

Refinity Validates Breakthrough Waste Conversion Technology, Advancing Toward Commercial Demonstration

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Innventure company produces metric ton of product from real-world plastic waste, files patent applications, and secures technology licenses to expand capabilities

ORLANDO, Fla., Feb. 17, 2026 (GLOBE NEWSWIRE) -- Refinity, an Innventure (NASDAQ:INV) company focused on transforming plastic waste into valuable chemical intermediates, today announced significant technology validation results and strategic progress in its first 14 months of operations. The company has confirmed its conversion technology performs with real-world waste materials, filed patent applications protecting proprietary reactor designs, and secured technology licenses that expand its capabilities.

"In just 14 months, we've achieved milestones that typically take much larger companies years to reach," said Bill Grieco, CEO of Refinity. "The market opportunity here is substantial — 91% of plastic waste remains outside traditional recycling. Our goal is to transform that waste into the commodity raw material it should have always been, and we've built the foundation to do exactly that."

These results build on the commercialization roadmap Refinity outlined during Innventure's Q3 2025 earnings call. That roadmap includes a mid-scale demonstration at approximately 2.5 kilotonnes per year at a partner location in 2026, followed by a 10 kilotonne commercial demonstration in coming years and subsequently a full commercial scale designed for approximately 150 kilotonnes per year. The completed pilot-scale validation supports Refinity's progress toward these targets.

Technology Validation with Real-World Waste

When Refinity was formed, the underlying technology had only been demonstrated with controlled, synthetic feedstocks. Over the past 14 months, the company has completed dozens of optimization runs using real-world plastic waste purchased from commercial markets — and confirmed the technology performs at the same level.

Working with VTT Technical Research Institute of Finland, who originally developed the technology, Refinity operated at pilot scale for one week of continuous production, producing a metric ton of product from real-world waste materials with yields typically exceeding 60 to 70 percent and virtually no char byproducts.

This validation confirms the technology performs at levels consistent with earlier results using controlled feedstocks — a critical milestone that increases confidence in Refinity's scale-up plan.

Intellectual Property and Technology Licenses

Refinity filed one patent application protecting its proprietary **Refinity DuoZone™** reactor design, which affords flexibility in how Refinity processes solid plastic waste feedstock and precise control of reaction conditions. The intellectual property covers both reactor design and specific control conditions that differentiate Refinity's approach.

The company filed a second patent application protecting its ability to convert certain difficult-to-recycle plastic wastes that conventional technology solutions cannot effectively address.

Refinity also secured technology licenses that expand its capabilities across the value chain:

- A license from a U.S. university for technology that provides more efficient and flexible methods for feeding plastic waste into conversion systems.
- A license from a U.S. national lab for catalyst technology enabling, conversion of gas products into high-value chemicals including sustainable aviation fuel and its precursors.

Together, these licenses complement Refinity's DuoZone™ reactor technology and the core fluidized bed technology originally licensed from VTT, by improving feedstock flexibility at the front end and expanding high value product options at the back end of the conversion system.

Refinity continues to deepen its commercialization collaboration with Dow. Dow has provided technical expertise to help determine product specifications, supporting Refinity's path toward connecting its conversion systems with petrochemical infrastructure.

In 2026, Refinity plans to repeat its validation work at a larger scale. With key partners, including two engineering firms and two global fluidized bed equipment providers, the company is on path to complete final engineering and begin construction on a commercial demonstration system with nominal throughput of 10 kilotonnes per year.

Refinity's technology platform is designed to operate across multiple scales and can be sited near customers or near plastic waste feedstock sources, providing flexibility in deployment and market approach.

Refinity is an Innventure company developing advanced technology solutions for converting plastic waste into high value, circular chemical products. Working with a strong team of collaborators, including Dow, VTT, several engineering firms, and two global fluidized bed equipment providers, Refinity is advancing a proprietary reactor platform designed to address the 91% of plastic waste that is not recycled through traditional methods. For more information, visit refinity.com.

About Innventure

Innventure (NASDAQ: INV), an industrial growth conglomerate, focuses on building companies with billion-dollar valuations by commercializing breakthrough technology solutions. By systematically creating and operating industrial enterprises from the ground up, Innventure participates in early-stage economics and provides industrial operating expertise designed for global scale. Innventure's approach seeks to uniquely bridge the "Valley of Death" between corporate innovation and commercialization through its distinctive combination of value-driven multinational partnerships, operational experience, and capital-intensive scale-up expertise.

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