichhardt IOCG target magnetic anomaly

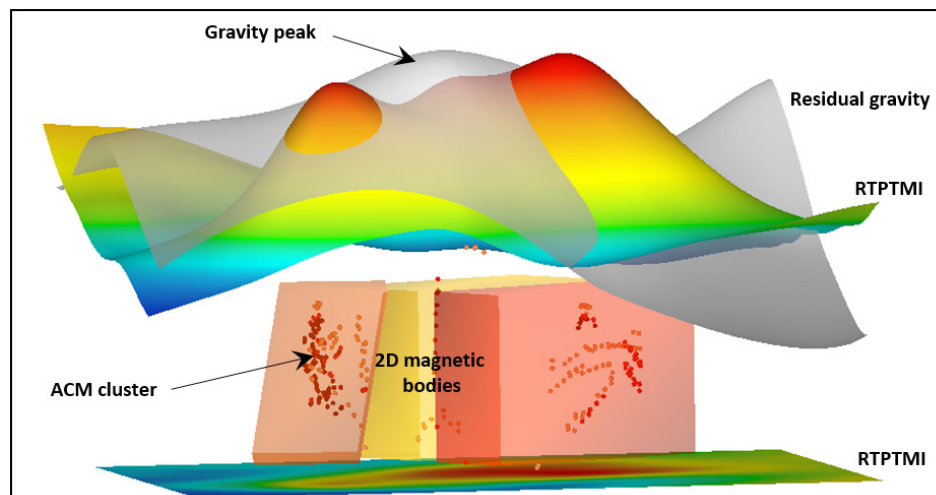


Figure 4: A7V3 -Leichhardt target with 1VD gravity and RTPTMI images, 2D magnetic model and AMC 3D magnetic cube clusters

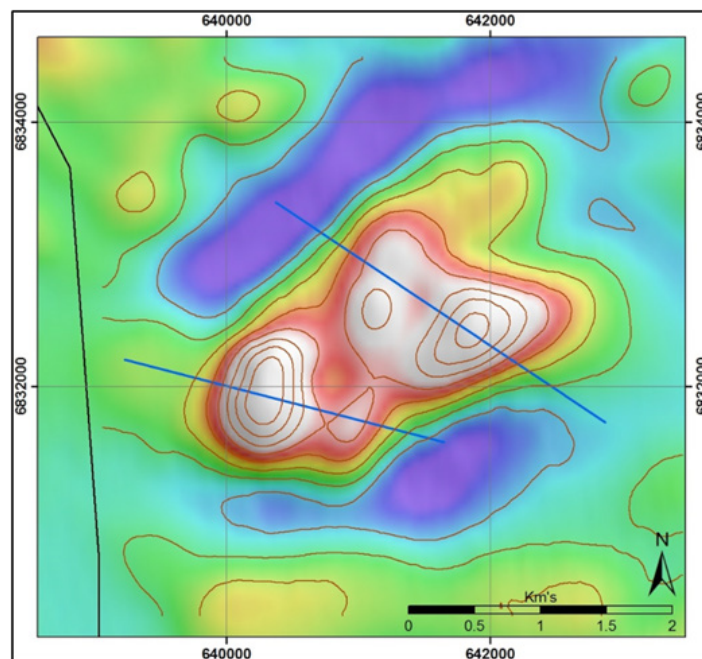


Figure 5: RTP1VD magnetic image with contours highlighting the twin peak anomalies (A7V3 on left and Leichhardt on right).
Single lines of AMT are planned over each magnetic peak

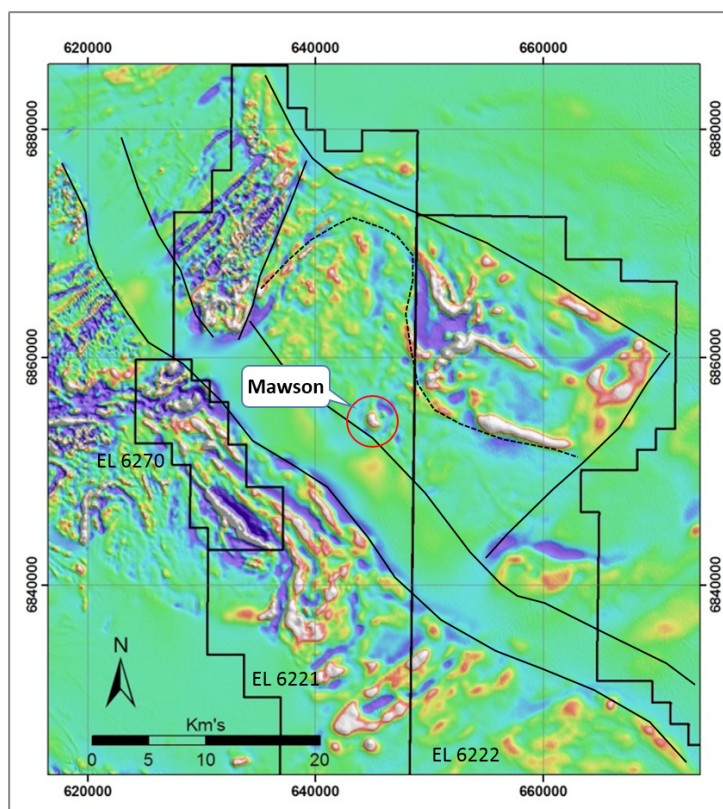


Figure 6: 1VD Magnetic signature of Mawson (1000nT, 0.8mGal).

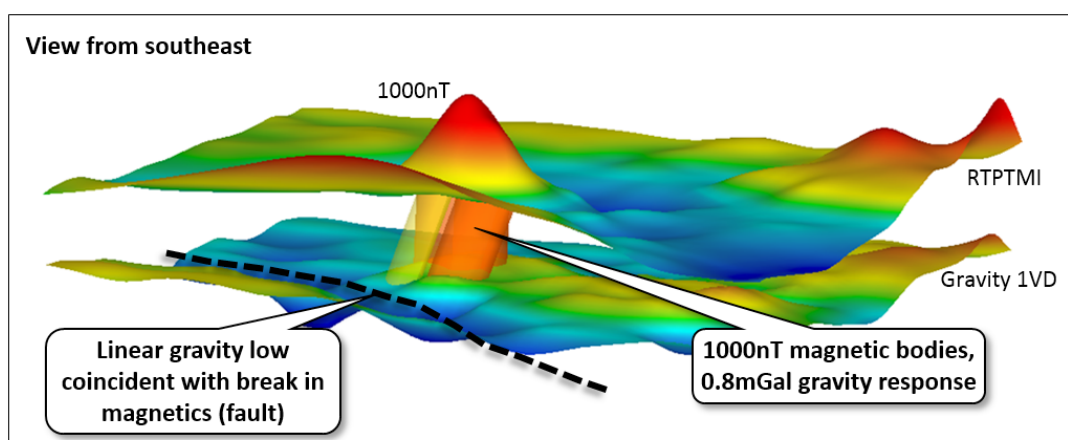


Figure 7: Mawson target with 1VD gravity and RTPTMI images and 2D magnetic model

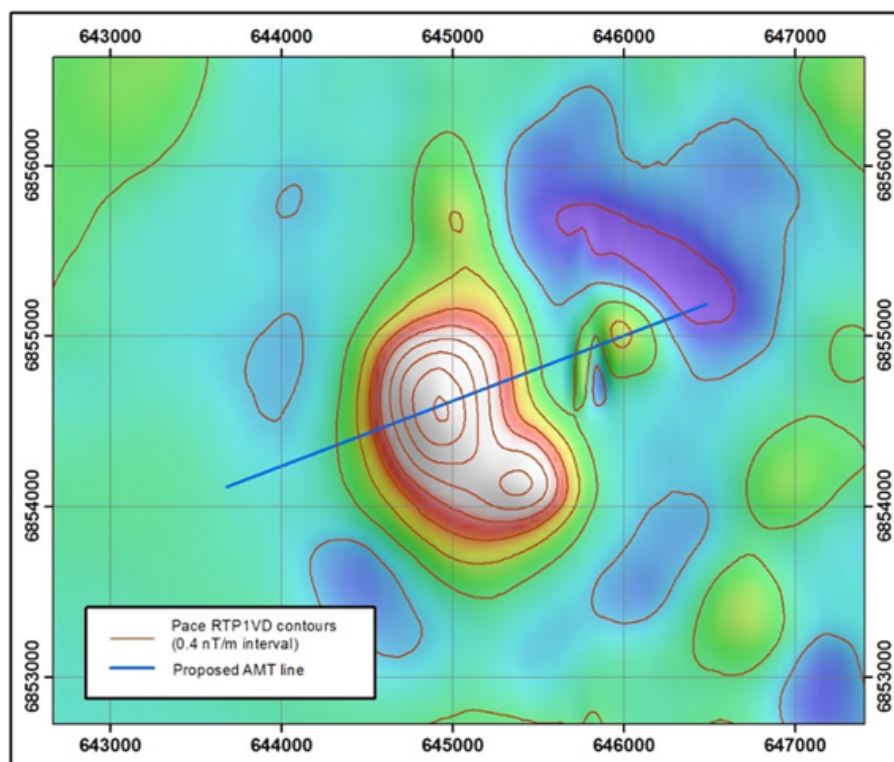


Figure 8: Mawson target RTP1VD magnetic image with contours highlighting the northern and southern zones. A single line of AMT is planned over the dense magnetic northern zone.

Next Steps

The AMT survey is the first step of the proposed work program and will be conducted over the coming months by a geoscience contractor.

Company Comment

Minotaur welcomes the South Australian Government's continued funding support for mining and exploration activity through the new ADI. This is particularly beneficial to Minotaur as we deploy our successful Cloncurry exploration tool box into the covered area of the Peake and Denison Inlier of South Australia. This area is vastly under explored and new data collected via this next phase of exploration will be of great benefit to the State.

This report is authorised by Mr Andrew Woskett, Managing Director, Minotaur Exploration Ltd. For further information contact Mr Glen Little, Exploration & Business Development Manager on 08 8132 3400.

COMPETENT PERSON'S STATEMENT

Information in this report that relates to Exploration Results is based on information compiled by Mr. Glen Little, who is a full-time employee of the Company and a Member of the Australian Institute of Geoscientists (AIG). Mr. Little has sufficient experience relevant to the style of mineralisation and type of deposit under consideration and to the activity that he is undertaking 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. Little consents to inclusion in this document of the information in the form and context in which it appears.