

International Battery Metals (IBAT) and US Magnesium Sign Agreement to Install World's First Modular Direct Lithium Extraction (DLE) Plant



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International Battery Metals Ltd. →

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- ***Modular design provides scalability and smaller footprint***
- ***Technology effective with diverse brine resources, including oilfield produced brines, as well as subterranean brines***

VANCOUVER, BC and HOUSTON, May 6, 2024 /PRNewswire/ -- **International Battery Metals Ltd.** (CSE: IBAT), today announced an agreement with US Magnesium LLC (US Mag) for the installation of its first-of-its-kind, patented modular direct lithium extraction (DLE) plant installed at a brine resource. The mobile facility is co-located at US Mag's existing operations outside Salt Lake City, Utah. IBAT's plant will process brine produced from lithium-containing waste-magnesium salts. The resulting lithium chloride product will provide feed for high-purity lithium carbonate production by US Mag.

Modular, transportable design. In the last month, IBAT has initiated most of the equipment setup, including pipe and utility tie-ins and other installation activities of its patented modular extraction plant at the US Mag site. Initial testing of critical equipment is underway. IBAT anticipates that full commissioning and startup will be completed within the next three months, with commercial lithium production to follow shortly thereafter.



"Our commercial operations with US Mag will advance a productive lithium extraction operation," said Garry Flowers, IBAT CEO. "Given current lithium demand, supply dependence on China, and permitting challenges, our expected commercial operations are coming at an ideal time to produce lithium at scale in the U.S."

IBAT's patented modular plant was fabricated in Lake Charles, La., before being recently transported to US Mag.

Independently verified. IBAT's technology has been validated by an independent review by SLR International Corporation, a global leader in environmental and engineering services, and Greg Mehos & Associates LLC, an independent testing agency. The technology has been proven effective with diverse brine resources, including lithium-containing oilfield produced brines, where it holds great promise based on a large-volume test with Galvanic Energy in the Smackover Formation in Arkansas. The technology also has been proven effective with subterranean brine resources in Alberta, Saskatchewan, Michigan, Ohio, Oklahoma, California, Texas, Salars in Chile and Argentina, and geothermal brine in Germany.

Commercial operations will serve growing lithium demand from automakers for electric-vehicle batteries, as well as energy storage batteries to support growing electricity demand and to balance the grid from increased renewable energy integration.

Designed for sustainability. IBAT's first-of-its-kind patented modular, mobile lithium extraction plant also has been independently verified to extract more than 97% of available lithium from brine. Further, laboratory and field tests have demonstrated that the plant's effective proprietary selective absorbent maximizes lithium uptake and minimizes brine-based impurities. Due to the plant's advanced water recovery rate, IBAT's technology is highly protective of sensitive water resources. IBAT has demonstrated that the technology can extract lithium from subterranean brine sources and return the lithium-depleted brine to the same subsurface aquifer in a closed recycling loop. This work has been verified from natural brines in Canada, the U.S., Argentina, Chile, Mexico and Europe. Other than the use of acid and base for pH control, IBAT's compact lithium extraction process does not introduce chemicals into the brine. This unique patented technology promises faster delivery of lithium chloride while ensuring minimal environmental impact.

Small footprint, high yield. Another benefit is that the modular, easily transportable technology can operate within a three-acre site – a significantly smaller footprint than other types of lithium production facilities. The modular, compact design optimizes plant construction and operating costs. Engineering reviews have determined that the IBAT DLE plant design capacity is capable of initially producing up to 5,000 metric tons/year, depending on the characteristics of brine resources, such as lithium concentration and brine salt composition. The modular plant also can be expanded to accommodate larger capacity as demand requires.

The modular DLE operations position IBAT to emerge as a key supplier for growing U.S. lithium demand, providing an alternative to China and other global suppliers. This proven technology will produce at commercial scale with a smaller footprint – both in size of the facility and in terms of environmental impact.

"International Battery Metals' patented Modular Extraction Technology will be the basis of future lithium extraction from brine resources around the world. It is the fastest technology to deploy and commence commercial operations," said Dr. John Burba, founder, CTO and director of International Battery Metals. "Furthermore, its inherent efficiency and environmental protective characteristics make IBAT's technology superior to existing DLE operations. We are very excited about the placement of our first plant on a resource and the expected commencement of commercial operations."

The agreement provides IBAT with royalties from US Mag based on lithium sales, as well as payments for equipment operations based on lithium prices and performance.

About International Battery Metals Ltd.

IBAT is an advanced technology company focused on the development of environmentally responsible methods of extracting lithium compounds from brine. IBAT has developed a patented modular direct lithium extraction (DLE) plant which allows for rapid deployment to a resource holders production site. IBAT is working with resource holders of oilfield brines, brine aquifers, and industrial customers with brine by-products. IBAT believes the modular design of

its DLE plant provides significant initial costs savings to customers and the proprietary DLE technology lowers operating costs by selectively extracting lithium from the brine while efficiently removing contaminants.

ON BEHALF OF THE BOARD

Garry Flowers, CEO

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