17h November 2021

ASX Announcement

FIELD EXPLORATION UPDATE
IVITTUUT GREENLAND PROJECT

Highlights

- **XRF field results for surface grab samples from the Gronnedal-Ika carbonatite indicate significant REE content.**
- **Outcrop samples from Gronnedal-Ika and bulk samples collected from Ivittuut mine mullock dumps and tailings now received in Perth for full chemical and mineralogical laboratory analysis.**

Eclipse Metals Ltd (ASX: **EPM**) (**Eclipse Metals** or the **Company**) is pleased to provide this update on current field activities within its Ivittuut project licence MEL2007-45 located in southwestern Greenland.

The helicopter borne reconnaissance field program included collection of samples from the Ivittuut mine dumps and tailings and Gronnedal-Ika carbonatite intrusive. Initial XRF field testing has returned promising results for rare earth minerals.

An initial assessment of the land-backed wharf has provided a better understanding of potential to re-establish a port facility for future exports of quartz, cryolite and fluorite mineralisation from re-development of and below the Ivittuut pit (Figures 1 and 2).

SAMPLES AND FIELD XRF RESULTS

IVITTUUT MINE ENVIRON

A bulk sample of mine waste (mullock) from the historical Ivittuut pit and samples from tailings produced by the historic treatment plant has now been received in Perth and will be sent to local laboratories for detailed chemical and mineralogical analysis (Figures 3 and 4).

GRONNEDAL-IKA CARBONATITE

Grab samples collected from two areas of outcrop were analysed in the field using a hand-held XRF analyser (Figures 1, 5, 6, 7 and 8) to provide a preliminary assessment. The XRF results indicate potentially significant rare-earth element content but cannot be verified and are not being presented in this report. These samples have also been received in Perth and will be submitted to local laboratories for full chemical and petrological analysis.

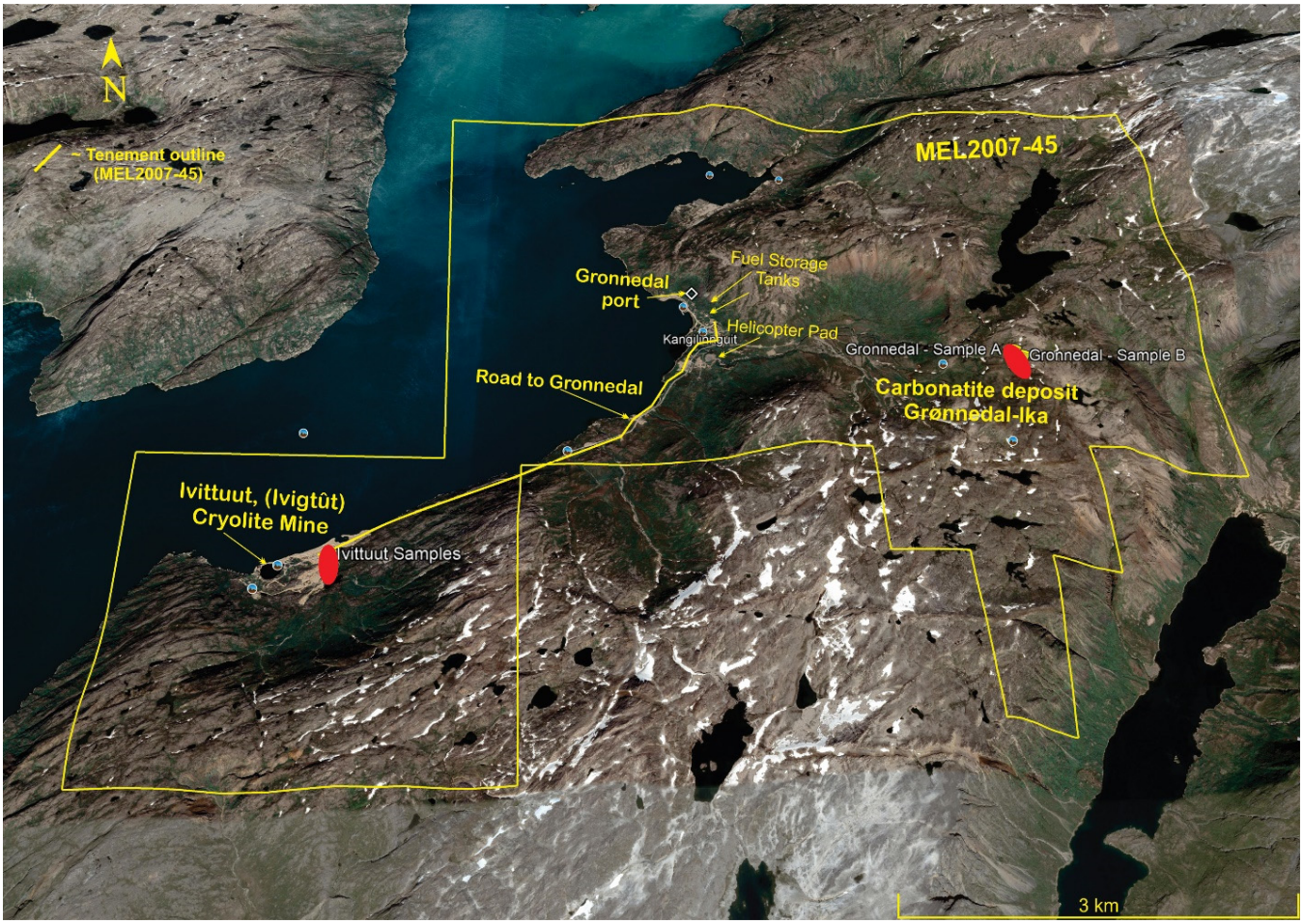

Figure 1. Outline of MEL2007-45 over satellite image, showing location of Ivittuut mine and Gronnedal-Ika carbonatite

Figure 2. Image of current Ivittuut Mine precinct showing pit and remnants of land backed wharf

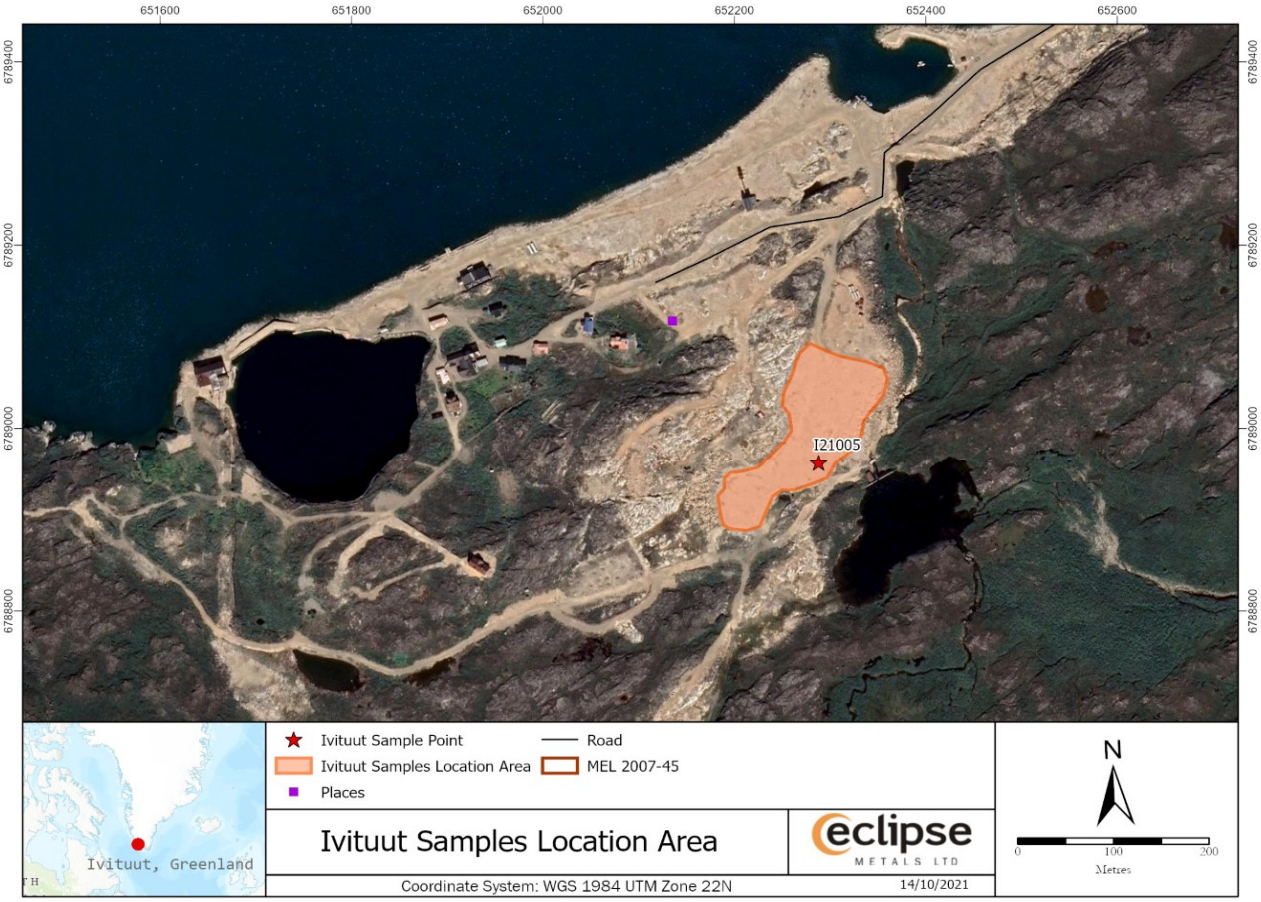

Figure 3. Ivittuut pit and waste dumps showing sample point.

Figure 4. Specimen from Ivittuut mine carrying siderite, cryolite and fluorite

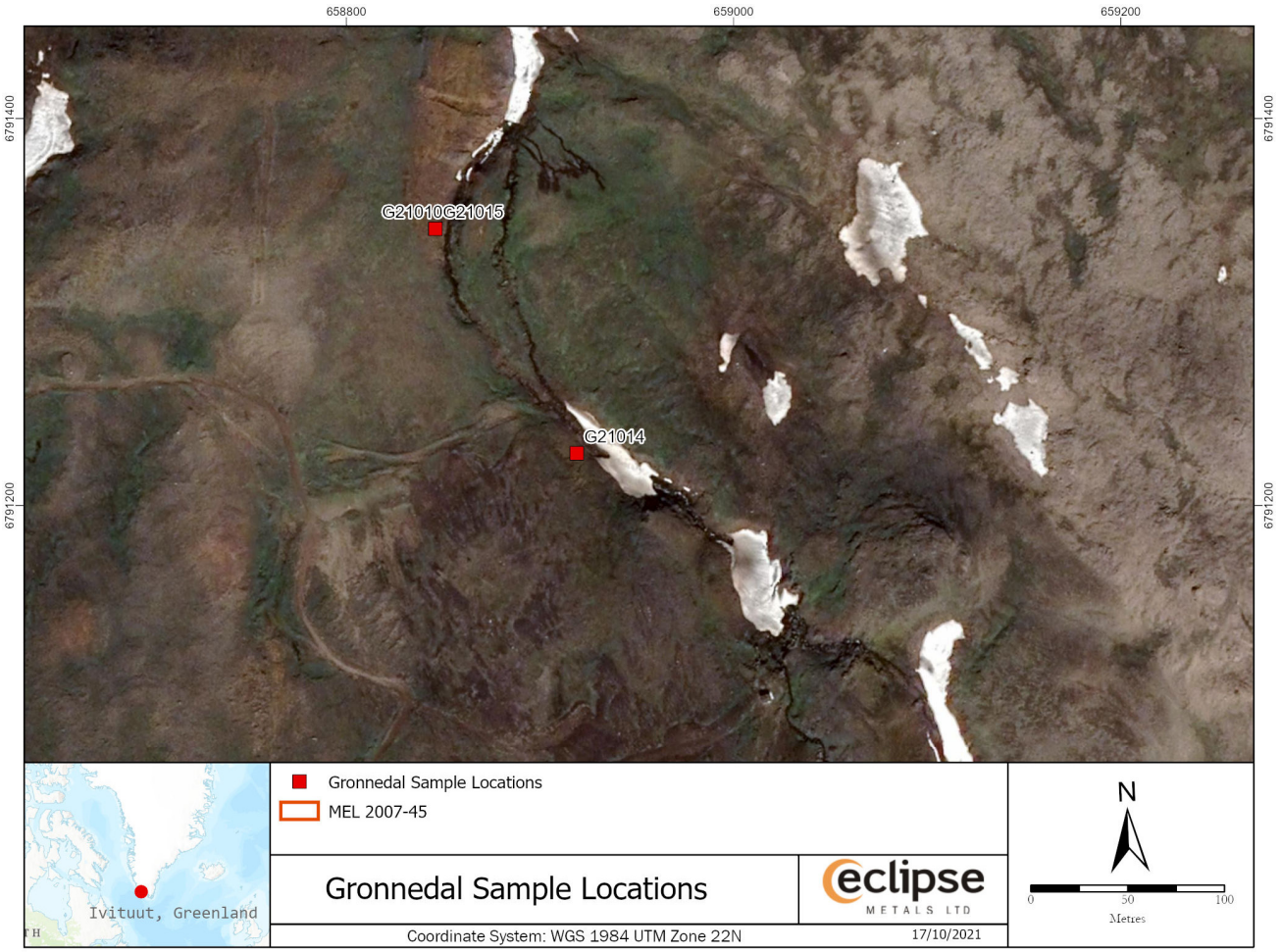

Figure 5. Gronnedal-Ika sample locations

Figure 6. Gronnedal-Ika carbonatite sampling

Figure 7. Oxidised mafic dyke with magnetite and pink REE bearing mineral from Gronnedal-Ika

Figure 8. XRF testing large samples from Gronnedal-Ika

ABOUT THE IVITTUUT PROJECT

Ivittuut is located in southwestern Greenland and has a power station and fuel supplies to service this station and local traffic to support mineral exploration. About 5.5km to the northeast of Ivittuut, the twin settlements of Kangilinnguit and Gronnedal, respectively provide a heliport and an active wharf with infrastructure. The Gronnedal-Ika carbonatite complex is less than 10km from Ivittuut and only 5km from the port of Gronnedal. This complex is also one of the 12 larger Gardar alkaline intrusions in Greenland and is recognised as one of the prime REE targets in Greenland by GEUS along with Kvanefjeld and Kringlerne (Tanbreez).

GRONNEDAL-IKA CARBONATITE COMPLEX

The Gronnedal-Ika carbonatite, nepheline syenite complex and later dolerite dykes are intruded into crystalline Archean basement rocks centered on 48º03'W: 61°14'N, about 10km to the northeast from Ivittuut.

The drill holes examined in this first visit were originally sited to obtain samples of nepheline syenite for ceramic manufacture but intersected contact areas of later olivine dolerite dykes carrying magnetite.

REE occurs throughout the carbonatite complex, especially in late-stage veins where it occurs as various strontium REE carbonate minerals. Europium (Eu) has been recorded from the whole intrusion at several times greater values than average for rocks elsewhere in the Gardar Province and many times more than normally found in carbonatite.

Minerals identified within the complex include apatite, monazite, stronianite and synchysite which host LREE, as well as zircon and monazite which host HREE (LREE = light rare-earths. HREE = heavy rare-earths).

Carbonate rock from this complex could provide a neutralising agent for mine and process water for other operations in the region.

The geophysical analysis over Gronnedal-Ika carbonatite/dyke geological units have been confirmed to be far more extensive than previously known which is further encouragement for potential REE and sulphide mineralisation. The Dighem survey defined seven conductive targets which are recommended for follow up exploration and ground truthing.

FORWARD STRATEGY

Initial evaluation of drill core samples has provided additional significant information on the prospectivity of both the Ivittuut mine precinct and the carbonatite / mafic dykes occurrence which will save considerably on future costs in delineating this REE deposit.

Analysis of the surface samples from Gronneddal-Ika and from the Ivittuut mullock and tailing dumps now received in Perth will provide substantially more data on the nature and mineral potential of these prospects.

GROWTH OPPORTUNITIES

With considerable progress in Greenland, the Company is now reviewing its asset portfolio to assess ways to best extract value from its projects for shareholders, including a potential repositioning of assets to ensure an appropriate exploration and development focus can be maintained in relation to the Ivittuut Project.

As part of that review, the Company continues to advance discussions with third parties with respect to potential joint venture partnerships and other opportunities that will further advance our Australian projects and add value for Shareholders. The Company will keep the market updated as these discussions progress.

Authorised for release by the Board

Carl Popal
Executive Chairman

Rodney Dale
Non-Executive Director

Competent Persons Statement

The information in this report / ASX release that relates to Exploration Results and Exploration Targets is based on information compiled and reviewed by Mr. Rodney Dale, Non-Executive Director of Eclipse Metals Ltd. Mr. Dale holds a Fellowship Diploma in Geology from RMIT, is a Fellow of the Australasian Institute of Mining and Metallurgy (FAusIMM) and has sufficient experience relevant to the styles of mineralisation under consideration and to the activity being reported 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. Mr Dale consents to the inclusion in this report / ASX release of the matters based on information in the form and context in which it appears. Additionally, Mr Dale confirms that the entity is not aware of any new information or data that materially affects the information contained in the ASX releases referred to in this report.

About Eclipse Metals Ltd (ASX: EPM)

Eclipse Metals Ltd is an Australian exploration company focused on exploring South-western Greenland, Northern Territory and Queensland for multi commodity mineralisation. Eclipse Metals Ltd has an impressive portfolio of assets prospective for cryolite, fluorite, siderite, quartz (high purity silica), REE, gold, platinum group metals, manganese, palladium, vanadium and uranium mineralisation. The Company's mission is to increase shareholders' wealth through capital growth and ultimately dividends. Eclipse Metals Ltd plans to achieve this goal by exploring for and developing viable mineral deposits to generate mining or joint venture incomes.