



**Written submission from the
Association of Power Producers
of Ontario**

**Mémoire de
l'Association of Power Producers
of Ontario**

In the Matter of

À l'égard de

**Bruce Power Inc. – Bruce A and B
Nuclear Generating Station**

**Bruce Power Inc. - Centrale nucléaire de
Bruce A et Bruce B**

Request for a ten-year renewal of its Nuclear
Power Reactor Operating Licence for the
Bruce A and B Nuclear Generating Station

Demande de renouvellement, pour une période
de dix ans, de son permis d'exploitation d'un
réacteur nucléaire de puissance à la centrale
nucléaire de Bruce A et Bruce B

Commission Public Hearing – Part 2

**Audience publique de la Commission –
Partie 2**

May 28-31, 2018

28-31 mai 2018

25 Adelaide St. E
Suite 1602
Toronto ON, M5C 3A1



APPRO
ASSOCIATION OF
POWER PRODUCERS
OF ONTARIO

April 15, 2018

Canadian Nuclear Safety Commission
c/o Louise Levert, Secretariat
280 Slater St., Box 1046
Ottawa, ON
K1P 5S9

Dear Ms Levert,

Re: 2018-H-02 (An application from Bruce Power Inc. (Bruce Power) to renew its Nuclear Power Reactor Operating Licence for the Bruce Nuclear Generating Stations (NGS) A and B for a period of 10 years).

The Association of Power Producers of Ontario (APPRO) wishes to participate as an intervenor in the above noted Hearing, on either May 30 or 31. APPRO requests that it be able to make both a written submission and an oral presentation.

APPRO is a trade association representing independent commercial electricity generators in Ontario, and the largest organization of its type in Canada.

Its members include more than 100 companies involved in the generation of electricity in Ontario, including, generators and suppliers of services, equipment and consulting services. APPRO members produce power from many technologies and fuel sources including hydro-electric, natural gas, nuclear power, wind, solar, biomass and others. APPRO members provide almost 50% of Ontario's electricity. Bruce Power is a member of APPRO.

APPRO was established in 1986 as the Independent Power Producers' Society of Ontario (IPPSO) and changed its name to APPRO in 2003.

APPRO is involved in a range of public policy and regulatory issues of concern to the power industry. The organization also runs the Annual Canadian Power Conference and produces a number of publications, both hardcopy and electronic. The APPRO conference is the largest annual event of its type in Canada, and its magazine, IPPSO FACTO, is considered by many in the industry to be one of the most authoritative periodicals on electricity business and policy issues in Canada.

Our mission is the achievement of an economically and environmentally sustainable electricity sector in Ontario that supports the business interests of electricity generators, ratepayers and the provincial economy.

APPPrO's advocacy work is primarily focused on commercial, regulatory and policy issues affecting generators in Ontario including electricity market rules and the Independent Electricity System Operator (IESO) Market Renewal Project (MRP), various power procurement processes, the regulation of the natural gas market both provincially and federally, climate change rules and compliance mechanisms, facility approval requirements, transmission development, distributed generation, and a number of other issues.

As the largest commercial generation association in Ontario, actively involved in all aspects of electricity policy and operations, and representing many different generation technologies, we believe that we can bring an important and singular perspective to the Commission's deliberations on the above noted matter.

As the Commission will know, the CNSC Chair Dr. Michael Binder has spoken at the annual APPPrO Conference, and so would be familiar with our association.

Finally, I should note that APPPrO has not received nor is requesting participant funding. We are requesting intervenor status simply to contribute to the public record in this important matter and assist the Commission in its work.

I trust this is sufficient, but please let me know if there is other material to be completed in support of this request.

Respectfully submitted,

A handwritten signature in black ink, appearing to read 'David Butters', is written over a horizontal line. The signature is stylized and cursive.

David Butters
President & CEO

Submissions of the Association of Power Producers of Ontario (APPrO)

APPrO has always supported a long-term vision for the electricity system in Ontario. That is why this license renewal is a critical component to Ontario's energy future.

Renewing this license allows Ontario to continue to progress down a path that has already modernized and transformed Ontario's energy system. APPrO notes that Commission hearings are governed by Canadian Nuclear Safety Commission Rules of Procedure, under the Nuclear Safety and Control Act. This provides a robust, stakeholder accessible process in which to assess life-extension of Bruce Power.

Our world is rapidly changing. We are transitioning to a lower carbon economy that protects the environment while stimulating investments made in low-carbon innovation. It is critical that as our world moves toward a cleaner sources of electricity, we maximize the economic use of existing strategic assets that fulfill this vision. Ontario has developed a very low carbon intensity electricity supply mix that consists of various sources including hydro, natural gas and renewables – but for these sources to be a part of our supply mix for price stability and reliability, they need to work alongside Bruce Power nuclear. Indeed, we cannot pursue a modern electricity system without the stability of nuclear power generation. Renewal of the Nuclear Power Reactor Operating Licence for the Bruce Nuclear Generating Stations must be a strong priority as success with these projects represents a low-cost, high volume source of emissions-free electricity to help meet Ontario's long-term needs.

A diverse supply mix draws on the strengths of various generation technologies, and nuclear is a critical contributor to the sustainable, clean-growth economy of the future. By renewing their operating license, we can ensure our nuclear power continues to provide the people of Ontario a source of affordable, reliable, clean electricity.

With the phase-out of coal in particular, this has carved out a requirement to provide flexibility when demand in the province drops, while also ensuring availability to meet market peaks and demands. Bruce Power is the only nuclear facility in the province that can provide Ontario's electricity market with flexible capability, dynamically removing up to 2,400 megawatts from the grid upon request. From an overall supply mix perspective, the role of Bruce Power nuclear today will play a critical role in keeping electricity costs low for Ontario families and businesses, as we capitalize on this dynamic capability that will be essential in moving our province forward.

The 2017 Ontario Long Term Energy Plan (LTEP) notes that the "...most cost-effective option for producing the baseload generation the province needs while releasing no GHG emissions is to refurbish Ontario's nuclear generating stations." Therefore, renewing the BNGS license, and refurbishing the units will allow Ontario to lock-in significant affordable, reliable and emission-free generation capacity for the long-term benefit of Ontario.

For example, the refurbishment and long-term operation of Bruce are expected to generate up to \$4 billion in economic benefits annually and increase employment by up to 22,000 jobs. It's

estimated that by securing the Bruce site until 2064, the long-term, annual economic impact will be 22,000 direct and indirect jobs annually through to 2064.

The safety standards of nuclear power operations are fundamental to the success of Ontario's electricity system. Bruce Power has consistently maintained world-class health and safety standards that are essential to achieving the province's long-term energy goals. Bruce Power exhibits a track record of success from provincial, national and international regulators time after time, and is leading the world in safe operating policies.

As Bruce Power has itself noted, the reactors "operate safely and meet all safety requirements." The company's Periodic Safety Review (PSR) has led to practical improvements that will enhance nuclear safety.

It is a matter of public record, that since its last licence renewal in 2015, Bruce Power has continued to improve its depth of defence, increasing its ability to communicate during any type of adverse condition, no matter how unlikely from a historical perspective.

And, extensive community engagement, which Bruce has ably documented, has built public confidence.

As we look toward Ontario's energy future, it is important that we have a safe, dependable, low-carbon, low-cost energy source that contribute to both our environmental goals and economic prosperity.

Finally, and not inconsequentially, nuclear power plays a critical role in meeting the energy and air quality needs of the province every day. Ontario continues to be a leader in reducing electricity sector air emissions and improving air quality. It's imperative we do our part to meet the growing global demand for electricity in a way that improves human life and protects the environment. Without Bruce Power, the province would need to replace 6,400 megawatts of clean, reliable and flexible baseload supply, which would be a significant logistical, economic and environmental challenge to Ontario.

In closing, thank you for this opportunity to participate in the license renewal process.