### Alba Mineral Resources plc

("Alba" or the "Company")

### Commissioning of Metallurgical Process Development Programme for Thule Black Sands Ilmenite Project

Alba Mineral Resources plc (AIM: ALBA) is pleased to provide an update on the Company's work activities at its 100% owned Thule Black Sands ("TBS") Project in northern Greenland.

### Key Points

- Mineral sands specialists IHC Robbins appointed to carry out comprehensive metallurgical process development and test work programme on TBS bulk sample
- The programme is designed to confirm the ilmenite products to be produced from TBS ilmenite and to provide product samples to enable potential customers and offtake partners to carry out their own confirmatory analyses

### Alba's Executive Chairman, George Frangeskides, commented:

"We are delighted to be partnering again with leading mineral sands experts IHC Robbins on this important process development programme for our high-grade TBS ilmenite deposit in Greenland."

"This programme will enable us both to confirm the design of the processing facilities for TBS ilmenite and to provide us with the end product that we can send directly to key potential customers and offtake partners for their own confirmatory analyses. This programme is therefore a key step in the process of confirming TBS as a stand-alone development project in its own right and securing the project-level capital to fast-track TBS through the development phase."

"As previously announced, we also plan to substantially increase Resource tonnes next year by drilling at depth – remembering that the existing, already significant, 19 million tonne Resource is only modelled to the depth of the permafrost horizon, typically 1-2 metres from surface."

### <u>Overview</u>

The Company has appointed IHC Robbins, leading mineral sands experts, to carry out a metallurgical process development and confirmation test work programme on a three-tonne bulk sample from Alba's wholly-owned Thule Black Sands deposit in northern Greenland.

IHC Robbins will utilise a representative bulk ore sample derived from Alba's Thule Black Sands Project to further develop the process methodology developed during the scoping phase, to test and confirm alternative process options and/or equipment, to confirm ore processability and to address items identified in the scoping phase.

The preliminary feasibility phase will include the following:

- Sample characterization as per drill data analyses
- Confirmation of conceptual metallurgical process and evaluation of alternative process options and equipment using full-scale or scale-able equipment
- Development of balanced Process Flow Diagrams "PFD"
- Production of potential ilmenite product and provision of ilmenite product samples to potential consumers for testing

 Provision of recovery calculations, predictions and factors based on X-ray fluorescence (XRF) and mineralogical analyses



*Figure 1: IHC Robbins Process Plant to be employed in the TBS Process Development Programme (photographs courtesy of IHC Robbins).* 

### **About Thule Black Sands**

Testwork results from the maiden drilling campaign across the Company's 100% owned Thule Black Sands Project in north-west Greenland confirmed a combined mineralised strike length of approximately 10 km.

The maiden Mineral Resource Estimate (see Table 1 below) declared by mineral sands specialist IHC Robbins is broken down into three components:

- An Inferred Resource of 19.0 Million Tonnes at 43.6% Total Heavy Mineral;
- An in-situ Ilmenite grade of 8.9%; and
- A contained Ilmenite of 1.7 Million Tonnes.

The potential exists to substantially increase the Resource tonnage by drilling through the permafrost, and this will be the focus of a drilling programme which is being designed for the summer 2021 field season. The offshore mineralisation adjacent to the active beaches also offers an opportunity to materially increase the overall size of the deposit.

# Table 1: JORC Mineral Resource Statement for the Thule Black Sands Project with an effective date of 9<sup>th</sup> May 2019 (figures rounded to nearest decimal point)

Category	Tonnage	THM	тнм	Oversize	Clay (%)	(% of	Tonnes	Ilmenite
	(Mt)	(Mt)	(%)	(%) >2mm	<53um	THM)*	(Mt)	(%)
Inferred	19.0	8.3	43.6	22.3	6.9	19.7	1.7	8.9

\* based on mineral assemblage data from composite samples

### About IHC Robbins

IHC Robbins is a multi-discipline technology business, specialising in providing services to the mineral sands and alluvial mining industry. Its mission is to design innovative products and provide reliable geological, metallurgical, engineering and product services that add value to its clients' activities by optimising operational performance. IHC Robbins has an integrated engineering service capability and is positioned to support clients for the entire lifecycle of their mining project. IHC Robbins is a fully owned subsidiary of Royal IHC.

IHC Robbins has advised on some of the largest mineral sands projects in the world, including providing engineering, detail and design services for the Definitive Feasibility Study on Iluka Resources' JAA mine in South Australia, and providing design, procurement, site co-ordination, construction and commissioning of the processing plants for Australian Zircon's Mindarie mineral sands mine, also in South Australia.

### Forward Looking Statements

This announcement contains forward-looking statements relating to expected or anticipated future events and anticipated results that are forward-looking in nature and, as a result, are subject to certain risks and uncertainties, such as general economic, market and business conditions, competition for qualified staff, the regulatory process and actions, technical issues, new legislation, uncertainties resulting from potential delays or changes in plans, uncertainties resulting from working in a new political jurisdiction, uncertainties regarding the results of exploration, uncertainties regarding the timing and granting of prospecting rights, uncertainties regarding the timing and granting of regulatory and other third party consents and approvals, uncertainties regarding the Company's or any third party's ability to execute and implement future plans, and the occurrence of unexpected events.

Without prejudice to the generality of the foregoing, uncertainties also exist in connection with the ongoing Coronavirus (COVID-19) pandemic which may result in further lockdown measures and restrictions being imposed by Governments and other competent regulatory bodies and agencies from time to time in response to the pandemic, which measures and restrictions may prevent or inhibit the Company from executing its work activities according to the timelines set out in this announcement or indeed from executing its work activities at all. The Coronavirus (COVID-19) pandemic may also affect the Company's ability to execute its work activities due to personnel and contractors testing positive for COVID-19 or otherwise being required to self-isolate from time to time.

Actual results achieved may vary from the information provided herein as a result of numerous known and unknown risks and uncertainties and other factors.

### **Competent Person Declaration**

The information in this release that relates to Exploration Results has been reviewed by Mr Mark Austin. Mr Austin is a member of SACNASP (Reg. No. 400235/06), Fellow of The Geological Society and Fellow of the Geological Society of South Africa. He has a B.Sc. Honours in Geology with 38 years' experience.

Mark Austin has sufficient experience that is relevant to the style of mineralisation and type of deposit under consideration and to the activity being undertaken to qualify as a Competent Person as defined in the 2012 Edition of the 'Australasian Code for Reporting of Exploration targets, Exploration Results, Mineral Resources and Ore Reserves', also known as the JORC Code. The JORC code is a national reporting organisation that is aligned with CRIRSCO. Mr Austin consents to the inclusion in the announcement of the matters based on his information in the form and context in which they appear.

## For further information, please contact:

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### Alba's Project and Investment Portfolio

Project (commodity)	Location	Ownership			
Mining Projects					
Amitsoq (graphite)	Greenland	90%			
Clogau (gold)	Wales	90%			
Inglefield (copper, cobalt, gold)	Greenland	100%			
Limerick (zinc-lead)	Ireland	100%			
Melville Bay (iron ore)	Greenland	51%			
TBS (ilmenite)	Greenland	100%			
Oil & Gas Investments					
Brockham (oil)	England	5%			
Horse Hill (oil)	England	11.765%			