

Blackstone Recommences Underground Mining at Ta Khoa

Bulk ore sample to support Ta Khoa piloting program

Blackstone Minerals Limited (“Blackstone” or the “Company”) is pleased to inform investors that mining activities have recommenced at the Company’s 90% owned Ta Khoa Nickel Project in northern Vietnam.

Using a combination of Australian and Vietnamese mining professionals and operators, Blackstone will:

- Complete ~1,000m of development through the Ban Phuc disseminated orebody generating nickel ore representative of the life of mine plant feed.
- Recommission the Ban Phuc Nickel Concentrator to produce two batches of Nickel Concentrate for use in the Ta Khoa Refinery piloting programs.
- Deliver the first batch of concentrate to Perth for treatment by ALS Laboratories in the first phase piloting program.
- Process and store the second batch for use in the second phase pilot plant which will be built in Son La in 2022.



Figure 1 - Ta Khoa Management Team and the Underground Mining Contractor outside the Ban Phuc Portal

Scott Williamson, Blackstone's Managing Director, said:

"The recommencement of mining activity is an important milestone for the Company, and the speed at which approvals were secured is a testament to the expertise and relationships our team has on the ground in Vietnam. The mining program will provide significant quantities of disseminated ore which will be processed at the existing Ban Phuc Nickel Concentrator and subsequent pilot plants. The opportunity to treat this quantity of ore de-risks both the upstream and downstream business unit development strategies."

"Blackstone is committed to sustainable mining and looks forward to producing meaningful quantities of NCM Precursor from piloting in Vietnam, in parallel with our engagement and collaboration with potential partners and customers for our vertically integrated development strategy."

Mining Program

In December 2021, Blackstone was granted approval to recommence mining activities as part of our ongoing development of the Ta Khao Project. Approval was received to perform mining works that will involve completion of ~1,000m of lateral development.

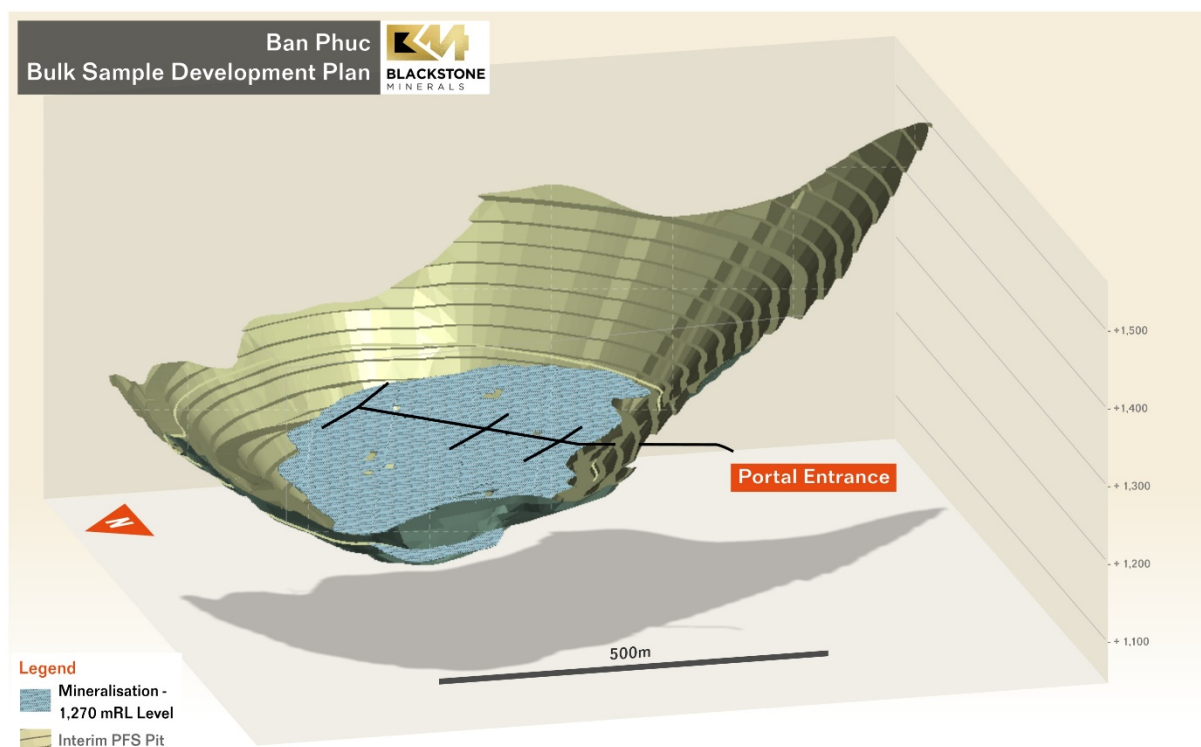


Figure 2 - Planned Development Design

The development drive starts from the 1,270mRL level of existing Ban Phuc underground workings (approximately 130m below natural ground level, see Figure 2) and extends completely through the middle of the Ban Phuc disseminated sulfide resource. Multiple cross cuts extend from the main development drive to provide access to a wide distribution of ore zones.



Figure 3 - First face marked out ready for drilling

Ban Phuc Nickel Concentrator

Ore produced from the mining program will be processed through the existing 450ktpa Ban Phuc concentrator. Blackstone has finalised studies to temporarily de-rate the existing plants capacity to suit the requirements of the pilot programs.

Blackstone has refurbished the Ban Phuc concentrator over the last six months. The crushing circuit was recommissioned in November 2021, with ore commissioning planned for the mill and flotation circuit in January 2022.



Figure 4 - Recommissioned Ban Phuc Crushing Circuit

The disseminated ore will be treated in multiple campaigns:

- The first parcel of ore will be treated in a semi-batch manner. Approximately 10 tonnes (t's) of 8% nickel concentrate will be shipped to ALS in Perth for use in the phase 1 piloting program.
- Following this first campaign, several larger campaigns will be used to test the milling and flotation performance of the Ban Phuc disseminated sulfide, and generate nickel concentrate for further large-scale piloting use. This concentrate will be bagged and stored in containers for treatment through the Phase 2 Pilot Plant in Vietnam.
- Blackstone has also purchased an upstream pilot plant capable of treating 250kg/hr. During the main campaigns, Blackstone will also run multiple trials through this pilot facility to optimise flotation parameters for the DFS, as well as testing pilot versions of key process equipment.

Pilot Plant Phase 1

The phase 1 pilot program is being completed by ALS in Perth Western Australia. The pilot campaign will treat approximately 10t's of Ban Phuc disseminated sulfide concentrate, and 10t's of concentrate sourced from third party feed suppliers. The resulting 20t's of concentrate feed will average 10% nickel and will be fed through the following campaigns:

- Campaign 1 - MHP Production, four trials:
 - Trial 1: 25% Ban Phuc / 75% Third Party Blend
 - Trial 2: 50% Ban Phuc / 50% Third Party Blend
 - Trial 3: 75% Ban Phuc / 25% Third Party Blend
 - Trial 4: Optimum Blend
- Campaign 2 - NCM Production, two trials
- Resulting Products:
 - 1t MHP
 - 1.5t NCM811

Pilot Plant Phase 2

Blackstone is in early discussions with EPCM Contractors for development of the Phase 2 Pilot Plant (PP2). PP2 will be built to a 1:25 scale version of a single Ta Khoa Refinery train and will process 1t per hour of concentrate. PP2 will be used to generate commercial quantities of NCM for alignment with customer specifications and for further de-risking of the commercial plant development plan.

Authorised by the Managing Director. For more information, please contact

Scott Williamson

Managing Director
+61 8 9425 5217
scott@blackstoneminerals.com.au

Dhanu Anandarasa

Manager Corporate Development
+61 8 9425 5217
dhanu@blackstoneminerals.com.au

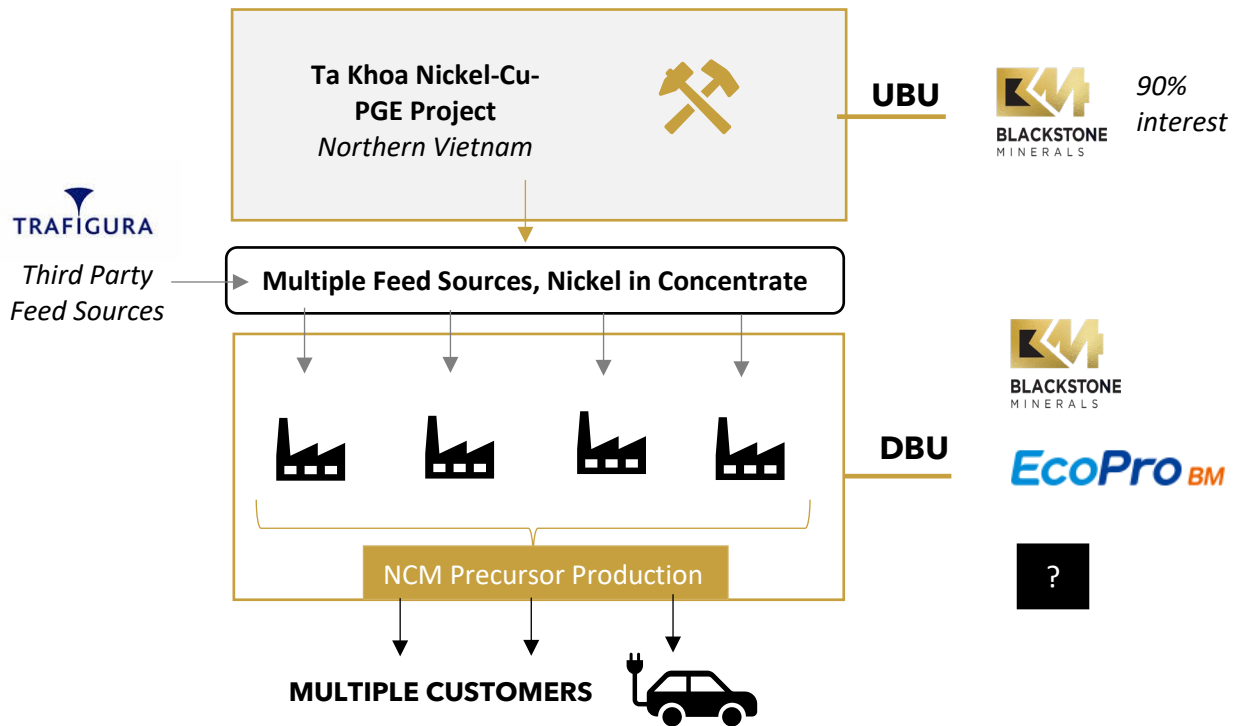
Patrick Chang

Head of Corporate Development
+61 8 9425 5217
patrick@blackstoneminerals.com.au

About Blackstone

Blackstone Minerals Ltd (ASX: BSX / OTCQX: BLSTF / FRA: B9S) is focused on building an integrated upstream and downstream battery metals processing business in Vietnam that produces Nickel: Cobalt: Manganese (NCM) Precursor products for Asia’s growing Lithium-ion battery industry (refer Figure 4)

Figure 4 -Ta Khoa Project Snapshot



The Company owns a 90% interest in the Ta Khoa Nickel-Copper-PGE Project. The Ta Khoa Project is located 160km west of Hanoi in the Son La Province of Vietnam and includes an existing modern nickel mine built to Australian standards which is currently under care and maintenance (refer Figure 5). The Ban Phuc nickel mine successfully operated as a mechanised underground nickel mine from 2013 to 2016.

In October 2020, the Company completed a Scoping Study which investigated mining the Ban Phuc Disseminated nickel sulfide ore body (upstream) and the construction of a 200ktpa downstream refinery (refer to ASX announcement of 14 October 2020, including for the full details of the Company’s Mineral Resource Estimate at Ban Phuc).

Building on the outcomes of the Scoping Study, the Company has since completed a technically and economically robust Pre-feasibility Study for its Downstream Business Unit (DBU) which sees expanded downstream capacity. This is based on the Ta Khoa refinery being designed to process 400ktpa of nickel concentrate, supplied from the Ta Khoa Nickel - Cu - PGE mine as well as third party concentrate.

The Company is continuing to advance a PFS for the UBU. The UBU PFS will contemplate the option to mine several higher-grade massive sulfide vein (MSV) deposits, which has the potential to reduce initial upfront capital requirements for the UBU by enabling the Company to restart the existing Ban Phuc Concentrator (450ktpa).

By combining the Company's existing mineral inventory (Ban Phuc Disseminated Sulfide - DSS), exploration potential presented by high priority targets such as Ban Chang, King Snake, Ta Cuong and Ban Khoa, and the ability to source third party concentrate, Blackstone will be able to increase the scale of its downstream business to cater to the rising demand for downstream nickel products.



Figure 5. Ta Khoa Nickel-Cu-PGE Project Location

Competent Person Statement

The information in this report that relates to Exploration Results and Exploration Targets is based on information compiled by Mr Chris Ramsay, Manager of Resource Geology for the Company and a Member of The Australasian Institute of Mining and Metallurgy. Mr Chris Ramsay has sufficient experience which is relevant to the style of mineralisation and type of deposits under consideration and to the activity which 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'. Mr Chris Ramsay consents to the inclusion in the report of the matters based on his information in the form and context in which it appears.

The information in this report that relates to Mineral Resource Estimation in respect of the Ta Khoa Nickel Project is based on information compiled by BM Geological Services (BMGS) under the supervision of Andrew Bewsher, a director of BMGS and Member of the Australian Institute of Geoscientists with over 21 years of experience in the mining and exploration industry in Australia and Vietnam in a multitude of commodities including nickel, copper and precious metals. Mr Bewsher has sufficient experience which is relevant to the style of mineralisation and type of deposit under consideration and to the activity which 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'. Mr Bewsher consents to the inclusion of the Mineral Resource Estimate in this report on that information in the form and context in which it appears.

The Company confirms that all material assumptions and parameters underpinning the Mineral Resource Estimates as reported within the Scoping Study in market announcement dated 14 October 2020 continue to apply and have not materially changed, and that it is not aware of any new information or data that materially affects the information that has been included in this announcement.

Forward Looking Statements

This report contains certain forward-looking statements. The words "expect", "forecast", "should", "projected", "could", "may", "predict", "plan", "will" and other similar expressions are intended to identify forward looking statements. Indications of, and guidance on, future earnings, cash flow costs and financial position and performance are also forward-looking statements. Forward looking statements, opinions and estimates included in this announcement are based on assumptions and contingencies which are subject to change without notice, as are statements about market and industry trends, which are based on interpretations of current market conditions. Forward looking statements are provided as a general guide only and should not be relied on as a guarantee of future performance. Forward looking statements may be affected by a range of variables that could cause actual results or trends to differ materially. These variations, if materially adverse, may affect the timing or the feasibility of the development of the Ta Khoa Nickel Project.

The project development schedule assumes the completion for the Downstream Business Unit of a Definitive Feasibility Study (DFS) by mid-2022. A PFS & DFS for the Upstream Business Unit is assumed to be completed in 2021 and 2022 respectively. Development approvals and investment permits will be sought from the relevant Vietnamese authorities concurrent to studies being completed. Delays in any one of these key activities could result

in a delay to the commencement of construction (planned for early 2023). This could lead on to a delay to first production, currently planned for 2024. It is expected that the Company's stakeholder and community engagement programs will reduce the risk of project delays. Please note these dates are indicative only.

The JORC-compliant Mineral Resource estimate forms the basis for the Scoping Study in the market announcement dated 14 October 2020. Over the life of mine considered in the Scoping Study, 83% of the processed Mineral Resource originates from Indicated Mineral Resources and 17% from Inferred Mineral Resources; 76% of the processed Mineral Resource during the payback period will be from Indicated Mineral Resources. The viability of the development scenario envisaged in the Scoping Study therefore does not depend on Inferred Mineral Resources. There is a low level of geological confidence associated with Inferred Mineral Resources and there is no certainty that further exploration work will result in the determination of Indicated Mineral Resources or that the production target itself will be realised. The Inferred Mineral Resources are not the determining factors in project viability. Please refer to the Cautionary Statement in the Scoping Study market announcement dated 14 October 2020.