



**Written submission from
Nuclear Innovation Institute**

**Mémoire de
Nuclear Innovation Institute**

In the Matter of the

À l'égard de

BWXT Medical Ltd.

BWXT Medical Ltd.

Application for a Class IB nuclear substance processing facility operating licence

Demande pour un permis d'exploitation d'une installation de traitement de substances nucléaires de catégorie IB

Commission Public Hearing

Audience publique de la Commission

June 9-10, 2021

9 et 10 juin 2021



May 3, 2021

Senior Tribunal Officer, Secretariat
Canadian Nuclear Safety Commission
280 Slater Street
P.O. Box 1046, Station B
Ottawa, Ontario K1P 5S9
Email: cncs.interventions.ccsn@canada.ca

Re: BWXT Medical Ltd. Application for a Class IB Licence (June 9-10 Public Hearing)

Dear President and Commission Members,

I'm writing on behalf of the Nuclear Innovation Institute (NII), a not-for-profit organization focused on increasing the pace of innovation and technology adoption across the nuclear industry. The NII believes that medical radioisotope production is a key contributor to the success of Canada's nuclear sector, and we strongly support continued operations in this field. The NII works with BWXT Medical as an industry partner, supporting the industry's efforts in isotope production, manufacturing and distribution by running innovative projects in the space, and producing research documents to inform policymakers and the public.

Location is important when discussing the production and manufacturing of medical isotopes. Due to the constant decay of radioisotopes, there is a fragile supply-chain that sees frequent disruption, ultimately affecting patients who rely on these pharmaceuticals. BWXT Medical is headquartered in Kanata, Ontario, which provides access to medical isotopes for its customers, including thousands of Canadians who receive life-saving treatment every year. It also provides approximately 200 highly-skilled jobs to Canadians.

BWXT Medical works together with companies, hospitals and radiopharmacies to provide radiopharmaceuticals for research, diagnostic and therapeutic uses. Some of their products, like the TheraSphere™, are used to treat liver cancer in patients worldwide. Their recent



announcement to produce Molybdenum-99 (Mo-99), the parent product of Technitium-99m, will help stabilize the global Mo-99 supply, which has seen significant disruptions in the past with the closing of Canada's NRU reactor. As the most used medical isotope in the world, a stable Mo-99 supply-chain means better patient outcomes and will allow Canada to be once again be a global leader in isotope production.

BWXT Medical is applying for its own Class IB licence so it can continue to develop these life-saving pharmaceuticals out of the Kanata facility, where Nordion had previously been producing for years. Given BWXT's history of having the highest standards for safety and regulatory compliance, we have the utmost confidence in their ability to continue producing isotopes safely at the Kanata facility. For these reasons, we believe that BWXT medical should be granted a 10-year Class IB licence.

The NII wishes to intervene by written submission only.

Sincerely,

A handwritten signature in black ink, appearing to read "E. Johnston". The signature is fluid and cursive, with a large initial "E" and a stylized surname.

Dr. Eric Johnston | Chief Innovation Officer
Nuclear Innovation Institute | Cell: 289.439.3552