

# Innovation *in motion*

Transportation







# Connecting Communities

*Thoughtful, well-built transportation networks drive development and prosperity*

Today, communities of all sizes face growing demands from residents and businesses for efficient and reliable transport infrastructure. Being able to move from one location to another, safely, seamlessly and efficiently is one of the most important factors impacting the quality of life we share. Taking children to school, commuting to work, shopping for food, enjoying leisure travel, delivering local goods or hauling freight are the daily journeys our transportation networks must enable people to successfully navigate and governments to prudently manage.

At the same time, changing demographics, budget pressures and increased recognition and support for alternative transportation methods mean transportation infrastructure investments need to work harder (and smarter) than ever before.

At WSP™, we have the planning, design and operational expertise to meet these challenges and more. We are on the forefront of transportation research and exploration, bringing the brightest ideas and simple, pragmatic solutions to every transportation project – regardless of size or scope.

We understand the unique contours of the Canadian landscape and the people and communities who live, work, play and move through them. Our commitment is delivering transport solutions that simplify lives, while strengthening the connections between neighbourhoods, communities, towns, cities, provinces and people.



# Our project experience

## A-30 HIGHWAY

01

## EDMONTON INTERNATIONAL AIRPORT EXPANSION

02

## WATERLOO ION LIGHTRAIL TRANSIT

03

## KICKING HORSE CANYON HIGHWAY PARK BRIDGE, TRANS-CANADA HIGHWAY

## CANADA LINE

05

## EGLINTON CROSSTOWN LRT

Montreal QC  
Client: Nouvelle Autoroute 30 S.E.N.C., (Acciona and Iridium)  
Project value: \$1.5 billion

Edmonton AB  
Client: Edmonton Airports Authority  
Project value: \$800 million

Kitchener/Waterloo ON  
Client: Region of Waterloo  
Project value: \$818 million (ongoing)

East of Golden BC  
Client: B.C. Ministry of Transportation and Infrastructure  
Project value: \$770 million (estimated total project cost)

Vancouver BC  
Client: SNC-Lavalin  
Project value: \$1.7 billion

Toronto ON  
Client: Toronto Transit Commission  
Project value: \$5.8 billion (ongoing)

This public and private partnership project between WSP and the province of Quebec manages traffic between the junction of existing Highway 30 and Highway 138 in Chateauguay on Montreal's South Shore, and the junction of Highways 20 and 540 in Vaudreuil-Dorion, west of the Island of Montréal. The project included a tunnel under the Soulanges Canal and two major bridges, the first over the St. Lawrence River, and the second over the St. Lawrence Seaway (requiring full shipping clearance of 38.5 metres) and over the Beauharnois Canal.

**Multiple award winner**, including the Transportation of Québec Awards for Excellence in Transportation: Infrastructure and Distinction

International Airport and was responsible for the program management and related infrastructure development of this \$800-million airport expansion. Serving over six million passengers a year, the development comprises a 25,000-square-metre air terminal expansion, a 15,000-square-metre air terminal renovation, a 12,000-square-metre office tower development, a 200,000-square-metre apron, and numerous additional aviation-related developments.

**Multiple award winner**, including the Consulting Engineers of Alberta Showcase Award: Award of Excellence, Building Engineering

One of Ontario's first light-rail transit (LRT) systems in decades, the Waterloo Region rapid transit system, ION, is designed to connect the three urban centres: Cambridge, Kitchener and Waterloo. Phase 1 involves the construction of a 19-kilometre LRT system between the cities of Waterloo and Kitchener. It also includes the construction of a bus rapid transit line between the LRT's southern terminal and the City of Cambridge.

**Winner of the North American PPP's Deal of the Year**

This award-winning project involves revitalizing 26 kilometres of this critical portion of the Trans-Canada Highway from a narrow winding two-lane highway to a modern, safe and efficient 100 kilometres per hour four-lane standard. Challenges include steep rock faces and the protection of the existing Canada Pacific Railway's main line, as well as the Kicking Horse River.

**Multiple award winner**, including Premier's Award for Innovation and Excellence: Innovation

WSP facilitated the delivery of Canada's first PPP transit system, providing engineering and architecture services for numerous stations. Infrastructure Journal's "Infrastructure 100" publication named it as one of the 100 most innovative and socially significant infrastructure projects in the world. The automated transit line stretches 19 kilometres from the Vancouver International Airport to the downtown core with an estimated ridership of 100,000 passengers per day. This high-profile project is an integral part of Vancouver's transportation infrastructure and was a key component of the city's Olympic bid commitment.

**Multiple award winner**, including the Canadian Consulting Engineer's Schreyer Award

The Eglinton Crosstown is a 19-km rapid transit line that will run through the heart of Toronto. Running along Eglinton Avenue, the transit line will connect west to east from Weston Road to Kennedy Station. A 11-km section of the Crosstown line will be tunnelled underground between Keele Street and Brencliffe Drive and will then continue east on an at-grade median right-of-way separated from traffic to Kennedy Station. There are 15 underground stations and 10 at-grade stops, three of the underground stations provide transfer points to the existing subway system and adjacent bus terminals.

# Global expertise in transportation

**30,000+**

bridge inspections completed in the USA including the iconic Brooklyn Bridge

**70+**

countries where WSP delivers projects

**4,500+**

Transportation professionals worldwide

01 / York Region Transit, Markham, ON  
 02 / Port of Miami Tunnel Project, Miami, FL  
 03 / Pitt River Bridge, Vancouver, BC



Governments everywhere are investing in vital transportation infrastructure to provide a robust platform for future economic growth. That's where WSP comes in. Our global footprint combines several centres of excellence that enable us to deliver the most challenging projects, in Canada and across five continents.

For example, one of the leading international long span bridge design teams is resident in our Helsinki office. Cutting-edge expertise in Congestion Charging is available from our Stockholm team. We've built the world's highest arch bridge through India's mountainous Himalayan terrain – a steel structure measuring 1,350 metres in total and 467 metres at its longest arch span. WSP is also a trusted partner of the UK Highways Agency, delivering cost-effective improvements like smart roads and freeways across England's strategic road network.

WSP's experts provide specialized skill sets for projects globally, enabling the assembly of highly focused teams, ready to apply their talents to your specific transportation infrastructure challenge. We are proud to move people forward.

## Our Practice Areas

- Roads and highways
- Bridge and civil engineering structures
- Transit and rail
- Urban mobility
- Aviation
- P3 and program management
- Construction administration and inspection
- Transportation planning
- Strategic advisory
- Intelligent transportation systems
- Port facilities

## Our Services

- Project management and program services
- Planning and feasibility
- Preliminary design
- Detailed design, plans and specifications
- Environmental services
- Surveying
- Geotechnical Services
- 3D design and renderings
- Traffic simulation and modelling
- International border crossings

**Lester B. Pearson  
International Airport**  
*Toronto*



**Champlain Bridge (NBSL)**  
*Montreal*





WSP is one of the world's leading professional services consulting firms. We are dedicated to our local communities and propelled by international brainpower. We are technical experts and strategic advisors including engineers, technicians, scientists, project managers, planners, surveyors and environmental specialists, as well as other design and program management professionals. We design and deliver lasting solutions in the Buildings, Transportation, Infrastructure, Oil & Gas, Environment, Geomatics, Mining, Power and Industrial sectors as well as project delivery and strategic consulting services. With over 7,500 talented people across Canada and 36,000 globally, we engineer projects that will help societies grow for generations to come.

[wsp.com](http://wsp.com)

