

RARE EARTH ELEMENTS FROM MINE TAILINGS

- **Strengthens U.S. Supply Chain Security**

Reduces dependence on foreign sources and ensures strategic materials are produced under U.S. labor and environmental standards.

- **Minimizes Environmental Impacts**

Tailings are already-disturbed material — extracting REEs from them avoids the major land disruption, water use, and ecological damage associated with new mines.

- **Converts Waste into Value**

Many tailings piles pose long-term contamination risks. Recovering REEs can help fund remediation and reduce toxicity, turning a liability into an asset.

- **Faster, More Efficient Development**

Existing industrial sites, infrastructure, and permitting pathways mean quicker deployment and lower community resistance than greenfield mining.

- **Economic Benefits for Mining Regions**

Creates new high-tech jobs and revitalizes rural economies where mines have closed — particularly in Appalachia and the Mountain West.

- **Advances a Circular Economy**

Improves resource efficiency by recovering valuable minerals already extracted from the Earth.

- **Drives Innovation & U.S. Leadership**

Promotes cutting-edge extraction technologies that can be exported globally — positioning the U.S. at the forefront of clean tech.

Company	What They Do
Phoenix Tailings (MA / NH)	A leading “pure-play” REE refining company aiming to build a circular supply chain: they process tailings, recycled materials, and other wastes into rare-earth metals and alloys.
Tusaar Corp. (CO)	Operating a demonstration facility in Broomfield, Colorado — Tusaar uses proprietary chemistry / media-based processes to recover REEs from mine wastes (tailings), industrial waste, coal fly ash, recycled magnets, etc
REEgen Inc. (NY)	A startup spun out of academia (2022), using “clean processes” (including bio-/green-mining / biomining methods) for REE recovery — aiming to recover REEs from recycled waste streams, slags, byproducts, and non-traditional sources rather than new mines.
American Resources Corporation (via its subsidiary ReElement Technologies + Electrified Materials Corporation / EMCO)	Through EMCO and ReElement, this group has developed a recycling platform to extract REEs from e-waste (e.g. magnets, hard-drives, tools) and refine them into high-purity oxides. Their 2025 announcements highlight scalable REE recycling for commercial and defense uses.
ERI (electronics-waste & IT-asset recycler, in partnership with ReElement)	ERI aggregates and processes end-of-life electronics / magnets, then works with ReElement to refine REEs — offering a pathway for recycling existing REE-containing products back into supply chains