Nuuk and Cranny: Looking at the Arctic and Greenland's Geostrategic Importance to U.S. Interests

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Chairman Cruz, Ranking Member Cantwell, and Honorable Members of the Committee:

Thank you for the opportunity to appear before you today to address Greenland's mineral riches and more specifically the potential development of a critical minerals industry.

I am Anthony Marchese and for twelve years, have been Chairman of Texas Mineral Resources, a publicly traded company that, along with a partner, is developing the Round Top Project, a world-class critical minerals deposit just outside El Paso in Senator Cruz's home state of Texas. Round Top's diverse array of critical minerals, when combined with my thirty years' experience in the capital markets, gives me a unique perspective on the discussion of Greenland's riches.

As the world's largest island, roughly 1.5 times the size of Alaska, Greenland presents a mining conundrum. On one hand, it is a treasure chest of not only critical minerals but base metals, precious metals, and industrial minerals. A map prepared by the government of Greenland illustrates the obvious. Greenland's entire coastline holds what is indisputably one of the world's greatest collection of

minerals in one jurisdiction. Throw a dart at any portion of the coastline and you will undoubtedly hit a potential world-class target.

Conversely, the sheer topography of Greenland presents potential significant challenges: one-mile-thick ice in its interior covering 85% of the country, winter temperatures averaging 16ºF and thick sea ice which create clogged shipping lanes.

While geological maps of Greenland present a vast array of critical mineral deposits along its coast, the presence of such deposits is only a starting point for exploration. Critical minerals vary in value. Rare earth minerals such as cerium and lanthanum, although considered critical by the United States Geological Survey (USGS), are not as valuable as neodymium and praseodymium, which are essential for magnets and batteries. Mineral characterization is essential in order to "separate the wheat from the chaff" to focus on economically profitable deposits. Such characterization requires significant amounts of exploratory drilling. Drilling provides answers to questions such as: "what minerals do we have?" "what are the estimates of the quantities we have?" and "what are the grades of the minerals we have?" Drilling is expensive and such costs in Greenland are magnified.

Once mineral characterization costs are addressed, capital and operating costs of mining are encapsulated in a feasibility study. After receiving the necessary approvals and permits, the feasibility study requires drilling data, metallurgical data, processing cost data, environmental data and finally, the downfall of many projects: commodity prices.

Mining in Greenland dates back to the 1850's. In fact, Greenland was at one time the world's largest producer of cryolite, a mineral used in aluminum production. Outside of cryolite, serious mining in Greenland commenced in the 1990's. Unfortunately, there has not been significant critical mineral mining in Greenland. In 2021, the government effectively ended a promising rare earth project because uranium would be mined as a mineral byproduct. As a result, Greenland banned uranium mining due to local Indigenous opposition. Interestingly, a study sponsored by McGill University several years ago found that over 85% of the population surveyed favored mining with the exception of radioactive minerals. Without characterization, we do not know if future mineral deposits are accompanied by uranium, thereby potentially limiting development unless there are policy changes.

An acquisition of Greenland by the United States could take many forms. There needs to be a determination as to which regulatory authorities, if any, would

govern mining projects. In the United States, the Bureau of Land Management (BLM) and the U.S. Forestry Service govern mining regulations on federal lands while states like Alaska also give serious consideration to the desires of the Indigenous population. At the present time, Greenland's 56,000 inhabitants are predominantly Inuits, an Indigenous population which has a strong voice in environmental policy alongside the government of Greenland and Denmark.

Regulatory authorities are critical to an examination of the economic incentives for mining. Characterization of mineral deposits is time consuming and expensive, tantamount to venture capital investing. The USGS could provide government funding for such characterization, to lessen the exploration risk for private industry. In this regard it is imperative to remember that capital costs for Greenland projects are highly variable. Frigid winters create many restrictions, significant hurdles for timely project development. Lack of infrastructure such as roads, fuel, electricity, and housing exacerbate capital costs. Workforce needs would require the import of foreign labor given that skilled mining labor is minimal in Greenland. Metallurgical expertise necessary to process mining material would present further challenges, as such expertise is available primarily in Asia.

Greenland's mining challenges would likely require the U.S. government to provide significant financial assistance in order to attract private capital, with funding needs required in both upstream and downstream development. Shortsightedly, current U.S. policy provides funding solely for downstream development, which has been a severe impediment to our own domestic production. In conclusion, mining in Greenland can likely attract capital by providing significant financial incentives while simultaneously aligning local politics and environmental regulations in an effort to create a supportive investment climate for private industry.

Thank you for your attention and interest. I am pleased to address any questions you might have.

About Texas Mineral Resources Corp.

Our primary focus is to develop and commercialize, along with our joint venture operating partner USARE, the Round Top heavy-rare earth, technology metals, and industrial minerals project located in Hudspeth County, Texas, eighty-five miles southeast of El Paso, in which TMRC currently owns an approximate 19% interest.

Additionally, the Company is pursuing gold and silver domestic mining opportunities. The Company's common stock trades on the OTCQB U.S. tier under the symbol "TMRC."

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