

# ARK MINES LTD.

(ASX: AHK)

ASX ANNOUNCEMENT

7 FEBRUARY 2022

## MAGNETIC SURVEY COMMENCES AT GUNNAWARRA NICKEL-COBALT PROJECT

### HIGHLIGHTS

- **High resolution drone magnetic survey at 100%-owned Gunnawarra Project underway – survey to provide ~5x higher resolution than historic data**
- **Innovative geophysical survey, exploration and interpretation company Ultramag Geophysics engaged to carry out the survey**
- **Unmanned aerial vehicle ('UAV') being utilised providing Ark with comparable resolution at 10x the speed and a quarter of the cost of traditional methods**
- **Survey results expected to pinpoint the magnetic ultramafic host rock, allowing Ark to refine drill targets more efficiently**
- **Using the geophysical data collected, an Aeromagnetic Inversion 3D Model can be created to define the geometry of the intrusive in three dimensions**
- **Program will take ~12 days with results and interpretation expected later this month**
- **Drilling program to follow after interpretation of the survey results – EL is permitted and drill-ready**

Queensland-focused exploration and project development company **Ark Mines Ltd (ASX: AHK) ('Ark' or 'the Company')** is pleased to report it has commenced exploration activity at its Gunnawarra Nickel-Cobalt Project (EPM 26560) in North Queensland, Australia. *Ultramag Geophysics* ('Ultramag') is now onsite undertaking a detailed drone magnetic survey across Gunnawarra project's 36km<sup>2</sup> tenure.

Located ~40km south from Mount Garnet in far-north Queensland, the Gunnawarra Project boasts outstanding access to existing infrastructure including grid power, water and access to port facilities. The project surrounds the Bell Creek resource, a component of the Sconi cobalt project owned by *Australian Mines Limited* (ASX: AUZ). **Gunnawarra presents strong coincidental geophysics to Bell Creek, with outcrops that pervade the tenement from the Bell Creek Resource.**

Ultramag Geophysics have been engaged to undertake a high spatial resolution drone magnetic survey at Gunnawarra utilising unmanned aerial vehicles ('UAVs'). UAVs provide an advantage over traditional methods with the ability to consistently fly over hard to reach and hazardous areas as well as safely at low elevations. This eliminates the need for large crews, refuelling stations, and other potential risks associated with aircraft.

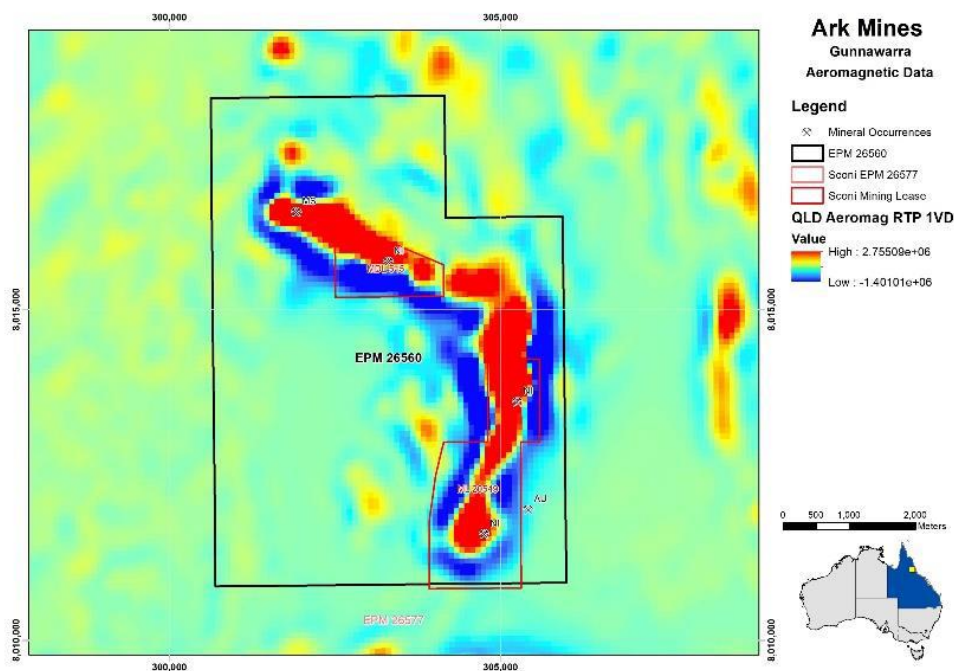
Dronemag surveys provide comparable resolution to groundmag but with a much faster acquisition. Additional new small features can be mapped and used to inform the geological modelling. Dronemag is approximately 10 times faster than groundmag and can be undertaken at a fraction of the cost.

Ultramag's survey work is expected to take approximately one week to complete, with a detailed report available later in February. The results of the survey will allow Ark to identify geological structures across the tenement including dykes, sills, and other intrusions, faults, magmatic flows and paleochannels. Being able to pinpoint the magnetic ultramafic host rock will be key to allowing the Company to refine drill targets more efficiently.

Various drill targets have previously been defined at Gunnawarra and the results of this survey will confirm these drill locations and likely define others. A detailed drill program will be developed following the reception and interpretation of the survey results.

**Executive Director Ben Emery commented:** *"The data from the 850 line-kilometre high-resolution aeromagnetic survey will enable Ark to better understand the Ni Co surface footprint, and the symmetries under surface at Gunnawarra as we advance the project towards drilling.*

*We have utilised the newest and most innovative technology which allows us to not only get better and higher resolution results, but it also allows us to do so much quicker and more cost effectively. I look forward to updating shareholders as results of the survey are received and interpreted and as we move to the next phase of exploration."*



**Image 1: Current Gunnawarra Aeromagnetic data**



**Image 2: UAV being utilised to undertake the drone magnetic survey**



**Image 3: Ultramag Geophysics personnel onsite at Gunnawarra**



**Image 4: Mineralisation from Gunnawarra project**

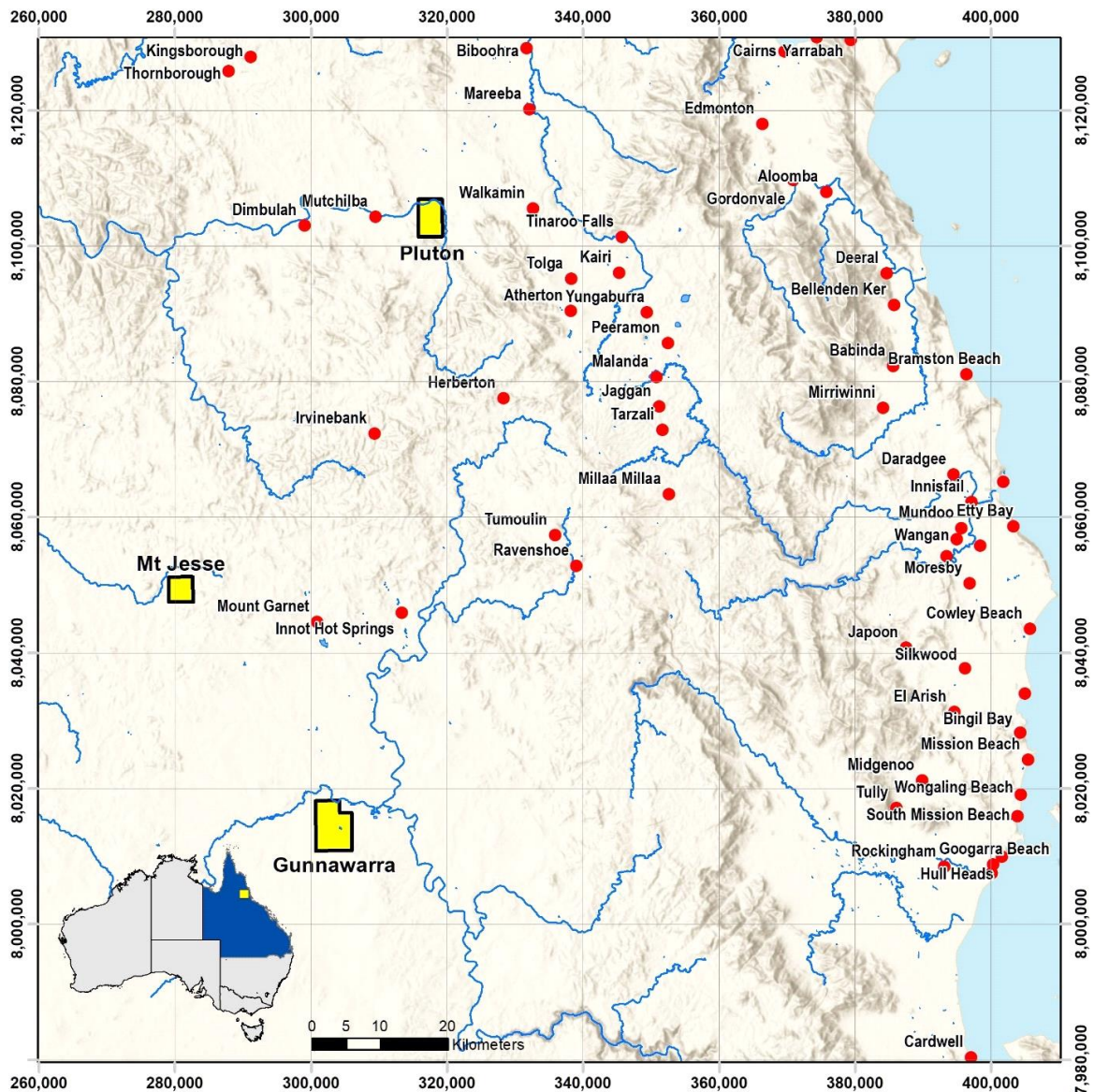


Image 5: Gunnawarra Ni Co project location

This announcement has been approved by the Board of Ark Mines Ltd.

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**About Ark Mines Limited**

Ark Mines is an ASX listed Australian mineral exploration company focused on developing its 100% owned projects located in the prolific Mt Garnet and Greenvale mineral fields of Northern Queensland. The Company's exploration portfolio consists of three high quality projects covering 65km<sup>2</sup> of tenure that are prospective for copper, iron ore, nickel-cobalt and porphyry gold:

**Mt Jesse Copper-Iron project**

- Project covers a tenure area of 12.4km<sup>2</sup> located ~25km west of Mt Garnet
- Centered on a copper rich magnetite skarn associated with porphyry style mineralization

- Three exposed historic iron formations
- Potential for near term production via toll treat and potential to direct ship

#### **Gunnawarra Nickel-Cobalt project**

- Comprised of 11 sub-blocks covering 36km<sup>2</sup>
- Borders Australian Mines Limited Sconi project - the most advanced Cobalt-Nickel-Scandium project in Australia
- Potential synergies with local processing facilities with export DSO Nickel/Cobalt partnership options

#### **Pluton Porphyry Gold project**

- Located ~90km SW of Cairns near Mareeba, QLD covering 18km<sup>2</sup>
- Prospective for gold and associated base metals (Ag, Cu, Mo)
- Porphyry outcrop discovered during initial field inspection coincides with regional scale geophysical interpretation

#### **Competent Persons Statement**

The Information in this report that relates to exploration results, mineral resources or ore reserves is based on information compiled by Mr Roger Jackson, who is a Fellow of the Australian Institute of Mining and Metallurgy. Mr Jackson is a director of the Company. Mr Jackson has sufficient experience which is relevant to the style of mineralisation and type of deposits under consideration and to the activity that he is undertaking to qualify as a Competent Person as defined in the 2012 edition of the 'Australian Code for Reporting Exploration Results, Mineral Resources and Ore Reserves' (the JORC Code). Mr Jackson consents to the inclusion of this information in the form and context in which it appears in this report.