Resolution to the Conservation Council of NB 2022 Annual General Meeting, November 26, 2022

Moved by Janice Harvey

Whereas, over the past 70 years, civilian nuclear power development in Canada has proven to be uneconomic, representing the largest proportion of long-term debt for nuclear utilities, and requiring significant transfers of financial liability to taxpayers (New Brunswick - $400 million) and ratepayers (New Brunswick, Ontario);

Whereas nuclear power projects are notorious for costing orders of magnitude more and taking many years longer to complete than original estimates;

Whereas nuclear power plants typically realize far lower reliability levels than original projections, thus requiring access to expensive and extended back-up power;

Whereas many nuclear power projects have been abandoned before start-up and even after years of development, because of untenable finances;

Whereas the potential for worst-case accidents that release vast volumes of radioactive gasses and particles into the environment has been amply demonstrated at Chernobyl and Fukushima, rendering huge areas uninhabitable, and creating ongoing problems of containing radioactive wastes arising from those accidents (e.g. the need to dump tonnes of radioactive cooling water from Fukushima in the Pacific Ocean);

Whereas the long-term cost estimates of these accidents counts in the hundreds of billions of dollars, and poses long-term health risks to millions of exposed people;

Whereas in the best-case scenarios for operation, civilian nuclear power plants release radionuclides to the environment, such as tritium from CANDU reactors, at levels known to pose health risks;

Whereas in the best-case scenarios, the operation and decommissioning of civilian nuclear power plants involves the generation of high-level radioactive wastes which must be isolated from the environment and human contact for thousands of years;

Whereas at the end of their lifespan, nuclear power plants must be decommissioned and its component parts constituting low, medium and high level radioactive wastes, and the sites treated as permanently-contaminated sacrifice zones;

Whereas the last resort for handling high-level radioactive wastes in Canada and the United States is to bury them in remote rural regions and Indigenous territory, for which prior and informed consent is not established and is subject to gross power imbalances between rural/Indigenous communities and agencies charged with finding a final resting place for these dangerous wastes (in Canada, the industry-led Nuclear Waste Management Organization – NWMO), entrenching and exacerbating already widespread environmental injustice (the disproportionate siting of hazardous waste sites and polluting industrial activity in rural, racialized and Indigenous communities);

Whereas the connection between civilian nuclear reactor technology and military applications of nuclear technology, in particular the production of nuclear bomb materials, has been amply demonstrated, particularly the development of weapons-grade uranium and plutonium (Canadian and US civilian nuclear industries arose from military applications; the US Department of Energy is responsible for nuclear weapons development; India developed its nuclear weapons capability from civilian technology provided by Canada; Iran's civilian nuclear program is the focus of international sanctions to prevent that country's development of nuclear weapons);

Whereas the various proponents of nuclear power projects being promoted as 'small modular nuclear reactors' or SMRs provide no evidence to back up their claims that this 'next generation' of nuclear reactors will avoid the problems associated with conventional large-scale reactors;

Whereas the many next-generation reactors being pitched in Canada only exist 'on paper' or as prototypes which are now shut down and never operated commercially, and therefore there is no track record to legitimize the claims of financial and market viability, let alone operational and safety viability;

Whereas the two SMR models being proposed for New Brunswick have plutonium reprocessing (Moltex) or production/breeder (ARC) components, plutonium being arguably the deadliest material known to man, and therefore will mobilize plutonium as a waste product, a contaminant capable of being released to the local environment accidently, or as a commodity for legal or illegal trade;

Whereas the claim that the Moltex reactor design will 'recycle' high level nuclear waste, in particular plutonium, and therefore reduce the existing stockpiles of nuclear waste currently sitting on nuclear reactor sites including Point Lepreau, is highly and deliberately misleading, when in fact, only a minuscule portion of that waste inventory will be used, and further, the Moltex operation will generate even more and different categories of nuclear waste, including high level waste;

Whereas the financial viability of the SMR business model in New Brunswick depends on the existence of global markets for this technology, since the proposition is to manufacture the modular components of these reactors for export;

Whereas there is no demonstrated global market for these reactors for electricity purposes;

Whereas the plutonium dimensions of both Moltex and ARC reactor designs make them particularly attractive to regimes or factions aspiring to acquire nuclear weapons, thereby raising the risk that any modular reactor export business will contribute to nuclear proliferation;

Whereas these combined financial, environmental, health and proliferation risks associated with both conventional and next-generation reactors impose incalculable burdens on the future in the pursuit of short-term gain for a few;

Whereas the claims that these next-generation reactors are necessary to decarbonize the grid in the face of climate change, and provide baseload power to level out the intermittent production by renewables have been debunked, and that nuclear power and renewables are incompatible on the electrical grid;

Whereas the cost of electricity from new nuclear projects is far higher than that of electricity demand reduction and new renewable energy projects and therefore will continue drive up customer power rates (and recognizing the most of NB Power's debt is related to the Point Lepreau nuclear plant and that this plant produces the highest cost electricity on the NB Power grid);

Whereas the promotion of nuclear power by the provincial and federal governments as a necessary response to climate change, and a viable economic development initiative, represents a dangerous and expensive distraction from immediate, effective action on climate change;

Therefore be it resolved that the Conservation Council of New Brunswick opposes nuclear power as a future energy source and promotes instead investment in real climate solutions including deep energy demand reduction and appropriately-scaled, locally-owned renewable energy projects, that will insulate New Brunswickers from ever-escalating power costs and reduce our long term liabilities for nuclear waste and maintenance of nuclear sacrifice zones.

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