Memorandum to the Council of

Corporation of the Municipality of Temagami

Subject: Highway 11 Pilot Project for a 2+1 Roadway Model Public Information Centre

Memo No: 2025-M-005

Date: January 9, 2025

Attachment: Highway 11 Pilot Project for a 2+1 Roadway Model – PIC Presentation

Prepared By: Laala Jahanshahloo - CAO/ Treasurer

Recommendation

BE IT RESOLVED THAT Council receives Memo 2025-M-005 as presented.

Contents

Executive Summary

The Ministry of Transportation (MTO), in collaboration with AECOM Canada Ltd, is advancing the Highway 11 Pilot Project for a 2+1 roadway model to enhance safety and traffic efficiency between North Bay and Temagami. The project involves reconfiguring key highway sections, addressing operational issues, and implementing critical infrastructure improvements.

A Public Information Centre (PIC) was held on November 21, 2024, to present the project and gather feedback. However, the Municipality of Temagami received the invitation after the consultation period closed. Despite this setback, the project offers opportunities for input during the upcoming Transportation Environmental Study Report (TESR) public review period. The municipality will actively monitor these developments to ensure local interests are represented.

Background

The Highway 11 Pilot Project is part of the Ministry of Transportation's initiative to modernize key transportation corridors in Ontario. This project focuses on implementing a 2+1 roadway model, which introduces alternating passing lanes to improve traffic flow and safety.

AECOM Canada Ltd is leading the Design Studies and Class Environmental Assessments (EAs) for two sections of Highway 11:

- GWP 5033-22-00: From 4.6 km north of Highway 64 to 340 m south of Jumping Caribou Road (approximately 11.4 km).
- GWP 5151-21-00: From Sand Dam Road to Ellsmere Road (approximately 13.8 km).

Project Overview

The project aims to reconfigure and enhance two key sections of Highway 11, with the 2+1 roadway model as its primary feature. This configuration alternates passing lanes every 2-5 km to improve safety and traffic efficiency. Key Objectives of this project are as follows:

- Improve traffic safety with median barriers and fully paved shoulders.
- Address structural issues such as frost heaves and pavement distress.
- Modernize drainage and other supporting infrastructure.

Further details about the project scope and its objectives were presented during the Public Information Centre (PIC) on November 21, 2024, as outlined in Appendix A.

Public Consultation and Correspondence

A Public Information Centre (PIC) was held on November 21, 2024, at the Tilden Lake Community Centre to provide stakeholders with an opportunity to review project details and offer feedback. The comment period for the PIC concluded on November 28, 2024.

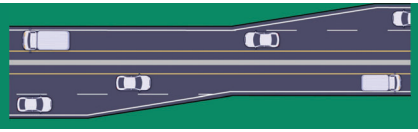
Although AECOM Canada Ltd issued a letter on November 13, 2024, inviting municipal representatives to participate, the Municipality of Temagami received this correspondence on December 30, 2024, after the consultation period had closed. This delay restricted the municipality's ability to contribute input during the designated timeframe, potentially impacting the incorporation of local perspectives in the project planning process.

Next Steps

The MTO and AECOM will prepare a Transportation Environmental Study Report (TESR), which will be made available for a 30-day public review. This phase will provide additional opportunities for public and municipal input. Staff will actively monitor the project and ensure timely participation in upcoming review phases.

Conclusion

The Highway 11 Pilot Project represents a critical initiative to enhance safety and improve traffic conditions on a vital transportation corridor. While the Municipality of Temagami was unable to participate during the designated consultation period due to delayed correspondence, the upcoming public review phase of the Transportation Environmental Study Report (TESR) offers a renewed opportunity to provide input. Active monitoring and engagement during this stage will ensure the municipality's concerns are represented effectively moving forward.



Welcome

Please complete the sign-in sheet

www.highway11pilot.ca

Highway 11 Pilot Project for a 2+1 Roadway Model

Design Studies & Class Environmental Assessments
GWPs 5151-21-00 & 5033-22-00

Public Information Centre (PIC)
November 21, 2024
4:30 PM—8:30PM

Project Contacts:

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Ontario AECOM

Project Overview

What?

Reconstruct / reconfigure and widen two sections of Highway 11, between the City of North Bay and the Municipality of Temagami, to introduce a 2+1 Roadway Model.

A 2+1 Roadway Model is a continuous three-lane highway that provides an alternating passing lane with a median barrier. The roadway shifts the passing lane configuration every 2-5 km to provide passing opportunities in both directions.

Why?

To address the unique transportation needs of the north, by enhancing traffic flow and improving safety for the travelling public.

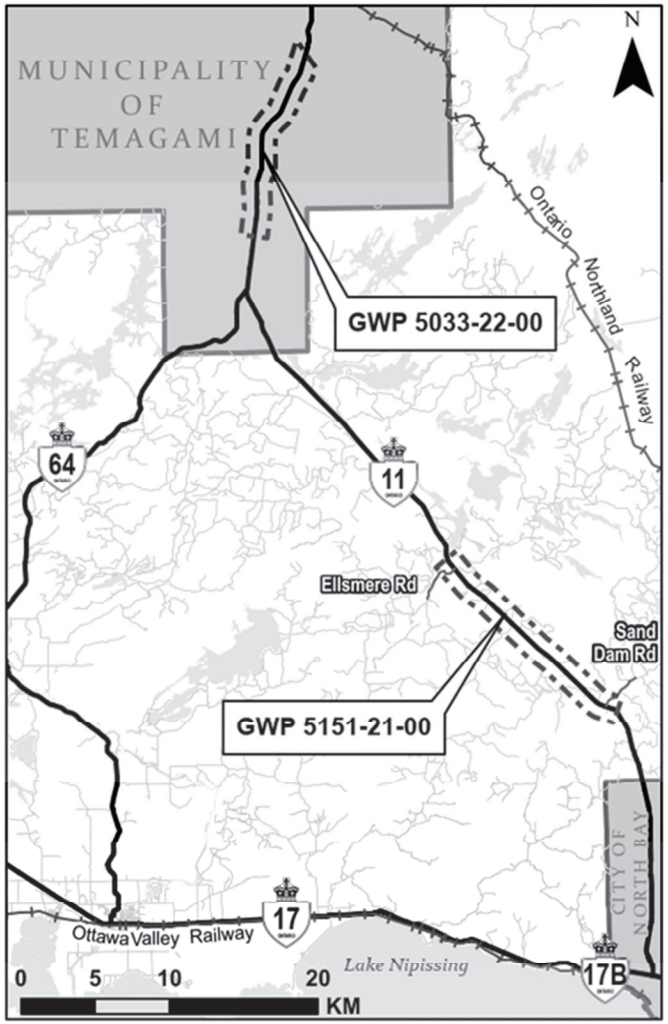
Who?

The Ministry of Transportation (MTO) has retained AECOM Canada Ltd. (AECOM) to undertake the Design Studies and Class Environmental Assessments (EA).

How?

Following the approved planning process for 'Group B' projects under the *Class Environmental Assessment for Provincial Transportation Facilities* (Class EA) 2000.

Where?



Project Location

GWP 5033-22-00 (North): Highway 11 from 4.6 km north of Highway 64 northerly 11.4 km to 340 m south of Jumping Caribou Road

GWP 5151-21-00 (South): Highway 11 from Sand Dam Road northerly 13.8 km to Ellsmere Road

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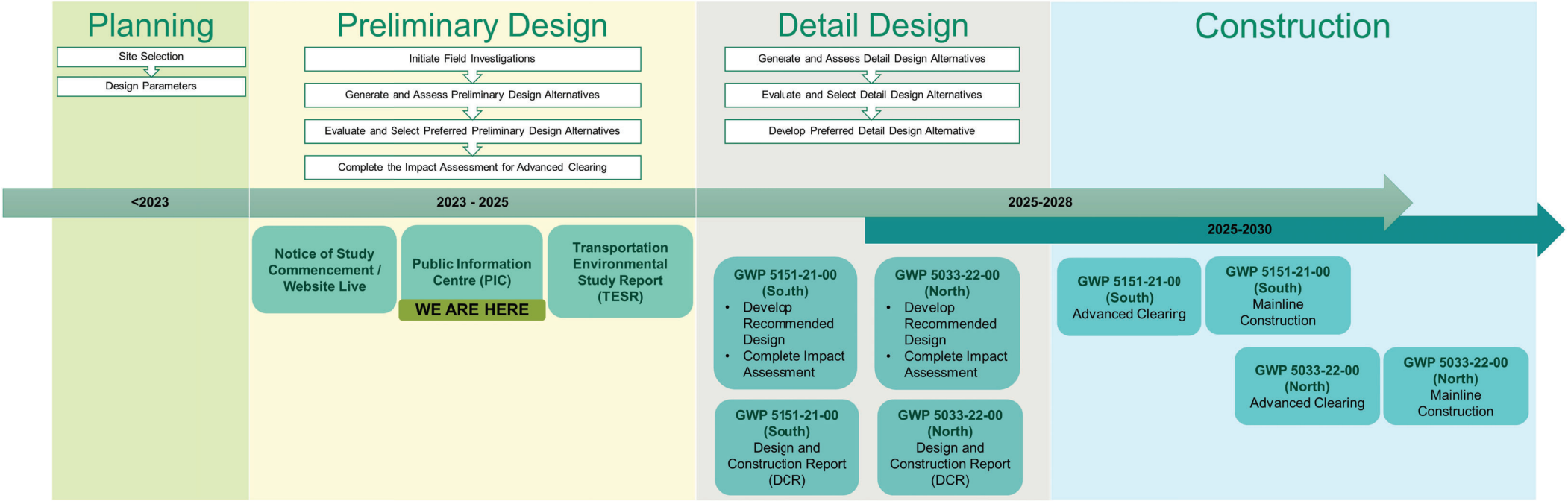
Study Process

The Projects will follow the approved planning process for 'Group B' projects under the Class EA



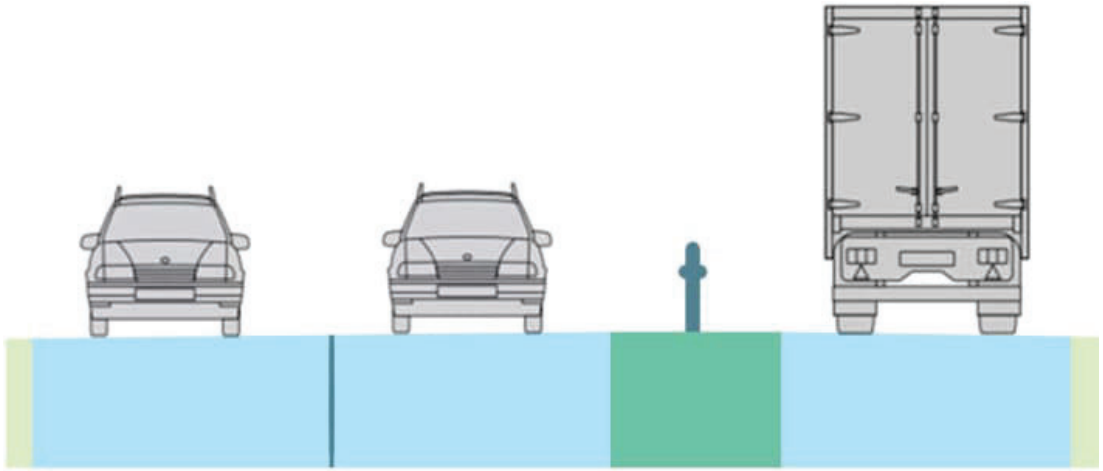
**Study and Construction Schedule may be subject to funding and environmental approvals

The TESR and DCRs will each be prepared and made available for a 30-day public and agency review period at Study completion

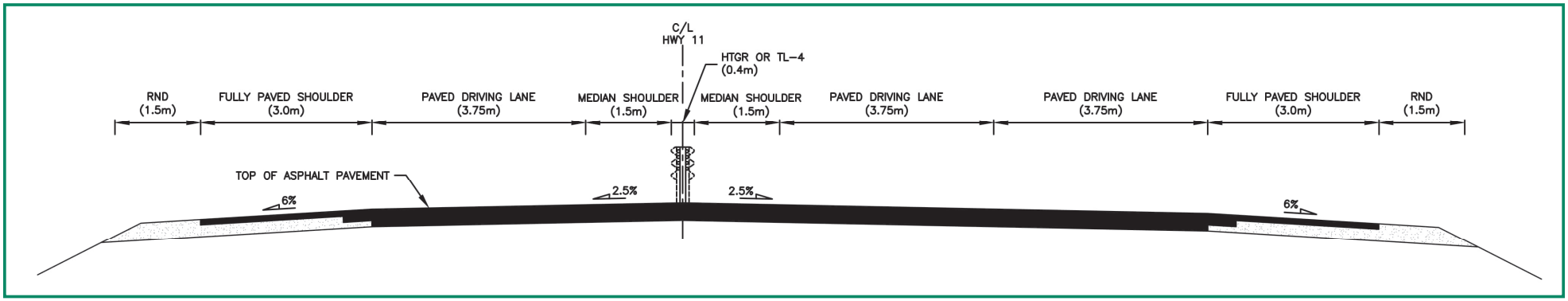
Notification advising of the times and locations of the availability of the TESR and DCRs for comment will be published in local newspapers, the Project Website and provided to those on the Project Contact List

Proposed Scope

- **Common Elements**
  - Reconfiguration to a '2+1' facility
  - Pavement rehabilitation
  - New fully paved shoulders
  - Treatment of pavement distress areas
  - Drainage improvements
  - Guide rail improvements
- **GWP 5151-21-00 (South)**
  - Replacement of the Little Sturgeon River Culvert
- **GWP 5033-22-00 (North)**
  - Realignment of Highway 11 near Pan Lake



2+1 Highway Graphic: 2 Lanes + 1 Lane

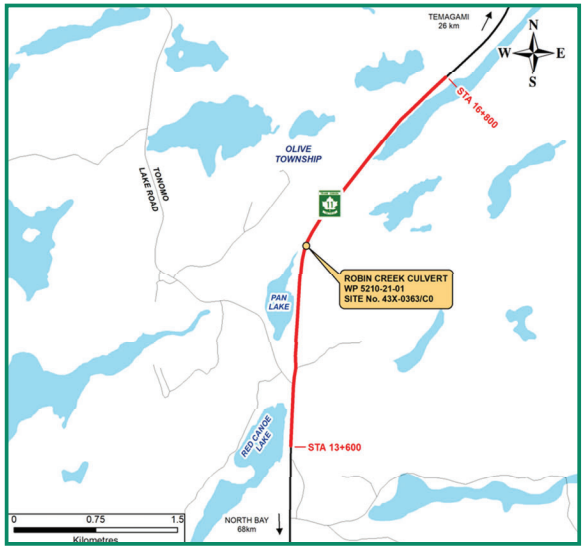


GWP 5151-21-00 (South) & GWP 5033-22-00 (North): Proposed 2+1 Typical Cross Section

Evaluation Criteria for Alternatives

Each design alternative listed below will be evaluated based on the criteria described in the table:

- Highway 11 Realignment near Pan Lake
- Passing Lane Configuration
- Turnaround Configuration
- Widening Arrangement
- Median Barrier Type



GWP 5033-22-00: Highway 11 Realignment near Pan Lake

Key Evaluation Criteria		Evaluated Design Alternatives				
		Highway 11 Realignment near Pan Lake	Passing Lane Configuration	Turnaround Configuration	Widening Arrangement	Median Barrier Type
Geometrics	• Alignment • Grade • Sight distance	✓		✓		
Constructability	• Complexity • Duration	✓	✓	✓	✓	✓
Traffic Operations and Safety Management	• Traffic staging during construction • Driver expectation • Access • Emergency management	✓	✓	✓	✓	✓
Construction Cost		✓	✓	✓	✓	✓
Environmental Impacts	• Archaeology • Fish and fish habitat • Terrestrial habitat • Waste & Contamination • Indigenous Rights	✓	✓	✓	✓	
Long-Term Performance	• Pavement and differential performance	✓		✓		
Property and Utilities		✓	✓	✓	✓	

Realignment Alternatives

GWP 5033-22-00 (North)

Highway 11 from 400 m south of Tonomo Lake Road northerly for 2.6 km

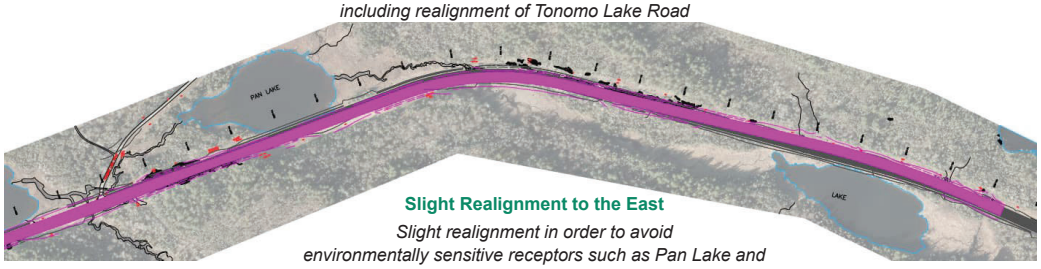
Study Objectives and Considerations: Improve the existing geometric, operational, and safety concerns in the vicinity of the Tonomo Lake Road intersection, Pan Lake, and Robin Creek Culvert, while minimizing impacts to the existing environment

1

Base Case '2+1' Arrangement

Widening of the existing platform symmetrically while maintaining the existing horizontal and vertical alignments, including realignment of Tonomo Lake Road

2



Slight Realignment to the East

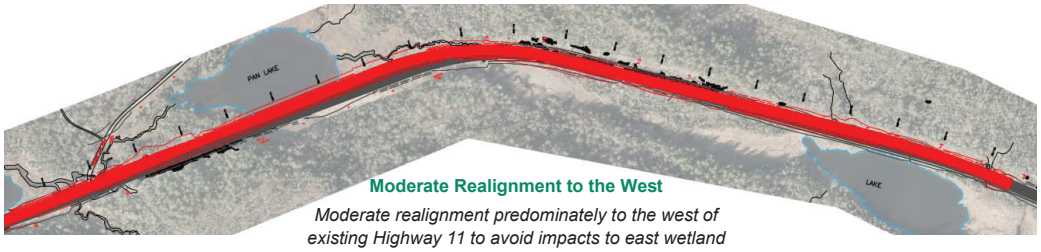
Slight realignment in order to avoid environmentally sensitive receptors such as Pan Lake and the unnamed lake north of Robin Creek

3

Moderate Realignment to the East

New independent alignment to mitigate concerns with performance issues with widening an existing embankment, while avoiding impacts to Pan Lake

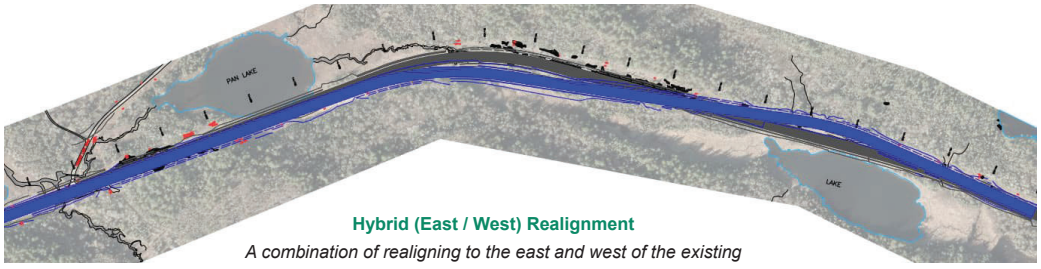
4



Moderate Realignment to the West

Moderate realignment predominately to the west of existing Highway 11 to avoid impacts to east wetland

5



Hybrid (East / West) Realignment

A combination of realigning to the east and west of the existing Highway 11 to avoid impacts to waterbodies

6

Major Realignment to the West

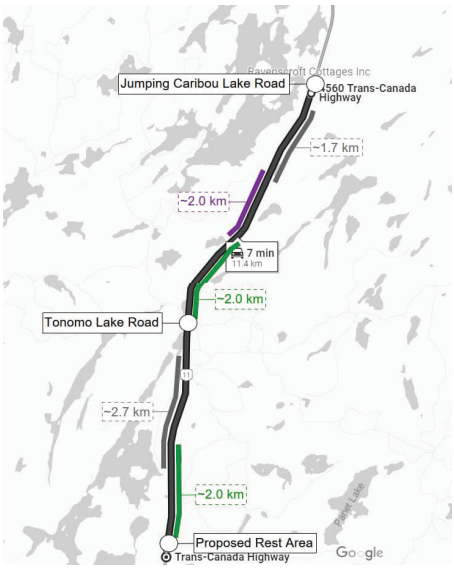
Modify Highway 11 alignment by reducing the number of curves and avoiding east wetland and unnamed lake

Passing Lane Configuration Alternatives

GWP 5033-22-00 (North)

Study Objectives and Considerations: Determine the optimal passing lane configuration to improve operational performance and the safety of the traveling public, while considering impacts to property, existing infrastructure, and the environment

1



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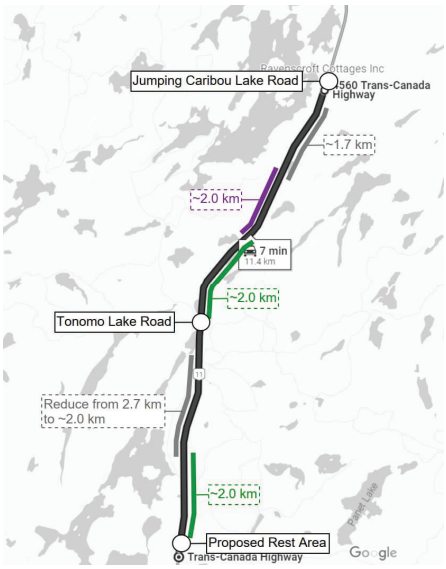

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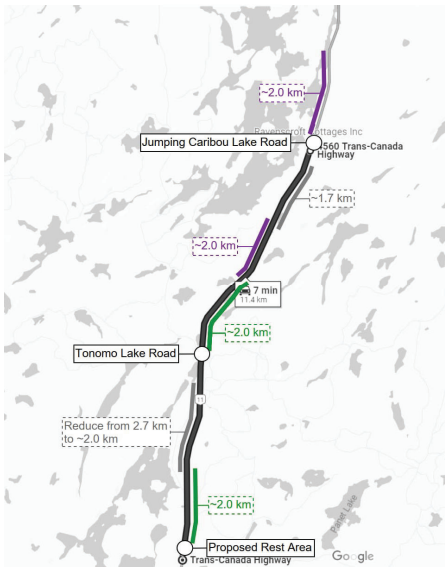

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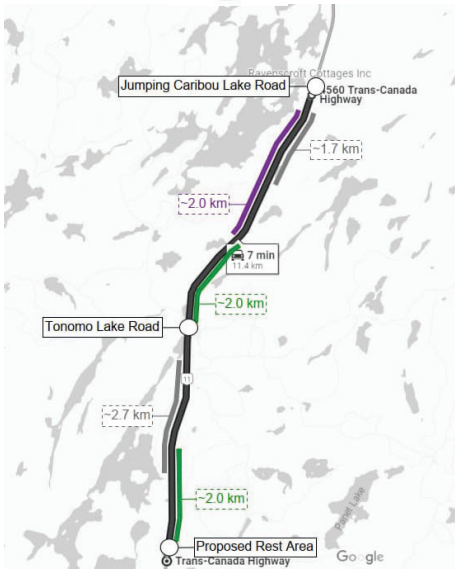

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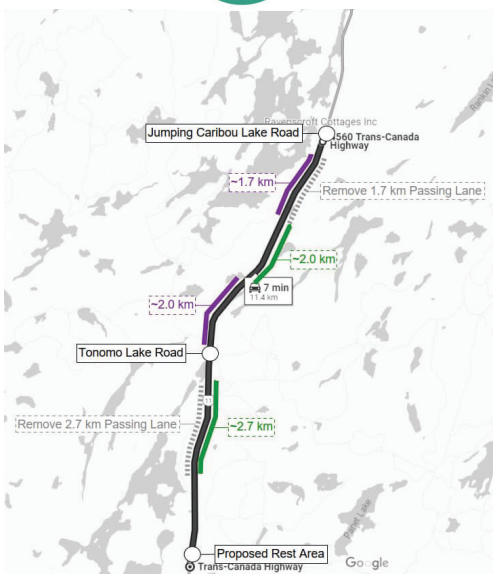


LEGEND
- EXISTING PASSING LANE (RETAINED)
- PROPOSED SOUTHBOUND PASSING LANE
- PROPOSED NORTHBOUND PASSING LANE
- EXISTING PASSING LANE (REMOVED)

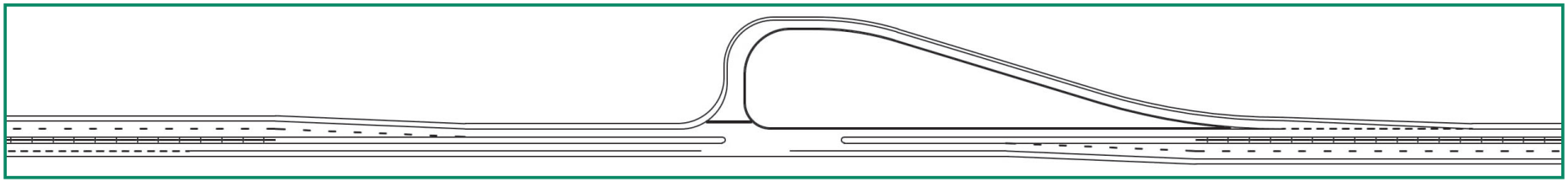
For GWP 5151-21-00 (South), only one passing lane layout was available and no further analyses were made; see the proposed layout on the Recommended Design Board

2025-M-005

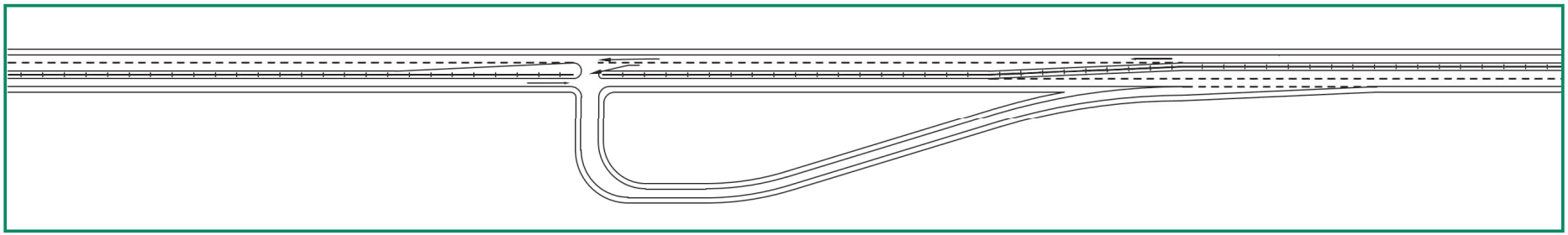
The Corporation of the Municipality of Temagami

Turnaround Configuration Alternatives — Both GWPs

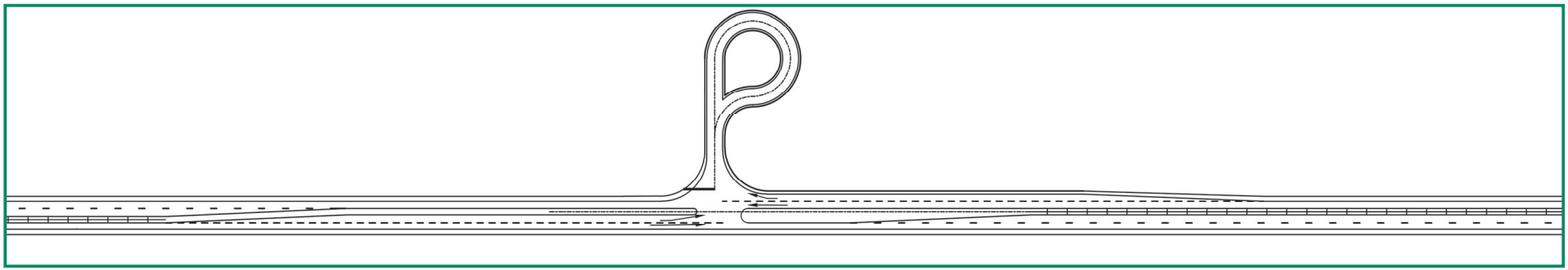
Study Objectives and Considerations: Enable travelers to access the opposite direction of the highway, while considering safety, footprint impacts, and emergency & incident management



Alternative 1: Deceleration Jug Handle



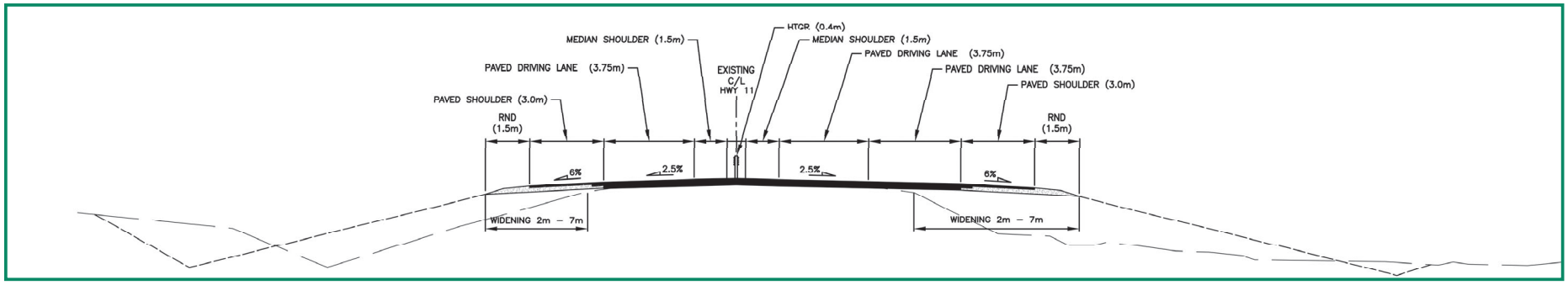
Alternative 2: Acceleration Jug Handle



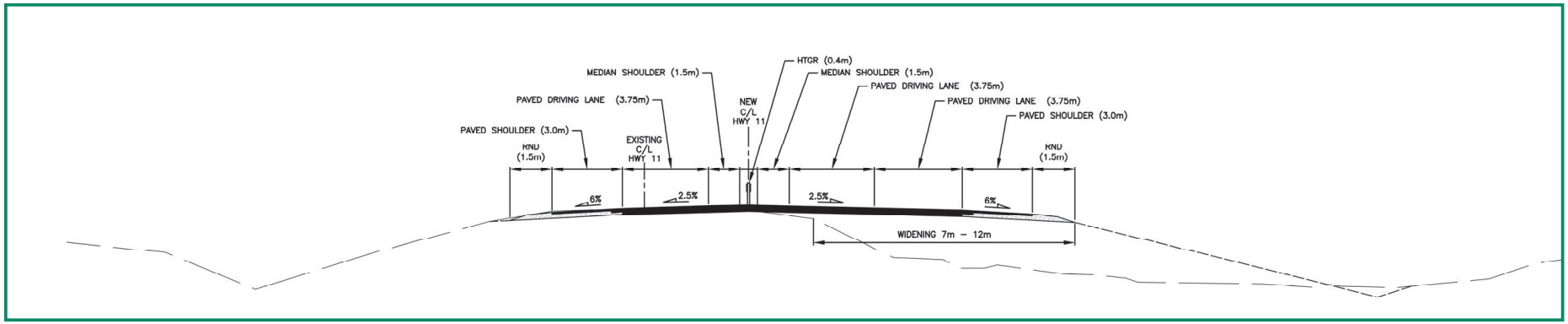
Alternative 3: Turning Bulb

Widening Arrangement

Study Objectives and Considerations: Comprehensive review and comparative analysis of widening alternatives in support of the 2+1 Roadway Model



Symmetrical Widening: Maintains the existing highway alignment at centreline and widens outwards on both sides to accommodate the 2+1 lane configuration



Asymmetrical Widening: Shifts the centreline more to one side to accommodate widening for the 2+1 lane configuration

Median Barrier Alternatives and Transition Zones

Example of High Tension 3-Cable Guide Rail with Start and End Condition
Proposed for southern GWP 5151-21-00

Study Objectives and Considerations: Review of median barrier designs that eliminate crossover collisions, while further considering access, constructability, footprint impacts, and emergency & incident management. Of the 3 options ultimately considered, only 2 were advanced. A concrete barrier option was eliminated due to drainage design constraints.

The installation of a median barrier throughout each section of Highway 11 will:

- Safely divide the southbound and northbound directions of travel
- Eliminate crossover collisions
- Direct drivers to designated turnaround locations
- Provide right-in and right-out turning opportunities to entrances
- Signage and lane markings advising drivers of the transition into and out of the 2+1 highway section

Important: These images are for illustrative purposes only and may not reflect what the final design will be along Highway 11

Example of Steel Beam Guide Rail with Start and End Condition
Proposed for northern GWP 5033-22-00

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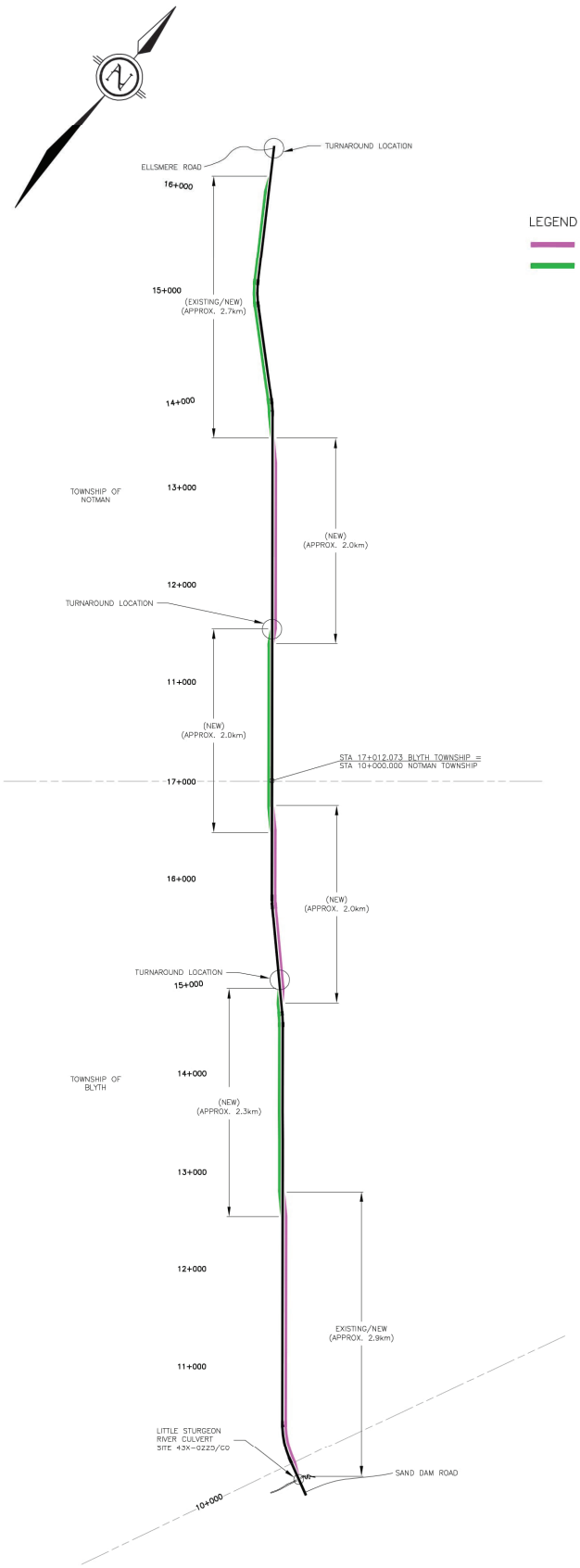
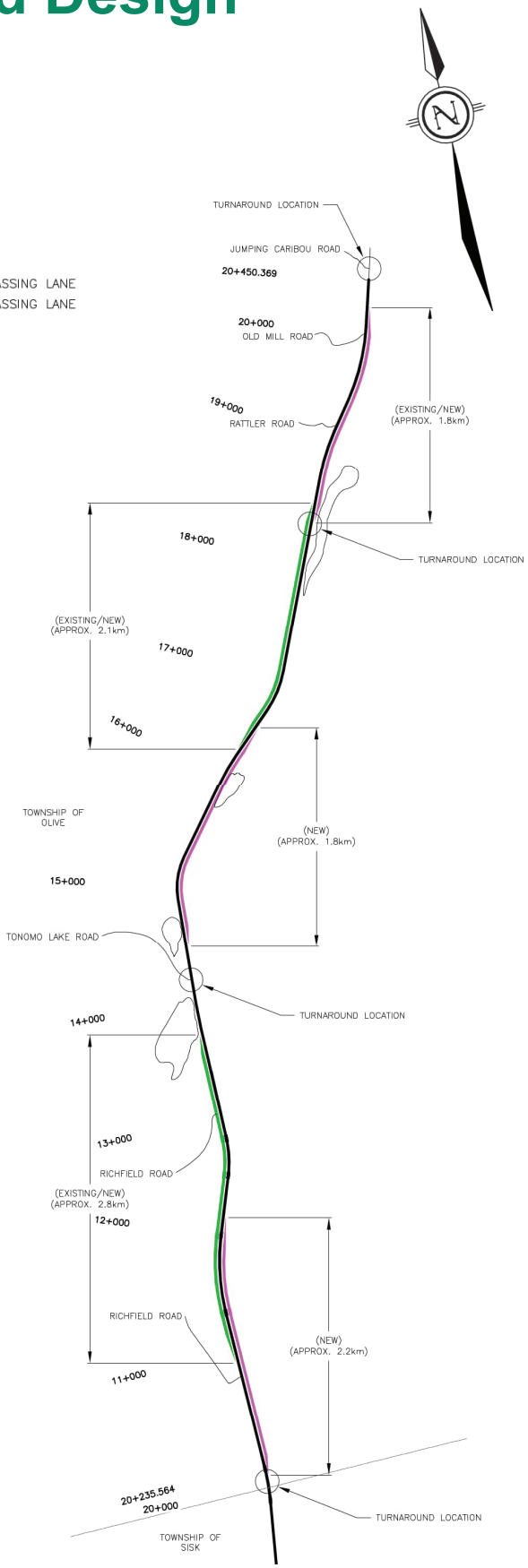
Recommended Design



GWP 5151-21-00 (South): Proposed passing lane configuration and turnaround locations



GWP 5033-22-00 (North): Proposed passing lane configuration and turnaround locations

Environmental Overview

Environmental impact studies to document environmental existing conditions and identify constraints are being undertaken to consider: Fish and Fish Habitat, Terrestrial Ecosystems, Archaeology, Excess Materials and Waste Management, Air Quality, Noise and, socio-economic elements including land use and the movement of people, goods and services

Preliminary Findings and Environment Constraints include:

- Fish and fish habitat for cold, cool and warmwater species. No Species at Risk (SAR) present
- Forest and wetland habitat for wildlife, including SAR and Migratory Bird
- Habitat managed for bears and sensitive aquatic feeding areas for moose
- Risk areas for wildlife collisions
- Localized areas of archaeological potential
- Localized risk areas for soil contamination
- Localized air and noise sensitive receptors (i.e., private residences, etc.)
- Highway 11 conveys commuter, tourist, recreation and long-haul traffic
- Crown Land dominates the Highway 11 corridor, interspersed with a few residential and commercial properties with direct access to Highway 11

Next Steps and Mitigation Strategies include:

- Complete targeted field investigations and sampling programs
- Complete all Impact Assessments on the preferred design to comply with environmental legislation
- Continued consultation and engagement with agencies, municipalities, Indigenous Communities, property owners, businesses, and key stakeholders
- Confirm environmental commitments and integrate mitigation strategies within the design (i.e., Best Management Practices and site-specific mitigations)
- Complete the design refinement and EA process to achieve environmental clearance
- Where required, acquire necessary environmental permits, licences, approvals, or authorizations, prior to construction

Next Steps

Following this PIC, we will:

- Collect feedback from the PIC until November 28, 2024
- Assess and evaluate the Preliminary Design Alternatives to select the Preferred Preliminary Design Alternatives and complete the Preliminary Environmental Assessment
- Prepare a Transportation Environmental Study Report (TESR) which will include the advanced clearing strategy, and made available for a 30-day public review with advanced notification
- Complete the Detail Design refinement and Environmental Assessment for the mainline construction
- Prepare Design and Construction Reports (DCR) for each GWP which will be made available for a 30-day public review with advanced notification

Thank You!

projectteam@highway11pilot.ca

www.highway11pilot.ca

Request to be added to the Project Contact List to receive future project updates

AECOM

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705 476 9722 fax

November 13, 2024

Dan O'Mara, Mayor
Municipality of Temagami
7 Lakeshore Drive, P.O. Box 220
Temagami, ON P0H 2H0

Regarding: Notice of Public Information Centre
Highway 11 Pilot Project – Design and Environmental Study of the 2+1 Roadway Model
Assignment 5021-E-0038

Dear Dan O'Mara:

The Ministry of Transportation (MTO) has retained AECOM Canada Ltd (AECOM) to undertake the Design and Class Environmental Assessment (EA) for a 2+1 Roadway Model Pilot Project on Highway 11 at two locations, between the City of North Bay and the Municipality of Temagami. The EA is following the approved planning process for Group 'B' projects under the Class Environmental Assessment for Provincial Transportation Facilities (Class EA) 2000.

The purpose of this letter is to notify you that a Public Information Centre (PIC) has been scheduled to present details on the proposed design and receive feedback on this Pilot Project. You are invited to attend in person, where members of the Project Team will be available to answer questions and receive your feedback. For those unable to attend in person, information will be accessible on the Project website (www.highway11pilot.ca), where comments related to the PIC will be accepted until November 28, 2024.

Please refer to the attached Notice of PIC for additional details.

RECEIVED
DEC 30 2024

Sincerely,

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Encl. Notice of Public Information Centre

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