

Project Overview

Metro Vancouver is upgrading the Iona Island Wastewater Treatment Plant (IIWWTP) located in Richmond, BC to comply with provincial and federal regulations. Numerous ecological restoration projects will be implemented as part of the plant upgrade, making this one of Canada's most transformative urban sustainability projects. Once complete, the IIWWTP will exceed regulatory requirements and will be resilient to seismic events and future sea level rise.

The Treatment Plant

Built in 1963, the IIWWTP is one of North America's last remaining primary treatment plants. It currently serves over 750,000 people in the Vancouver Sewerage Area and is nearing the end of its service life. To protect public health and the environment in a growing region, the new modernized plant will provide reliable and advanced wastewater treatment to the region for generations to come.

In March 2022, the Greater Vancouver Sewerage & Drainage District (GVS&DD) Board of Directors approved a conceptual design for the plant as developed through the project definition process.

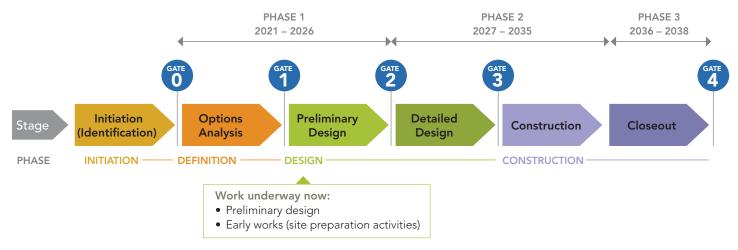


The design concepts for the projects include:

- Tertiary wastewater treatment to significantly improve the quality of treated wastewater being discharged to the Salish Sea.
- Ecological restoration projects to restore Iona Beach Regional Park's diverse and sensitive ecosystems, build climate resilience, increase park visitor connection to nature, and create integration between the wastewater treatment plant and the park.
- Resource recovery of important resources such as reclaimed water for non-potable uses, and biogas for use at the plant and to supply renewable natural gas to the Fortis BC distribution system.
- Extensive ground improvements to protect the plant from earthquake events and account for future sea level rise.

Timeline

A baseline schedule to manage critical activities and meet identified goals has been developed for the projects. The schedule is divided into three phases from 2021 to 2038.



This fact sheet was updated on November 30, 2023 to reflect the preliminary design phase timeline of the Iona Island Wastewater Treatment Plant.

Minimizing Impacts on the Community First Nations

Metro Vancouver is engaging 15 First Nations on the projects including xwməθkwəýəm (Musqueam) whose primary reserve lands are directly across from the treatment plant. Metro Vancouver is working with xwməθkwəýəm (Musqueam) to incorporate their interests and work towards rectifying past oversights through meaningful engagement.

Place - Fraser River Estuary

The Fraser River Estuary, where xwayeyat (Iona Island) and the treatment plant are located, is British Columbia's largest and most threatened estuary. It is one of the most important salmon rivers in the world, providing critical rearing habitat for millions of juvenile salmon. It is also a stopover for millions of birds as they migrate along the Pacific Flyway, and is home to a large variety of ecosystems including the regionally and provincially rare coastal sand dune ecosystem.

Project Goals

Through an integrated and regenerative approach, the upgraded plant and complementary ecological projects will:

- Improve the level of treatment from primary to tertiary to protect water quality and the marine environment
- Recover sustainable energy and resources from wastewater
- Withstand earthquakes and sea level rise
- Integrate with Iona Beach Regional Park and the surrounding environment
- Restore estuary health and fish habitat, protect bird habitat, and enhance terrestrial and freshwater ecosystems
- Minimize odours
- Connect people to nature
- Integrate xwməθkwəýəm (Musqueam) interests

Keeping the Community Informed

Metro Vancouver will keep the community informed as the projects progress by sending updates through print notifications, email, the project website, and on-site signage. You can subscribe to our mailing list to receive regular updates via email by clicking on the "sign up" button located on the project's webpage.

Our Community Liaison is available throughout the project to listen to concerns and address any questions you may have.

Contact Us

Community Liaison: 604-432-6200

(Monday to Friday from 8:00 am to 4:30 pm)

After Hours Emergency: 604-451-6610

Email: ionawwtp@metrovancouver.org

Website: metrovancouver.org/iona

metrovancouver

Together we make our region strong