NEO Battery Partners with Korea Zinc and Taesung to Commercialize Advanced Battery Technology for Drone, Robotics & Micromobility

04.02.2026 | CNW

- Partnership with Korea Zinc & Taesung under an MOU to Commercialize Composite Copper Foil Technology for Batteries Used in Drones, Robotics & Micromobility
- Enables Weight & Cost Reduction with Enhanced Safety Performance Versus Conventional All-Copper Foils
- Synergistic and Complementary with NEO's Silicon Anode Technology to Improve Energy Density and Cycle Life
- Joint Manufacturing with Korea Zinc of System-Level Battery Prototypes for Field Demonstration and Validation

NEO Battery Materials Ltd. ("NEO" or the "Company") (TSXV: NBM) (OTC: NBMFF), a low-cost, silicon-enhanced battery developer that enables longer-running, rapid-charging batteries for drones, robotics, and electronics, is highly pleased to announce that NBM Korea Co., the Company's subsidiary, has partnered with Korea Zinc Co., Ltd. ("Korea Zinc") (KRX: 010130), one of the world's largest non-ferrous metal smelters and refiners, and Taesung Co., Ltd. ("Taesung") (KRX: 323280), an advanced equipment technology manufacturer for non-ferrous metals, to accelerate the development and commercialization of composite copper current collector (foil) technology for high-performance batteries in drone, robotics, and micromobility applications.

The technology partnership focuses on optimizing critical lithium-ion battery performance parameters specific to drones, robotics, and micromobility. Composite copper foils provide weight reduction, cost efficiency, and enhanced safety performance compared to conventional, widely deployed all-copper foils. The composite structure replaces the central copper layer with polymer materials, reducing overall copper usage and battery weight. This material innovation further improves energy density, enabling longer operating times for the targeted applications.

Copper foil is an integral component within lithium-ion batteries, serving as the sole current collector for anode materials. Composite copper foils interact synergistically with high-capacity silicon anode materials, improving overall energy density and cycle life by mitigating mechanical strain during battery operation. The Company believes this innovation will directly complement NEO's silicon anode product, NBMSiDE®, in the manufacturing of energy-dense batteries for drones and robotics.

Under a Memorandum of Understanding (MOU), Korea Zinc, Taesung, and NEO intend to accelerate the commercialization of composite copper foil technology by leveraging each party's technical expertise across battery materials, cell manufacturing, and system integration and validation. Joint research and development activities are expected to include:

- Optimization and validation of composite copper foil material performance
- Manufacturing and process optimization, and performance evaluation of bench-scale battery cell prototypes incorporating composite copper foil technology
- Manufacturing of system-level battery prototypes for field demonstration and validation

In the initial phase, Korea Zinc and Taesung will lead the development and optimization of composite copper foil materials, and NEO will manufacture and evaluate the copper foils in bench-scale battery cell prototypes. Upon achieving targeted performance milestones, Korea Zinc and NEO plan to jointly produce battery prototypes for drone, robotics, and micromobility integration and conduct testing in live operating environments.

A Korea Zinc spokesperson stated: "Successful production and demonstration of drone and micromobility batteries integrated with composite copper foils by the end of this year would mark the first such achievement within the Korean battery industry. This would be a significant milestone in diversifying our battery materials portfolio and in proactively securing the technological capabilities necessary to address evolving market dynamics."

"Based on the outcomes of this MOU, all parties expect to secure a competitive position within the global composite copper foil market," expressed Dr. J.S. Jeoung, SVP of Cell Development & Commercialization. "By combining Korea Zinc's global upstream materials expertise with Taesung's specialized equipment technology, NEO views this strategic partnership as a meaningful advancement toward delivering a differentiated value proposition and expanding its customized solution pipeline within the global drone and robotics markets."

About Korea Zinc Co., Ltd.

Korea Zinc Co., Ltd. is one of the world's leading non-ferrous metals smelting and refining companies, with over 50 years of operational and technological experience. Headquartered in South Korea, Korea Zinc produces a diversified range of metals, including zinc, lead, copper, gold, silver, and critical rare earth metals, and operates large-scale refining facilities serving customers worldwide. Korea Zinc is advancing its long-term growth strategy through investments in renewable energy and green hydrogen, rechargeable battery materials, and resource recycling, while strengthening a sustainable and resilient global supply chain for strategic materials. For more information, please visit Korea Zinc's website at: https://www.koreazinc.co.kr/

About Taesung Co., Ltd.

Taesung Co., Ltd. was established on August 15, 2000, and has been producing world-class scrubbing machines, wet-process equipment for PCB production, and ceramic brushes, supplying to leading domestic and international PCB companies. In addition, Taesung has successfully developed composite copper foil processing equipment and glass substrate processing equipment, expanding collaborations with global corporations. Through relentless research and development and proprietary technological capabilities, Taesung has achieved excellent quality and customer satisfaction and is committed to continuous research and development and technological innovation to grow as a trusted partner for customers and the market. For more information, please visit Taesung's website at: https://www.taesung2000.com/eng/

About NEO Battery Materials Ltd.

NEO Battery Materials is a Canadian battery technology company focused on developing and producing silicon-enhanced lithium-ion batteries in drones, unmanned aerial vehicles (UAV), robotics, unmanned systems, electronics, electric vehicles, and energy storage systems for AI data centers. With a patent-protected, low-cost manufacturing process, NEO Battery enables longer-running and ultra-fast charging batteries and provides end-to-end battery solutions from materials selection, cell architecture, and process optimization. The Company aims to be a globally-leading producer of high-performance lithium-ion battery components and materials, building a secure, robust battery supply chain in North America. For more information, please visit the Company's website at: https://www.neobatterymaterials.com/.

On Behalf of the Board of Directors

Spencer Huh
Director, President, and CEO

This news release includes certain forward-looking statements as well as management's objectives, strategies, beliefs and intentions. All information contained herein that is not clearly historical in nature may constitute forward-looking information. Generally, such forward-looking information can be identified notably by the use of forward-looking terminology such as "plans", "expects" or "does not expect", "is expected", "budget", "scheduled", "estimates", "forecasts", "intends", "anticipates" or "does not anticipate", or "believes", or variations of such words and phrases or state that certain actions, events or results "may", "could",

"would", "might" or "will be taken", "occur" or "be achieved". Forward-looking information is subject to known and unknown risks, uncertainties and other factors that may cause the actual results, level of activity, performance or achievements of the Company to be materially different from those expressed or implied by such forward-looking information, including but not limited to: volatile stock prices; the general global markets and economic conditions; the possibility of write-downs and impairments; the risk associated with the research and development of battery-related technologies; the risk associated with the effectiveness and feasibility of battery material, electrode, and cell technologies that have not yet been tested or proven on commercial scale or under real-world operating conditions; the risks associated with battery-related manufacturing process scale-up, including maintaining consistent material, component, and cell quality, production yields, and process reproducibility at a pilot, semi-commercial, or commercial scale; the risks associated with compatibility of existing battery chemistries, formulations, components, or designs; unforeseen risks associated with entering into and maintaining collaborations, joint ventures, partnerships, or commercial contracts with battery cell manufacturers, original equipment manufacturers, and various companies in the global battery and downstream end-user supply chain; the risks associated with the failure to develop and produce commercially viable battery-related products or that technical goals may not be achieved within expected timelines or budgets under a joint development or collaboration; the risks associated with the Company's technologies and products not meeting performance requirements or customer specifications; the risks that prototype and pilot-scale products do not advance into commercially produced products or translate into commercial orders; the risk associated with battery components and cell purchase orders and offtake supply that may not be fulfilled in full, on time, or at all as actual revenue realization depends on delivery schedules, achievement of technical milestones, and customer acceptance and validation; the risk associated with losing official vendor registration or status with existing customers; counterparty risk upon delivery of prototype and commercial products; the risks associated with constructing, completing, securing, and financing pilot, semi-commercial, and commercial battery materials, components, and cell manufacturing facilities including the Canadian and South Korean facilities; the risks associated with potential delays or increased costs with site preparation, equipment procurement and installation, and facility commissioning; the risks associated with integrating silicon anode material production, electrode manufacturing, and cell assembly within a single operational cluster or the Company's business portfolio; the risks associated with supply chain disruptions or cost fluctuations in raw materials, processing chemicals, and additive prices, impacting production costs and commercial viability; the risks associated with uninsurable risks arising during the course of research, development and production; competition faced by the Company in securing experienced personnel, contracts and sales, and financing; access to adequate infrastructure and resources to support battery materials, components, and cell research and development activities; the risks associated with changes in the technology regulatory regime governing the Company; the risks associated with the timely execution of the Company's strategies and business plans; the risks associated with the lithium-ion battery industry and end-users' demand and adoption of the Company's silicon anode technology and battery products; market adoption and integration challenges, including the difficulty of incorporating silicon anodes and silicon battery products within battery manufacturers and OEMs' systems; the risks associated with the various environmental and political regulations the Company is subject to; risks related to regulatory and permitting delays; the reliance on key personnel; liquidity risks; the risk of litigation; risk management; and other risk factors as identified in the Company's recent Financial Statements and MD&A and in recent securities filings for the Company which are available on www.sedarplus.ca. Forward-looking information is based on assumptions management believes to be reasonable at the time such statements are made, including but not limited to, continued R&D and commercialization activities, no material adverse change in precursor, raw material, equipment, and relevant cost prices, development and commercialization plans to proceed in accordance with plans and such plans to achieve their stated expected outcomes, receipt of required regulatory approvals, and such other assumptions and factors as set out herein. Although the Company has attempted to identify important factors that could cause actual results to differ materially from those contained in the forward-looking information, there may be other factors that cause results not to be as anticipated, estimated or intended. There can be no assurance that such forward-looking information will prove to be accurate, as actual results and future events could differ materially from those anticipated in such forward-looking information. Such forward-looking information has been provided for the purpose of assisting investors in understanding the Company's business, operations, research and development, and commercialization plans and may not be appropriate for other purposes. Accordingly, readers should not place undue reliance on forward-looking information. Forward-looking information is made as of the date of this presentation, and the Company does not undertake to update such forward-looking information except in accordance with applicable securities laws.

Neither TSX Venture Exchange nor its Regulation Services Provider (as that term is defined in the policies of the TSX Venture Exchange) accepts responsibility for the adequacy or accuracy of this release.

SOURCE NEO Battery Materials Ltd.

Contact
For Investor Relations, PR & More information: info@neobatterymaterials.com, T: +1 (437) 451-7678