



**Environmental Assessment Report:  
Ontario Power Generation (OPG)  
Western Waste Management Facility Expansion  
and Operating Licence Renewal**

**December 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 Ontario Power Generation Ltd. (OPG) to renew the Western Waste Management Facility (WWMF) low and intermediate level waste management facility operating licence, WFOL-W4-314.03/2017. As part of their application for licence renewal, OPG is requesting a change to the facilities of the current licence and for authorization to include site preparation and construction of several waste storage buildings, in-ground waste containers, a large processing building and a waste sorting building.

This EA Report includes CNSC staff's assessment of the licence application and the documents submitted in support of the application, with a focus on OPG's annual environmental monitoring reports, compliance verification activities (e.g., inspections, audits, reviews, etc.) conducted at the WWMF site, OPG's Environmental Risk Assessment and Predictive Effects Assessment, findings of CNSC's Independent Environmental Monitoring Program (IEMP), and the facility's Preliminary Decommissioning Plan.

The EA Report focuses on environmental topics that are of current public and regulatory interest such as potential health effects for the public or the environment, as well as potential project-environment interactions with the atmospheric, geological, hydrogeological, aquatic or terrestrial environments.

CNSC staff's findings from this EA under the NSCA include, but are not limited to, the following:

- OPG's environmental protection programs meet CNSC regulatory requirements.
- OPG's Predictive Effects Assessment assessed the potential environmental (ecological and human health) effects from the WWMF emissions and is in compliance with CSA Group standard N288.6-12, *Environmental risk assessment at class I nuclear facilities and uranium mines and mills* (2012).
- CNSC's IEMP confirms that the public and the environment in the vicinity of the WWMF site are protected from any harmful effects associated with releases from the site as a whole.

Based on the EA under the NSCA conducted for this licence application, CNSC staff conclude that OPG has adequate programs and mechanisms in place for the protection of the environment and the health of persons until decommissioning and abandonment of the site.