





## ITM: Isotope Production System Begins Commercial Production of Cancer-Fighting Lutetium-177

**ONTARIO, CANADA, and MUNICH, GERMANY – October 24, 2022** – An international collaboration between Bruce Power, Isogen (a Kinectrics and Framatome company) and ITM Isotope Technologies Munich SE (ITM), announced today the commencement of commercial production of lutetium-177.

The announcement was celebrated at ITM's headquarters in Munich, Germany, along with representatives of the partnership organizations during a trade mission with Vic Fedeli, Ontario's Minister of Economic Development, Job Creation and Trade.

This milestone was achieved following completion of final commissioning and regulatory approval from the Canadian Nuclear Safety Commission and is the culmination of a multi-year project to install a novel Isotope Production System (IPS) in Bruce Power's Unit 7. It marks the first-of-its-kind achievement of a commercial power reactor with additional capability to commercially produce short-lived medical isotopes.

The IPS will provide reliable, industrial-scale production of lutetium-177, a medical isotope used for targeted cancer therapeutics. Lutetium-177 is used to deploy precision nuclear medicine that precisely targets malignant cells while sparing surrounding healthy tissues.

"Ontario's nuclear industry supports thousands of high-skilled jobs and is at the forefront when it comes to innovation," said **Premier Doug Ford**. "Today's announcement is a huge step forward in advancing Ontario as a world leader of isotope production in the fight against cancer. This unique international project using Made-in-Ontario infrastructure will help doctors and patients at home and around the world have greater access to the life-saving isotopes they need."

"It is with great pride that we at Bruce Power, along with our partners at Isogen, ITM and Saugeen Ojibway Nation, celebrate the successful commencement of commercial operation of the world's first large-scale Isotope Production System for the production of lutetium-177," said **Mike Rencheck, Bruce Power's President and CEO**. "This announcement is the result of years of dedication and comes thanks to the hard work and innovative spirit of thousands of employees across this unique international partnership."

The Made-in-Ontario IPS, designed and installed by Isogen at Bruce Power, irradiates ytterbium-176 to produce lutetium-177, which is then transported to ITM's manufacturing facility in Germany for processing of pharmaceutical-grade, non-carrier-added lutetium-177 (n.c.a. lutetium-177). ITM is a supplier of n.c.a. lutetium-177 to health care facilities around the world, and the isotope has been successfully used in various clinical and commercial radiopharmaceutical cancer treatments. "Today we celebrate the efforts of Bruce Power, ITM, our Kinectrics staff, and our partner in Isogen, Framatome, whose collective efforts enabled the start of commercial supply of lutetium-177," said **David Harris, CEO of Kinectrics**. "This day marks a paradigm shift in medical isotope supply wherein the international medical community can now depend on scalable, reliable, Canadian, power-reactor produced isotopes for their cancer treatments."

The IPS will leverage Bruce Power's continual operations 24 hours a day, seven days a week to provide a consistent and scalable supply of life-saving isotopes that will be used by doctors to treat cancer patients around the world.

"We commemorate this historical accomplishment that promises potentially life-saving medical treatments for cancer patients," said **Bernard Fontana, CEO of Framatome**. "Our shared vision with our Isogen partner Kinectrics, and Bruce Power, working with ITM, has led to this significant milestone. We are proud of our teams who have persevered to design, develop, install and implement this ambitious and complex project. As part of our Framatome Healthcare brand, we are honored to play a critical role in ensuring a reliable supply of isotopes, including lutetium-177, to the medical communities around the world."

Commercial operation of the IPS will provide large-scale production of lutetium-177 at a time when global demand for these short-lived isotopes is on the rise. ITM holds a U.S. Drug Master File (DMF) with the FDA for n.c.a. lutetium-177 and has marketing authorization in the EU (brand name EndolucinBeta<sup>®</sup>). ITM has exclusive access to the irradiation service provided by the IPS for the production of lutetium-177 and will use the increased supply of high-quality isotopes from the IPS to meet the growing demand by physicians and patients.

"As the largest global provider of high-quality n.c.a lutetium-177 for therapeutic cancer treatments we are always looking to expand our production network to secure supply to provide access to hospitals and patients worldwide, and this collaboration is a testament to this commitment," added **Steffen Schuster, CEO of ITM**. "We are grateful to our partners for this smooth scale up to commercial production which will ensure production security for our own Phase 3 assets as well as our commitment to currently approved targeted radionuclide therapies leveraging lutetium-177."

Vic Fedeli, Ontario's Minister of Economic Development, Job Creation and Trade, expressed support of the international collaboration and its advancement of Ontario as a global hub for isotope production and innovation.

"International partnerships such as this one between Bruce Power, Isogen and ITM are paving the way for future innovation in key sectors in Ontario," said **Minister Fedeli**. "Congratulations to everyone involved in this milestone achievement in the production of life-saving medical isotopes! Together, we are building Ontario and continuing to ensure the province is a leader in the life sciences sector and the global isotope supply chain."

Bruce Power will collaborate with Saugeen Ojibway Nation to market the new isotope supply in an equity partnership named *Gamzook'aamin Aakoziwin*.

"The Gamzook'aamin Aakoziwin project has been years in the making, and today marks another exciting milestone on the road to help in the global fight against cancer," said Chief Conrad Ritchie, Chippewas of Saugeen First Nation. "These medical isotopes will be used to help patients receive treatments in the battle against cancer not just at home in our communities, but across the world."

"We are proud to be a part of this innovative project, which will have a positive impact worldwide on the health care community," said **Chief Veronica Smith, Chippewas of Nawash Unceded First Nation.** "Working together through this partnership, we are playing a leadership role in the fight against cancer and continuing to increase access to isotopes that are critical to innovative treatment and diagnosis of cancer."

Learn more about how isotopes help to keep hospitals safe, as well as diagnose and treat cancer at <u>www.brucepower.com/isotopes.</u>

## About Bruce Power

Bruce Power is an electricity company based in Bruce County, Ontario. We are powered by our people. Our 4,200 employees are the foundation of our accomplishments and are proud of the role they play in safely delivering clean, reliable, low-cost nuclear power to families and businesses across the province and life-saving medical isotopes around the world. Bruce Power has worked hard to build strong roots in Ontario and is committed to protecting the environment and supporting the communities in which we live. Formed in 2001, Bruce Power is a Canadian-owned partnership of TC Energy, OMERS, the Power Workers' Union and The Society of United Professionals. Learn more at <u>www.brucepower.com</u> and follow us on <u>Facebook</u>, <u>Twitter</u>, LinkedIn, Instagram and YouTube.

## About Isogen

<u>Isogen</u> is a joint venture between <u>Framatome</u> and <u>Kinectrics</u>, whose mission is to enable the use of CANDU reactors to produce the medical isotopes needed to treat and diagnose patients with serious diseases world-wide. Isogen's enabling partnerships with <u>Bruce Power</u> and ITM allows us to produce the world's largest and most reliable supply of life-saving, short-lived, therapeutic medical isotopes. Learn more at <u>www.isogen.ca</u> and follow us on <u>LinkedIn</u>.

## About ITM Isotope Technologies Munich SE

ITM, a leading radiopharmaceutical biotech company, is dedicated to providing a new generation of radiomolecular precision therapeutics and diagnostics for hard-to-treat tumors. We aim to meet the needs of cancer patients, clinicians and our partners through excellence in development, production and global supply. With improved patient benefit as the driving principle for all we do, ITM advances a broad precision oncology pipeline, including two phase III studies, combining the company's high-quality radioisotopes with a range of targeting molecules. By leveraging our nearly two decades of pioneering radiopharma expertise, central industry position and established global network, ITM strives to provide patients with more effective targeted treatment to improve clinical outcome and quality of life. Further information at: www.itm-radiopharma.com

ITM Medical Isotopes GmbH, a 100% subsidiary of ITM Isotope Technologies Munich SE, had signed a supply arrangement for lutetium-177 with Isogen in 2020.

For more information, contact: Bruce Power: John Peevers, 519-386-3799, john.peevers@brucepower.com Isogen: Brandon Emrich, 647-501-2118, <u>brandon.emrich@kinectrics.com</u> (Kinectrics), press@framatome.com (Framatome) ITM: Julia Hofmann, +49 89 329 8986 1500, <u>communications@itm-radiopharma.com</u>