



June 22, 2026

The Honorable Pete Stauber
Chairman, Subcommittee on Energy and
Mineral Resources
Committee on Natural Resources
U.S. House of Representatives
Washington, DC 20515

The Honorable Yassamin Ansari
Ranking Member, Subcommittee on Energy
and Mineral Resources
Committee on Natural Resources
U.S. House of Representatives
Washington, DC 20515

Dear Chairman Stauber and Ranking Member Ansari:

The Breakthrough Institute writes the Committee in strong support of the U.S. Geological Survey's Earth Mapping Resource Initiative (Earth MRI). As members consider reauthorization, we urge Congress to robustly fund Earth MRI so the program can continue establishing a modern, publicly available geoscience database which constitutes a strategic imperative for securing U.S. critical mineral supply chains.

Public geoscience data accelerates the discovery of critical mineral resources by incentivizing industry exploration with information that lowers project costs, risk, and lead times. Attaining national coverage of preliminary data like airborne geophysical surveys remains necessary for the U.S. to achieve its maximum competitive advantage and make the most out of its domestic resources. Here, however, the U.S. has lagged competitor countries including China, Saudi Arabia, Australia, Canada, and Chile in modern mapping efforts. This has contributed to the U.S. ceding significant industry investment in mineral exploration to foreign competitors, falling from 20% of global spending in 1993 to only 11% in 2020 while the number of metal mines in the U.S. has decreased by over a third.

Earth MRI is the tool to reverse this decline. Since its founding in 2019, Earth MRI has made remarkable progress in building a modern geoscience database, covering roughly a quarter of the U.S. with airborne surveys in a few short years. At current rates, the program will require an additional 15 years to achieve national coverage *if* Congress renews funding at the \$64 million per year provided through FY26 by the Infrastructure Investment and Jobs Act.

Reauthorizing the program without replenishing its nearly depleted funds will bring this national imperative to a standstill—a strategic mistake at precisely the moment when bipartisan appreciation for the urgency of securing critical mineral supply chains has materialized. This will further extend the U.S. backlog and risk ceding additional ground to competitor nations—including China—who offer more sophisticated and comprehensive data resources.

This risk will compound with further delay as a modern geoscience database will increasingly serve vital roles in supporting mineral industries through rapidly evolving technical developments. Innovations in artificial intelligence, for example, stand to radically improve the efficiency of critical mineral resource discovery but require robust datasets. Comprehensive assessments of domestic geology can unlock previously unknown types of resources that offer more competitive economics. Meanwhile, filling data gaps across the U.S. can offset the challenges industry faces as it must continually look deeper for mineral deposits or for critical minerals they possess little experience in since they have only recently gained strategic importance.

The U.S. faces a stark choice to either forgo these opportunities and worsen our competitiveness—or seize them and leapfrog to a position of leadership.

We respectfully urge Congress: do not hobble U.S. critical mineral policy by underinvesting in Earth MRI. Beyond the strategic value, the Committee should recognize that public spending on geoscience data is an investment—not an expense. Experiences from other countries with similar programs consistently show that publicly funded mapping programs more than pay for themselves in the form of tax revenue from increased mineral production. Comparable programs in Australia, Canada, and Chile, for example, have returned between \$10 and \$48 in tax revenue for every dollar spent, and have stimulated private investment at multiples of up to \$53 per public dollar.

Funding Earth MRI's data collection efforts readily complements future permitting reforms that seek to expedite project lead times. Congress has rightfully focused on regulatory barriers and litigation delays when developing permitting reforms. However, airborne survey data can also expedite critical mineral project lead times by accelerating the exploration and planning stages of the development timeline that proceed permitting, reducing overall lead times by 20%.

Earth MRI's value extends well beyond the critical mineral sector. The varied datasets inform decisions on natural hazard assessment including earthquake, landslide, and flood risk water resources management, infrastructure and transportation planning, geothermal resource development, and emergency response. The Infrastructure Investment and Jobs Act also tasked Earth MRI to locate and characterize areas with abandoned mines with waste that could yield critical minerals, potentially catalyzing the clean up of the thousands of legacy sites left unremediated before the passage of basic land management laws in the 1970s. Meanwhile, all activities serve as a springboard for innovation and workforce development. In total, every federal dollar spent on Earth MRI simultaneously delivers returns across multiple national priorities.



If anything, Congress should consider expanding Earth MRI funding. Greater annual appropriations than the Infrastructure Investment and Jobs Act provided could expedite the program's progress or expand its capabilities to include subsurface core drilling. The airborne surveys Earth MRI performs remain necessary to accomplish national coverage of basic geoscience data. Funding core drilling would allow more advanced characterizations of specific anomalies that the program's airborne surveys have indicated, like the potential rare earth element deposit discovered in Maine or the gallium deposit identified in Arkansas.

Producing critical minerals tomorrow requires investing in their discovery today. The Breakthrough Institute respectfully urges the Committee to support a reauthorization that maintains, at minimum, the Infrastructure Investment and Jobs Act funding level that Earth MRI previously received and to consider the strong case for enhancing the program with the additional resources needed to close the gap between the United States and its global competitors. We would welcome the opportunity to discuss these recommendations further with Committee staff.

Respectfully submitted,

The Breakthrough Institute