

June 6, 2024

Dear Members of the Senate Committee on National Finance,

The Canadian Nuclear Association (CNA) was recently a witness during the Standing Committee on Finance's study regarding Bill C-69, the Budget Implementation Act. As the Senate committee continues its review of Bill C-69, we've outlined the Canadian nuclear industry's recommendations and an overview of the nuclear sector below.

### **Canada's Global Nuclear Advantage**

From an international and domestic perspective, attaining climate and energy security goals will require the accelerated deployment of clean energy technologies, including large and small nuclear reactors. This dynamic is creating new markets for the nuclear industry domestically and internationally.

The Canadian nuclear industry is a world leader, and it is poised to take advantage of these new markets.

Canada's CANDU technology, supply chain, uranium mining - nuclear fuel industry is tier 1 which, as of 2019, employs over 76,000 Canadians directly and indirectly in high-skilled and high-paying jobs.

Canada's nuclear industry is a leader in nuclear research, with its national nuclear laboratories at Chalk River and its network of nuclear universities across Canada. Canada's leadership is also based on its nuclear waste management initiatives being led by the Nuclear Waste Management Organization and Chalk River Nuclear Laboratories - which are recognized as leaders in international forums.

Nuclear refurbishment and the fuel cycle are foundational to the Clean Energy transition.

Canada's CANDU nuclear reactors generate about 15% of Canada's electricity providing reliable, non-emitting, and clean baseload power. Canada's nuclear energy advantage is based on successful operations and refurbishments of its CANDU nuclear fleet, and of its nuclear fuel cycle and supply chain that are necessary for its operation.

Refurbishments and major component replacement initiatives from Ontario Power Generation and Bruce Power represent over \$26 billion in investments in Ontario and Canada. The OPG refurbishment is expected to create 11,000 jobs per year, increase Ontario's GDP by \$19.4 billion, and boost Canada's GDP by \$40.6 billion. While Bruce Power is projected to generate 22,000 jobs, increase Ontario's GDP by \$3-4 billion, and add \$8-11 billion to Canada's GDP.



These critical energy projects are running on time and on budget.

These refurbishments will also impact the medical isotope sector. Over 70% of the global cobalt-60 supply is produced at Canadian nuclear power plants and Canada refines more than 90% of the world's supply.

The medical isotope industry benefits the health of Canadians and provides 8,500 jobs across the country.

A key driver behind the clean energy projects is uranium mining. Canada is the second largest uranium producer in the world with Cameco Corporation and Orano Canada as its two primary uranium mining companies. Canada exports 85% of the uranium it mines, and all uranium exports are for peaceful applications. These exports add more than \$1 billion to the Canadian economy annually.

Along with key projects underway, the industry works closely with First Nations communities and is a key employer of Indigenous communities. Companies in Northern Saskatchewan like Cameco are leading economic reconciliation and providing opportunities for the Indigenous communities to bridge their economic and infrastructure gap by being one of Canada's largest employers of Indigenous people.

### **Global Partnerships: Global Climate Goals and Energy Security**

These critical clean energy projects are running on time and budget which is a significant achievement, garnering the attention of global markets.

In efforts to meet climate and energy security goals in a world of rising geopolitical tensions, countries in Eastern Europe, Asia, and beyond are looking to the Canadian nuclear industry for solutions for their energy security and climate needs.

Indeed, Canada has signaled its support through its commitment to triple the amount of installed nuclear capacity to meet climate goals at COP28 and the Federal Government's inclusion of several important policy initiatives that now include nuclear technologies - such as the Investment Tax Credits (ITCs) and Green Bond definitions.

We applaud these measures. However, a timely and strategic approach to implementing and operationalizing these initiatives must be implemented.

This will provide benefits to the ratepayers and level the playing field. We call on all parliamentarians to support accelerating the deployment of these strategic tools, such as ITCs, to ensure Canada retains its leadership role and meets its climate and energy security objectives.



The provincial governments of Ontario, Saskatchewan, New Brunswick, and Alberta have all included nuclear technologies to meet common energy and climate goals.

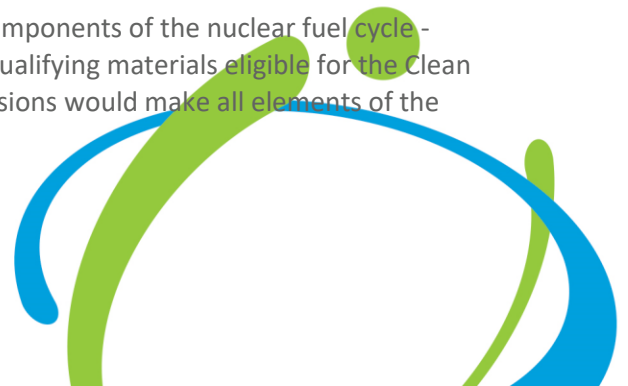
Strengthening Canada's nuclear and uranium supply chain is also foundational to meeting these common goals. Key industrial sectors, such as the resource development sector, are also looking at accessing nuclear and SMR technologies to reduce emissions, and the ITCs are a key consideration in doing so.

Key international partners are looking to Canada to delink their energy dependency from Russia and the Canadian nuclear industry is a key component of this effort. For instance, the SMR projects that will be built in Ontario and Saskatchewan support efforts in Poland and beyond in efforts to delink from Russian energy resources.

This included the support for the CANDU projects in Romania. This initiative is creating supply chain opportunities in Canada while enhancing Romania's energy security capacity in a very sensitive part of the world. Canadian uranium is increasingly seen as a strategic resource to replace Russian supply internationally to enhance energy and national security objectives.

To retain this leadership role and compete effectively with other countries, we recommend the following key amendments:

1. The appropriate definition of a Small Modular Reactor to enable the technologies chosen in Ontario and Saskatchewan to be eligible for ITCs. The definition should be 1200 MW thermal to ensure the projects are included and can proceed. As well as an operational definition of modularization that recognizes that the first units of SMRs will constitute a fleet over time.
2. Making leasehold property models clearly eligible for Investment Tax Credits which are crucial for any potential partnerships between nuclear utilities and First Nations. These financial tools enable utilities to partner with First Nations while complying with nuclear licensing requirements.
3. The CNA also recommends that the definition of eligible refurbishment expenditures include all components that enable the clean electricity assets to continue operating. Also, the project start date should be determined on a unit-by-unit basis to maximize clean energy generation opportunities.
4. We also recommend that uranium, as well as the two components of the nuclear fuel cycle - conversion and fuel fabrication, be added to the list of qualifying materials eligible for the Clean Technology Manufacturing (CTM) tax credit. These inclusions would make all elements of the fuel cycle in Canada eligible for the tax credit.



5. Finally, definitions that will be used for the Hydrogen ITC framework need to include nuclear to ensure that Canada achieves the development of a hydrogen industry.

Thank you for the opportunity to present our views. If there are any questions or follow-up items, please do not hesitate to reach out to the Canadian Nuclear Association.

Our recommendations seek to strengthen the Canadian nuclear industry as a means of achieving key economic, social climate and energy security goals in Canada and for like-minded countries abroad.

Again, thank you for the opportunity to submit our recommendations to the House of Commons Standing Committee. Please feel free to reach out if there are any questions.

Sincerely,



George Christidis

Vice President Government Relations and International Affairs

