

BONAVENTURE SECTOR

As a main gateway to the city, this sector has a vital economic importance for Montreal. It includes the federal section of the Bonaventure Expressway as well as the Clément Bridge. The île des Sœurs bypass bridge is disconnected from the road network, and planning for its deconstruction is underway.

Inaugurated on April 21, 1967, the Bonaventure Expressway was built to create a third approach to the Champlain Bridge. It let motorists travel directly to the downtown core and became the main route to the Expo 67 site.



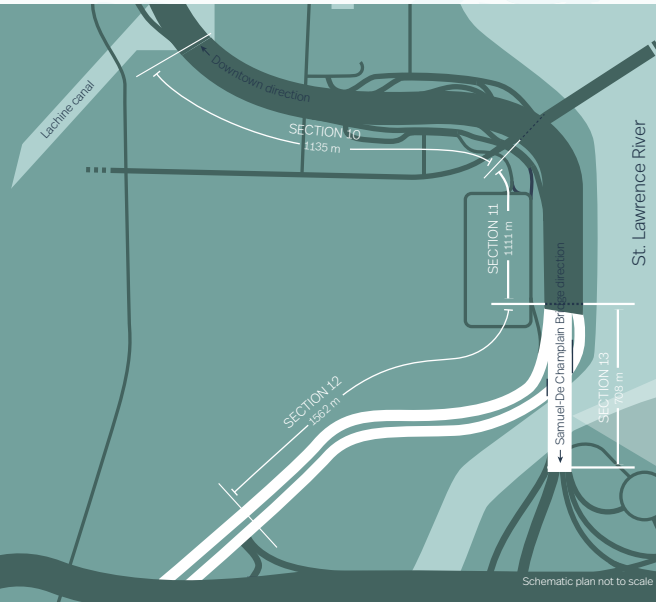
Total length of the Bonaventure Expressway: 3,516 m

SECTION 10: This elevated section of the expressway starts over the Peel Basin of the Lachine Canal and ends at the Victoria Bridge. Total length: 1,135 m

SECTION 11: This section starts west of the Victoria Bridge, runs along the St. Lawrence River, and ends before the Clément Bridge. Total length: 1,111 m

SECTION 12: This section extends from Exit 4 to the north end of Gaétan-Laberge Boulevard. Total length: 1,562 m ***including the federal section of Gaétan-Laberge Blvd.**

SECTION 13: This section consists of the Clément Bridge and the S viaduct. It also includes two other viaducts on île des Sœurs. Length: 708 m



CLÉMENT BRIDGE

Built in 1966, the Clément Bridge connects to the Bonaventure Expressway from île des Sœurs and the Samuel De Champlain Bridge. This structure has eight spans, each consisting of thirteen precast prestressed concrete beams. Its total length is 334 m, its width is approximately 20.5 m, and it has two traffic lanes in each direction.



STUDY - BONAVENTURE EXPRESSWAY RECONSTRUCTION PROJECT TO PROMOTE ACTIVE MOBILITY

The Bonaventure Expressway is reaching the end of its service life. Since major work must be done to keep this corridor reliable and safe, JCCBI wants to take the opportunity to rebuild the Bonaventure Expressway section that extends along the St. Lawrence River and redevelop this area so that residents can access the shoreline. As per its sustainable development approach, JCCBI will add a multipurpose path to provide users with an active mobility corridor in this sector.



Concept illustration



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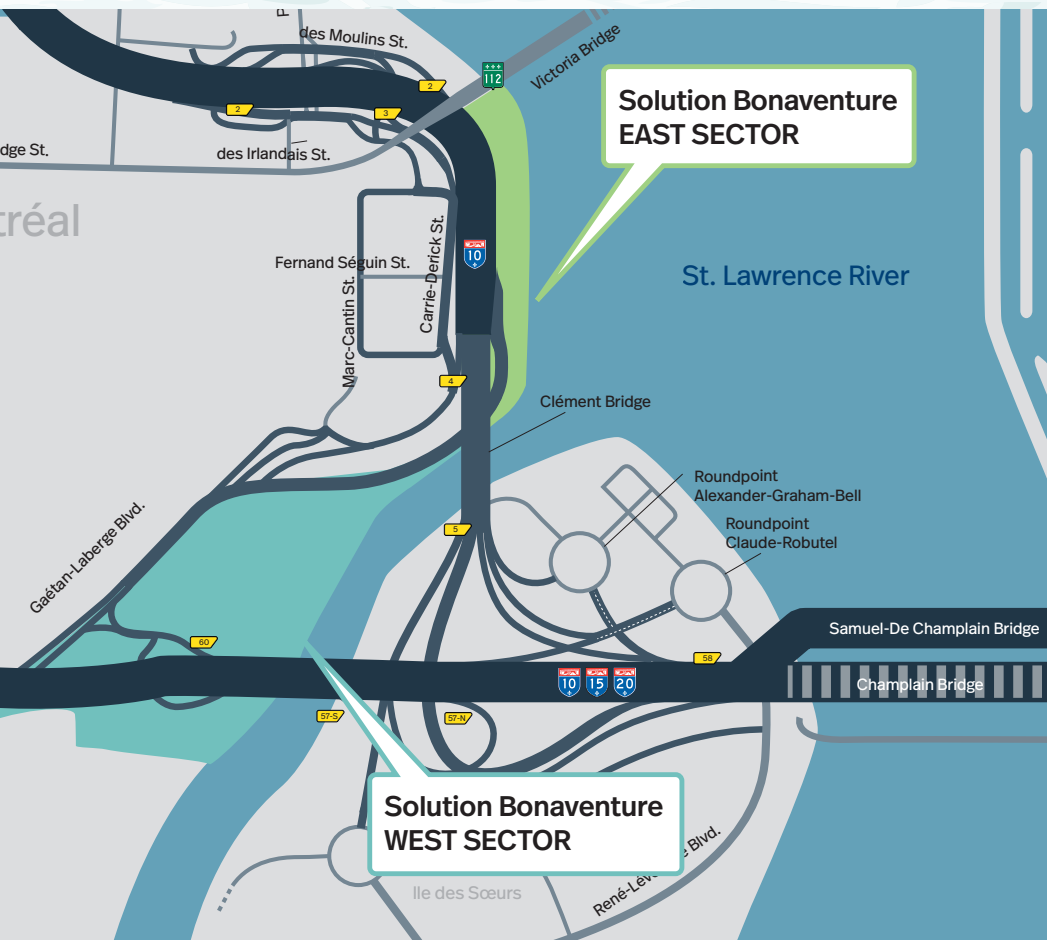
SOLUTION BONAVENTURE

The Solution Bonaventure is an environmental project to protect the St. Lawrence river against contaminant runoff from groundwater in the Bonaventure Expressway sector.

For 100 years, the shore of the St. Lawrence River was used as a landfill for industrial and household waste that has caused major contamination problems.

The Solution Bonaventure was launched in June 2016 and has been operating since 2018. The goal was to implement concrete solutions to prevent contaminants from flowing into the river.

TWO SECTORS, TWO METHODOLOGIES



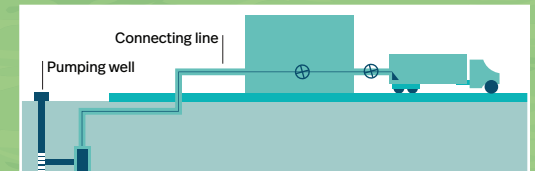
EAST SECTOR:

Construction of a retaining wall of 127 pumping wells along the shoreline between the Clément Bridge and the Victoria Bridge.

Length: 920 m

Well depth: About 12 m

Methodology: Contain and capture contaminated hydrocarbons. On site, the 127 pumping wells upstream from the retaining wall intercept the hydrocarbon layer that migrates toward the river. The contaminants are pumped away through two stations at each end of the site and then disposed of safely off-site.



WEST SECTOR:

Creation of a hydraulic barrier of 32 pumping wells installed along the shoreline.

Length: 1,200 m

Well depth: About 15 m

Methodology: Contain and treat groundwater. The well system captures contaminated groundwater and directs it to a building for treatment before it is discharged cleaned into the river. Every 10 days, the system cleans the equivalent of an Olympic-sized swimming pool of contaminated water, which it will continue to do for the next 15 years.

