Canadian Nuclear Safety Commission | Commission canadienne de sûreté nucléaire

CMD 24-H7.9A

File / dossier : 6.01.07
Date: 2024-10-15
e-Doc: 7374489

## Supplementary Information

## Renseignements supplémentaires

# Presentation from the Concerned Citizens of Renfrew County and Area

# Présentation de Concerned Citizens of Renfrew County and Area

In the Matter of the

À l'égard des

**Canadian Nuclear Laboratories Ltd.**

**Laboratoires Nucléaires Canadiens Ltée**

Application for the renewal of the nuclear research and test establishment decommissioning licence for the Whiteshell Laboratories site

Demande visant le renouvellement du permis de déclassement d'un établissement de recherche et d'essais nucléaires pour le site des Laboratoires de Whiteshell

**Commission Public Hearing**

**Audience publique de la Commission**

**October 23, 2024**

**23 octobre 2024**

Canada

# CNL’s application for a 3-year renewal of the decommissioning licence for the Whiteshell Laboratories

Oral presentation, October 23-24, 2024 virtual public hearing

Ole Hendrickson
Concerned Citizens of Renfrew County and Area

# Fire Safety

An objective observer might conclude that failure to meet fire safety requirements indicates that CNL is not “qualified to carry on the activity that the licence will authorize the licensee to carry on.”

- As per section 24 of the *Nuclear Safety and Control Act*, the Commission should not renew CNL’s licence.

# No acceptable plan for managing WL decommissioning waste

The following statement on page 4 of CNL's written submission, CMD 24-H7.1, is unsupported:

- "Canadian Nuclear Laboratories has achieved effective management of high, intermediate, and low-level waste."

There is no licensed facility at AECL's  Chalk River Laboratories (CRL) that can accommodate the long-term storage or disposal of WL waste.

First Nations, civil society groups, and municipalities have asked that WL waste shipments to AECL's Chalk River Laboratories cease. In May 2021, the City of Ottawa wrote CNSC and CNL calling for

- "stopping current and future import or transfer of external Atomic Energy of Canada Limited (AECL) waste from other provinces (e.g., Manitoba)."

# CNL's licence application lacks information required by the *General Nuclear Safety and Control Regulations*:

- 3(1)(j)… the name, quantity, form, origin and volume of any radioactive waste or hazardous waste that may result from the activity to be licensed… and the proposed method for managing and disposing of that waste.

- In providing only volume information – and not name, quantity (i.e., in Becquerels), form and origin – CNL's licence application does not meet regulatory requirements.

- It is a long-standing problem that the CNSC treats radioactive waste as a transport issue, not as a long-term safety issue.

- Waste management becomes a shell game. Waste is moved from place to place, with no consideration of management or disposal -- containment and isolation from the biosphere.

# IAEA General Safety Guide GSG-1, *Classification of Radioactive Waste*, on the hazards of nuclear research facility waste:

III–17. Research facilities (e.g. hot cell chains, glovebox chains) or pilot plants for checking fuel fabrication processes (particularly the fabrication of mixed uranium plutonium oxides, known as MOX), for fuel reprocessing (particularly advanced schemes), and for post-irradiation examinations, as well as their analytical laboratories, generate types of waste that, often, are different from the typical waste generated by industrial plants.

- Owing to the presence of nonnegligible amounts of long-lived alpha emitters, waste from research facilities generally belongs to the ILW class and even, in some circumstances, to the HLW class.

# IAEA guidance (GSG-1) on managing ILW

The importance of describing the origins of the WL waste, both as a condition of issuing a decommissioning licence, and in terms of compliance with the *General Nuclear Safety and Control Regulations*, cannot be overstated:

- Intermediate level waste (ILW)… because of its content, particularly of long-lived radionuclides, requires a greater degree of containment and isolation than that provided by near surface disposal.
- ILW may contain long lived radionuclides, in particular, alpha emitting radionuclides that will not decay to a level of activity concentration acceptable for near surface disposal during the time for which institutional controls can be relied upon.
- Therefore, waste in this class requires disposal at greater depths, of the order of tens of metres to a few hundred metres.

# WL decommissioning waste not has undergone the detailed characterization and classification required for safe long-term management

In May 2021, our group wrote IAEA Director Rafael Grossi about Canada's *Seventh National Report to the Joint Convention on the Safety of Spent Fuel Management and on the Safety of Radioactive Waste Management*.

- non-transparent reclassification of WL ILW as LLW
- failure to provide information on activity levels in the WL waste
- large, unexplained decreases in total volumes of ILW and LLW at WL -- "The 7th report should explain the 73% decrease in ILW volume and the 21% decrease in LLW volume at the Whiteshell Laboratories."

# “Consideration of the potential *in situ* decommissioning of WR-1 is out of the scope of this licence renewal hearing”

- The April 12th Revised Public Hearing Notice  also notes that “the decommissioning approach authorized under the current licence is a **complete dismantlement and removal of the facility**.”

- This begs the question, “Removal to where?”

- Our group would be grateful if Commission members would ask about this matter, which has major significance for Ottawa valley residents.

- We suspect that CNL would attempt to ship ALL the waste that would be entombed in the WR-1 to CRL if the WR-1 project is not licensed.

# CNL's plan to retrieve the HLW in the Concrete Canister Storage Facility and transport it to CRL

- What facilities would be used to transfer HLW from dry storage into transport containers?
- What are the estimated radiation doses associated with retrieval and transport?
- What tests have been performed on the transport containers? Are they fully licensed?
- Are emergency response plans in place in the event of a transport accident?
- Will emergency response providers be notified of shipments?

# CNSC Staff CMD 24-H7 proposes that this “fuel consolidation project” will be subject only to “CNSC staff review and acceptance.”

- We strongly object.
- First Nations and the public should be given more details about this project and an opportunity to ask questions and provide comments.
- No shipments of WL spent fuel (or other HLW) to CRL should take place without prior approval from the Commission.