ASX Announcement

19 April 2021

S2 SECURES MAJOR GROUND POSITION IN A MAGMATIC NICKEL-COPPER PROSPECTIVE BELT AT KOONENBERRY, NEW SOUTH WALES

Key Points

- **S2 has received notice of approval from the NSW Department of Mining, Exploration and Geoscience (DMEG) for 3 large Exploration Licences covering 2,712km^2 at Koonenberry in northern NSW**
- **This belt-scale opportunity resembles the Fraser Range in terms of its cratonic margin setting, its scale and prospective intrusive rocks with known Ni-Cu sulphide occurrences**
- **Like the Fraser range, the Koonenberry Belt is largely unexplored, with last sustained Ni-Cu exploration undertaken by Vale-Inco from 2005 to 2010**
- **Koonenberry is a frontier region suited to S2, who's team discovered the Nova-Bollinger Ni-Cu-Co deposit in 2012 when exploring the Fraser Range as Sirius Resources**
- **Although the licences cover a substantial area, expenditure commitments are modest and can easily be funded with S2's existing resources without detracting from its other projects**

S2 Resources Ltd ("S2" or the "Company") has received a notice from the New South Wales (NSW) Department of Mining, Exploration and Geoscience (DMEG) for the proposed approval for 2,712 square kilometres of mineral exploration tenure incorporating Exploration Licence Applications (ELA's) 6198, 6199 and 6200. The applications cover a major proportion of the Koonenberry Belt in northern NSW, a geological terrain considered prospective for magmatic intrusive base and precious metal mineralisation. The applications cover a strike extent of 143 kilometres between the Packsaddle and Mt Arrowsmith regions. They are located 130km northeast of Broken Hill astride the Silver City Highway.

Commenting on the Exploration Licence application, S2's Chief Executive Officer Matthew Keane said, "This greenfields, belt scale project suits the technical strengths of the S2 team who made the virgin discovery of the world class Nova-Bollinger deposit in a similar geological setting in the Fraser Range (under Sirius Resources). Like the Fraser Range, the district has been sporadically explored since the early 1960's, but

generally not focused on magmatic Ni-Cu-PGE mineralisation. Koonenberry is valuable addition to S2's quality project portfolio and we will apply our systematic exploration approach to generate and evaluate targets without detracting resources from other key projects".

Belt Scale Opportunity

In regard to scale and cratonic margin setting, the Koonenberry Belt is analogous to the Fraser Range which hosts the Nova-Bollinger and Silver Knight Ni-Cu-Co deposits and the Tropicana gold deposit (Figure 1). S2's ELAs cover a coincident gravity and magnetic ridge, interpreted as underlying mafic and ultramafic geology, just like that which control the location of Nova-Bollinger (Figure 1). Tenure selection was based upon prospective geology and excludes areas under deep post-carboniferous cover (Figure 2).

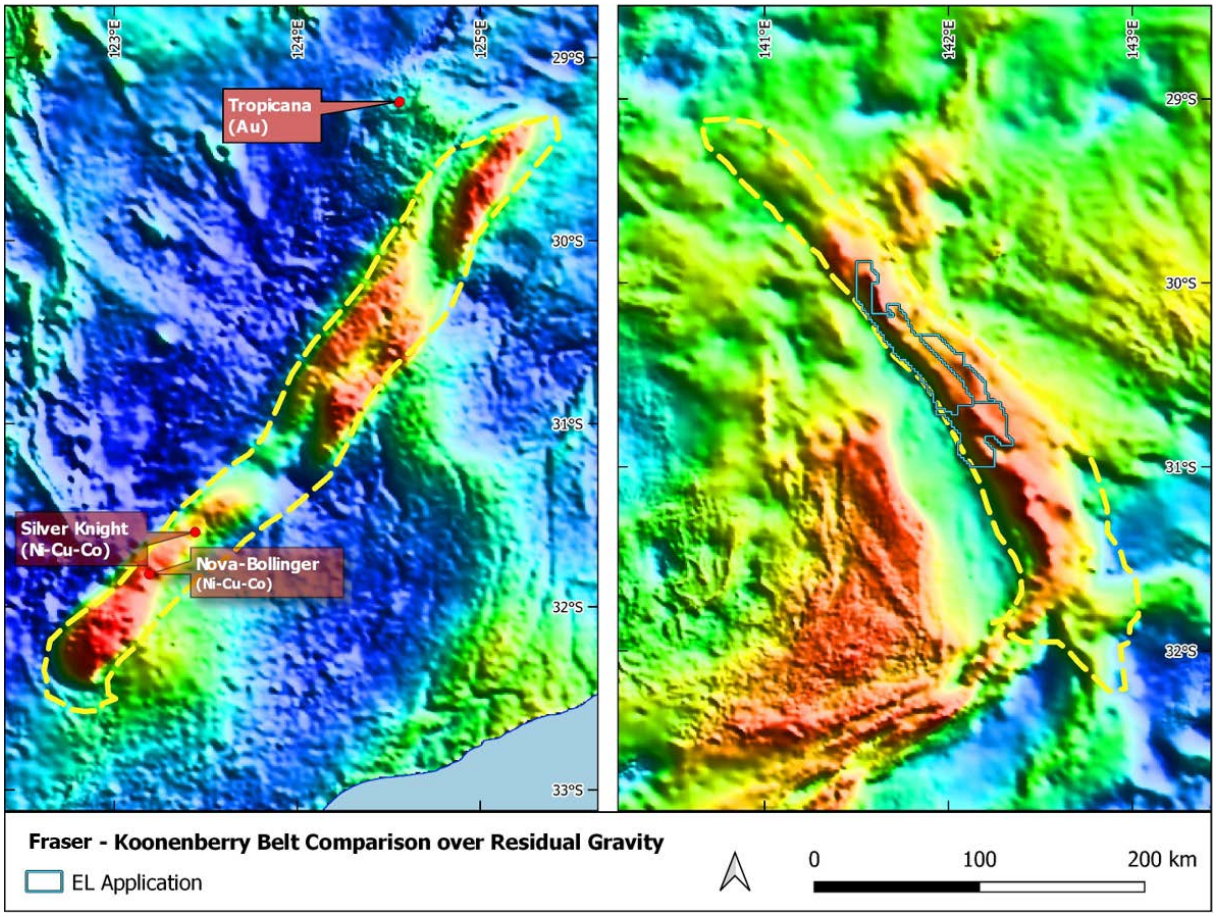

Figure 1. Same-scale comparison of the Fraser Zone of the Albany-Fraser Orogen (left) and the Koonenberry Belt (right) showing tenure over a prominent gravity ridge.

Geological setting

The Koonenberry Belt sits along the north-eastern margin of the Curnamona Craton and comprises Late Neoproterozoic and Cambrian rocks (Figure 3). The ELA's contain 143 strike kilometres of the Mt Arrowsmith Volcanics with long sills of early breakup gabbros and likely comagmatic orthocumulate ultramafic picrite sills and intrusions. These rocks are considered petrographically similar to those that host mineralisation in the Russian Pechenga Ni-Cu-PGE camp, with distinctive olivine-rich orthocumulates with

abundant intercumulus red hydrous hornblende (Kaersutite). The Pechenga camp contains roughly 25 economic base metal deposits containing circa 4.7 million tonnes of nickel and 2.4 million tonnes of copper hosted in the basal sections of thicker ferropicrite sills and intrusions, and is close to the giant Sakatti Ni-Cu-PGE deposit just across the border in northern Finland.

In terms of its tectonic setting (a Proterozoic accretionary mobile zone wrapped around the margin of a craton) and its geology (numerous mafic/ultramafic sill complexes), Koonenberry resembles other magmatic Ni-Cu-PGE sulphide endowed belts such as the Circum-Superior Belt of Canada, which hosts the giant Raglan and Thompson Ni-Cu camps. In fact, this was the model that the S2 team (as Sirius Resources) used to identify the prospectivity of the Fraser Range, leading to the discovery of Nova-Bollinger.

In terms of the above, plus the presence of extensive primitive sills intruding sulphidic and carbonaceous sedimentary rocks, Koonenberry closely resembles the Pechenga Belt. Of note, minor occurrences of magmatic pentlandite and chalcopyrite have been identified in some orthocumulate picrites from the Mt Arrowsmith area.

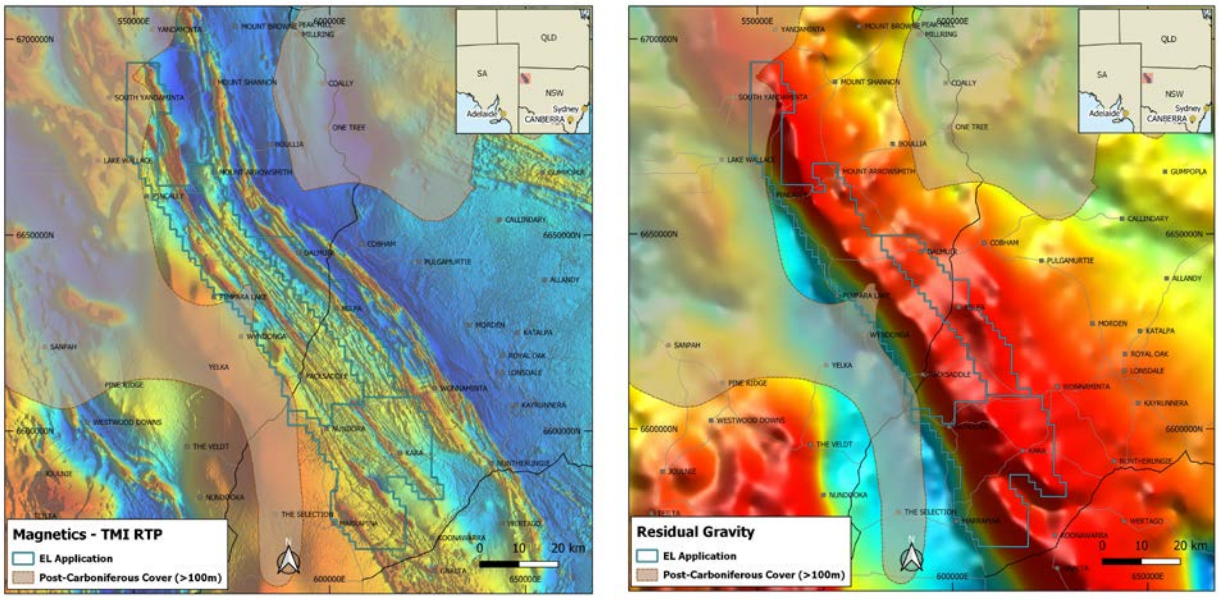

Figure 2. Regional magnetic image (left) and regional gravity image (right) showing areas of deep post-Carboniferous cover, with ELA's straddling the key gravity ridge.

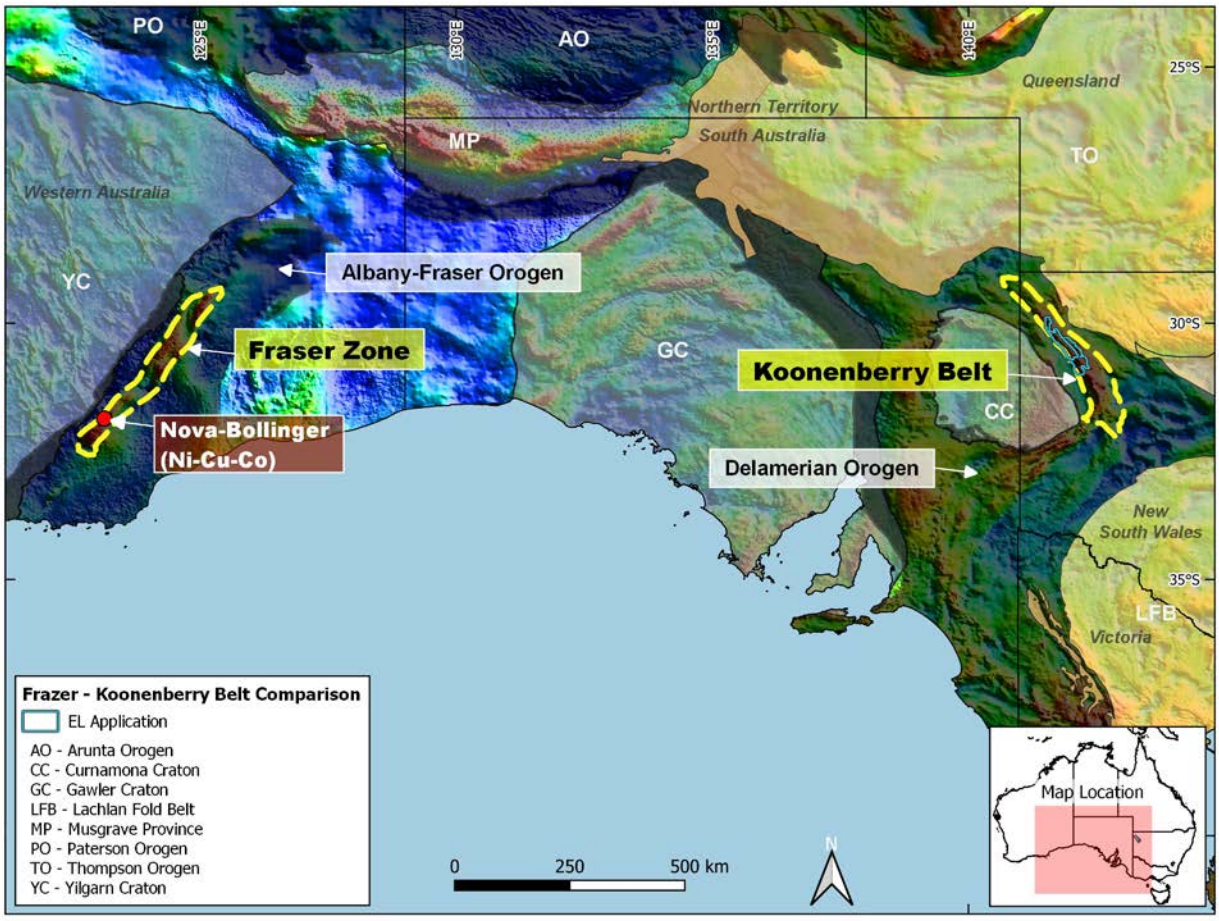

Figure 3. Location map of the Koonenberry Belt showing a comparison to the Fraser Zone of the Fraser Range which hosts the Nova-Bollinger deposit. The Koonenberry Belt is located on the north-eastern margin of the Curnamona Craton.

Plan of work

The Koonenberry project will fit well with S2's existing projects such as the Jillewarra project in Western Australia and the Central Lapland gold and base metal project in northern Finland.

Importantly, the first year minimum expenditure plan is modest, totalling A$275,400 for the three ELAs. Planned activities for financial year 2022 include establishing land access agreements, electromagnetic (EM) surveys, soil and rock chip sampling, regional mapping and data consolidation. Existing datasets will provide a head start to S2, however the area is largely unexplored in terms of drilling.

This announcement has been provided to the ASX under the authorisation of Mark Bennett, Executive Chairman.

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Competent Persons statements

The information in this report that relates to Exploration Results is based on information compiled by John Bartlett, who is an employee and shareholder of the Company. Mr Bartlett is a member of the Australian Institute of Mining and Metallurgy (MAusIMM) and has sufficient experience of relevance to the style of mineralization and the types of deposits under consideration, and to the activities undertaken, to qualify as a Competent Person as defined in the 2012 Edition of the Joint Ore Reserves Committee (JORC) Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves. Mr Bartlett consents to the inclusion in this report of the matters based on information in the form and context in which it appears.