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U.S. Warned of National Security Risk from China's Grip on Battery Materials

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The United States is increasingly reliant on China for critical battery and rare earth materials essential to both its defense and civilian industries, a dependency described by some analysts as a “life-or-death matter” for national security. Recent data shows China controls more than 90 percent of global processing capacity for rare earths and dominates the battery supply chain, particularly for lithium-ion cells and magnets. This

positions Beijing to potentially disrupt U.S. military readiness through targeted export restrictions.

China held around 80 percent of the world's raw-material refining capacity for lithium-ion batteries and nearly 77 percent of global battery-cell manufacturing as of 2020. It also controls more than 90 percent of high-strength magnet production and crucial intermediates used in defense systems, from missiles to guidance electronics, according to the Council on Strategic Risks. In July 2025, experts warned lawmakers that China's overwhelming share of mineral processing is now "a life-or-death matter for the 21st century."

Congressional Republicans have criticized the Biden administration's clean-energy policies, arguing they leave the Department of Defense exposed by shifting reliance onto Chinese-controlled supply chains. They advocate for bolstered domestic capacity and stronger partnerships with allies such as Canada and Australia. Senator Joni Ernst highlighted that China controls three-quarters of the lithium-ion supply chain, a position she described as dangerous amid escalating geopolitical tension.

China has recently tightened export controls on a suite of "dual-use" minerals, such as gallium, germanium, and tungsten, essential for semiconductors, defense systems, and electric vehicle batteries. Export restrictions target multiple high-end sectors, raising alarms that Beijing may weaponize its dominance in a future trade standoff.

In response, the Pentagon and private sector are actively pursuing alternatives. Initiatives include expanding domestic mining, refining capacity, and stockpiling; leveraging allied sources; and imposing stricter export controls on Chinese firms like CATL, which was classified as a

“Chinese military company” by the Department of Defense earlier this year. Still, defense-tech startups report high costs and complexity in decoupling from Chinese suppliers.

This supply vulnerability echoes historical rare-earth export bans from China to Japan in 2010, reminding U.S. leaders of the strategic importance of raw materials that underpin military and tech infrastructure.

For conservative strategists focused on national defense, the imperative is clear: grow domestic and allied supply capabilities, employ industrial policy tools, and use tariffs or stockpiles as a buffer. Reducing dependence on China is not just an economic strategy; it’s a cornerstone of U.S. security policy in the 21st century.