

Environmental Assessment Report: New Brunswick Power Corporation — Point Lepreau Nuclear Generating Station — PROL 17.04/2017 Licence Renewal

November 2016





EXECUTIVE SUMMARY

The Canadian Nuclear Safety Commission (CNSC) conducts environmental assessments (EA) under the *Nuclear Safety and Control Act* (NSCA) for all projects in accordance with its mandate, to ensure the protection of the environment and the health of persons. The safety component of CNSC's mandate is covered in the safety case assessment carried out for all projects.

This EA Report, written by CNSC staff for the Commission and the public, describes the findings of the EA under the NSCA completed for the licence application by the New Brunswick Power Corporation (NB Power) to Renew the Point Lepreau Nuclear Generating Station (Point Lepreau NGS) Power Reactor Operating Licence (PROL 17. 04/2017 issued January 1, 2015 and expires June 30, 2017). This licence covers the single CANDU-6 reactor within the generating station and also includes to the Solid Radioactive Waste Management Facility (SRWMF). In 2008, a licence amendment consolidated the SRWMF operating licence with Point Lepreau NGS's operating licence into a single Point Lepreau PROL.

This EA under the NSCA includes CNSC staff's assessment of the licence application and the documents submitted in support of the application, annual environmental monitoring reports, the results of previous studies, compliance verification activities (e.g., inspections, audits, and reviews) conducted at the Point Lepreau NGS, as well as the findings of CNSC's Independent Environmental Monitoring Program (IEMP).

The EA Report focuses on items that are of current public and regulatory interest such as releases to air and surface water, as well as the health of the surrounding human populations, and the protection of groundwater, surface water, aquatic, and terrestrial environments.

CNSC staff's conclusions are based on, but are not limited to, the following:

- That NB Power's environmental protection programs meet CNSC regulatory requirements.
- The findings and methodology of NB Power's most recent site-wide Environmental Risk Assessments (ERA), provided that outstanding recommendations are addressed (discussed in section 2.1.1).
- The results of CNSC's 2014 and 2015 IEMP that confirm the public and the environment in the vicinity of the Point Lepreau NGS site are protected from the releases of the facility.

Based on the EA under the NSCA conducted for this licence application, CNSC staff conclude NB Power has and will continue to make adequate provision for the protection of the environment and the health of persons.