



# WELCOME

## WAASIGAN TRANSMISSION LINE PROJECT

## COMMUNITY OPEN HOUSE

[HydroOne.com/Waasigan](http://HydroOne.com/Waasigan)

hydro  
one in partnership with:

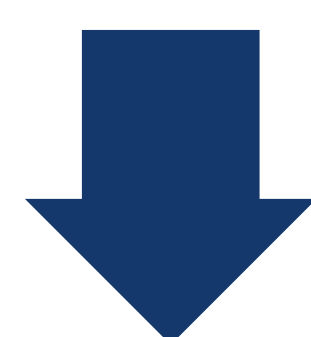


# HYDRO ONE'S ROLE IN THE SYSTEM

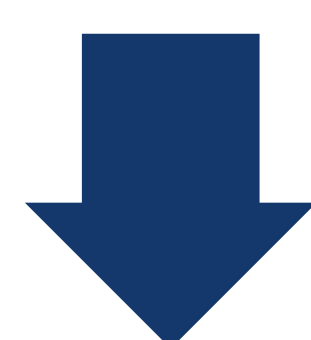
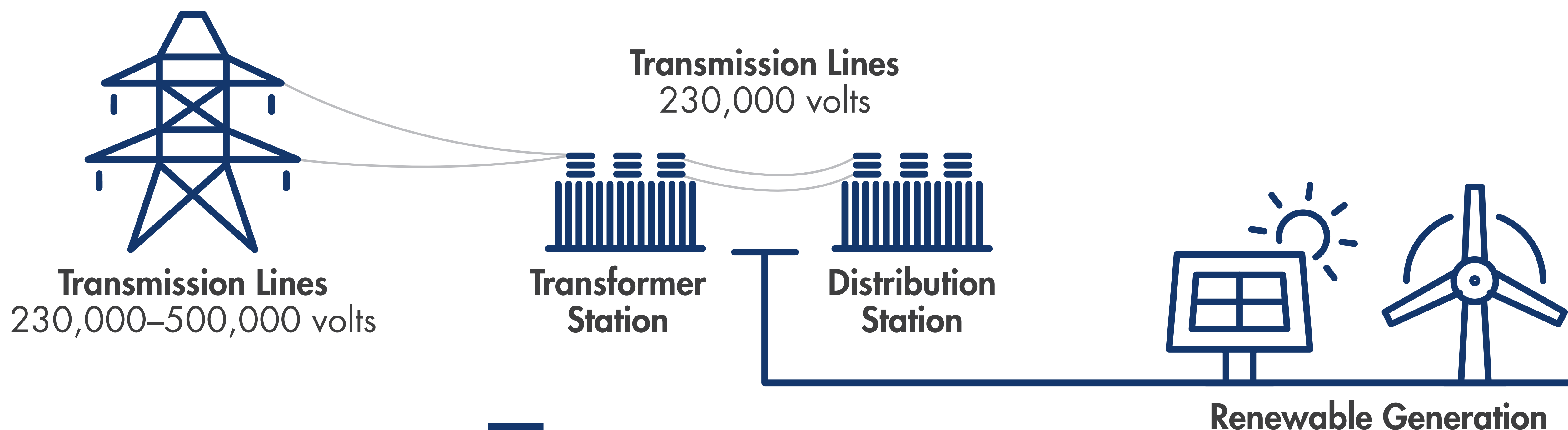
Across the province, Hydro One builds, owns, operates and maintains the electricity transmission and distribution facilities that bring power to homes and businesses.



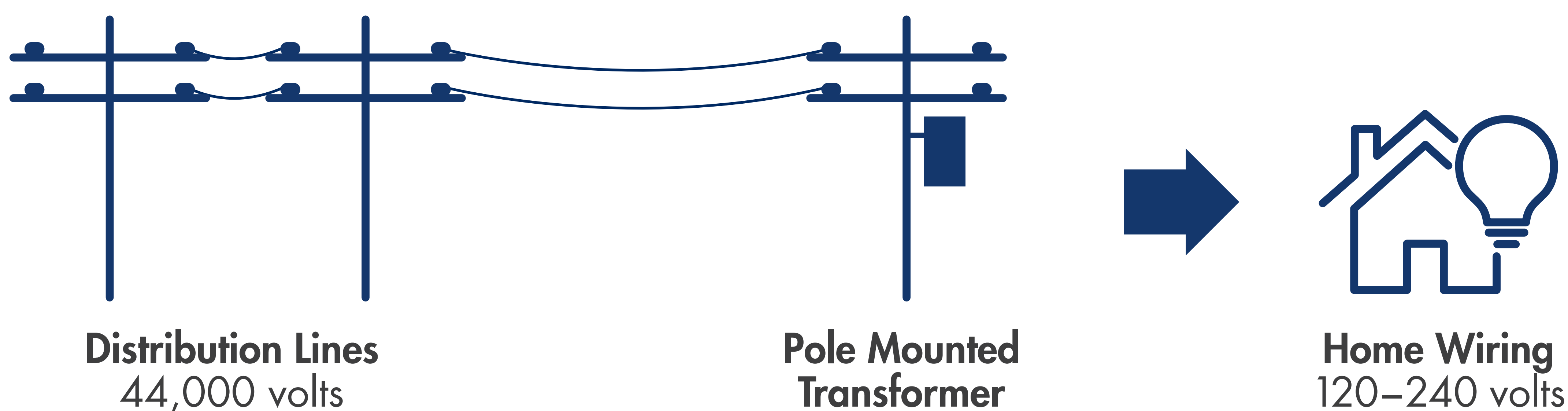
## ONTARIO POWER GENERATION AND PRIVATE GENERATION COMPANIES



## HYDRO ONE OR LICENSED TRANSMITTER



## HYDRO ONE OR LOCAL DISTRIBUTION COMPANY





# WHY IS A NEW LINE NEEDED?

In Ontario, the Independent Electricity System Operator (IESO) is responsible for ensuring future energy needs are met. Based on the IESO's demand forecast, more power is needed to support northwestern Ontario's growth.

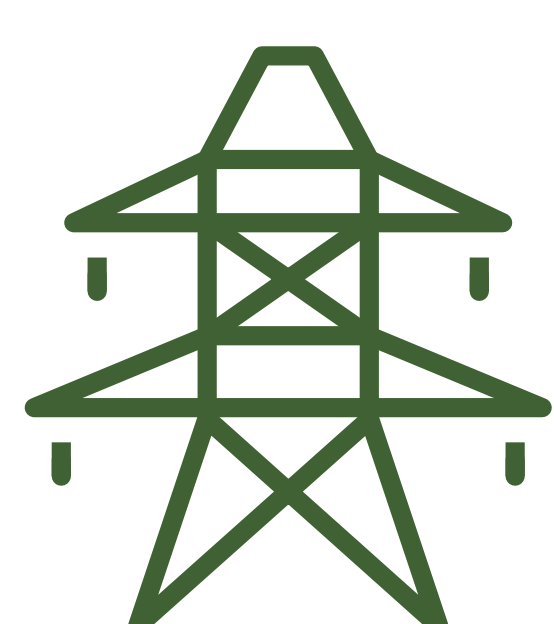
The Waasigan Transmission Line will support the region by:



Supporting economic growth in sectors like mining and forestry.



Improving reliability by reinforcing the back-bone of the grid.



Connecting more people and industry by adding enough energy to power a city twice the size of Thunder Bay.



Creating participation and partnership opportunities with Indigenous communities.



# EQUITY-SHARING PARTNERSHIP



Hydro One and nine First Nations have entered into a partnership that offers the First Nation partners an opportunity to make up to a 50% equity investment in the Waasigan transmission line.

This partnership is a progressive step to increase opportunities for First Nations as we build the electricity grid of the future.

The partnership is comprised of:



In partnership with:



[HydroOne.com/Waasigan](https://HydroOne.com/Waasigan)



# STEPS OF THE ENVIRONMENTAL ASSESSMENT

A comprehensive environmental assessment is designed to consider feedback, as well as potential environmental effects before decisions are made about proceeding with a project.

Issue a Notice of Commencement

Conduct desktop and field studies to determine baseline environmental conditions and field baseline information to describe the existing environment

Evaluate alternative routes to select a preferred route

Identify and assess potential environmental effects and mitigation measures

Develop a monitoring framework considerate of the entire project lifecycle

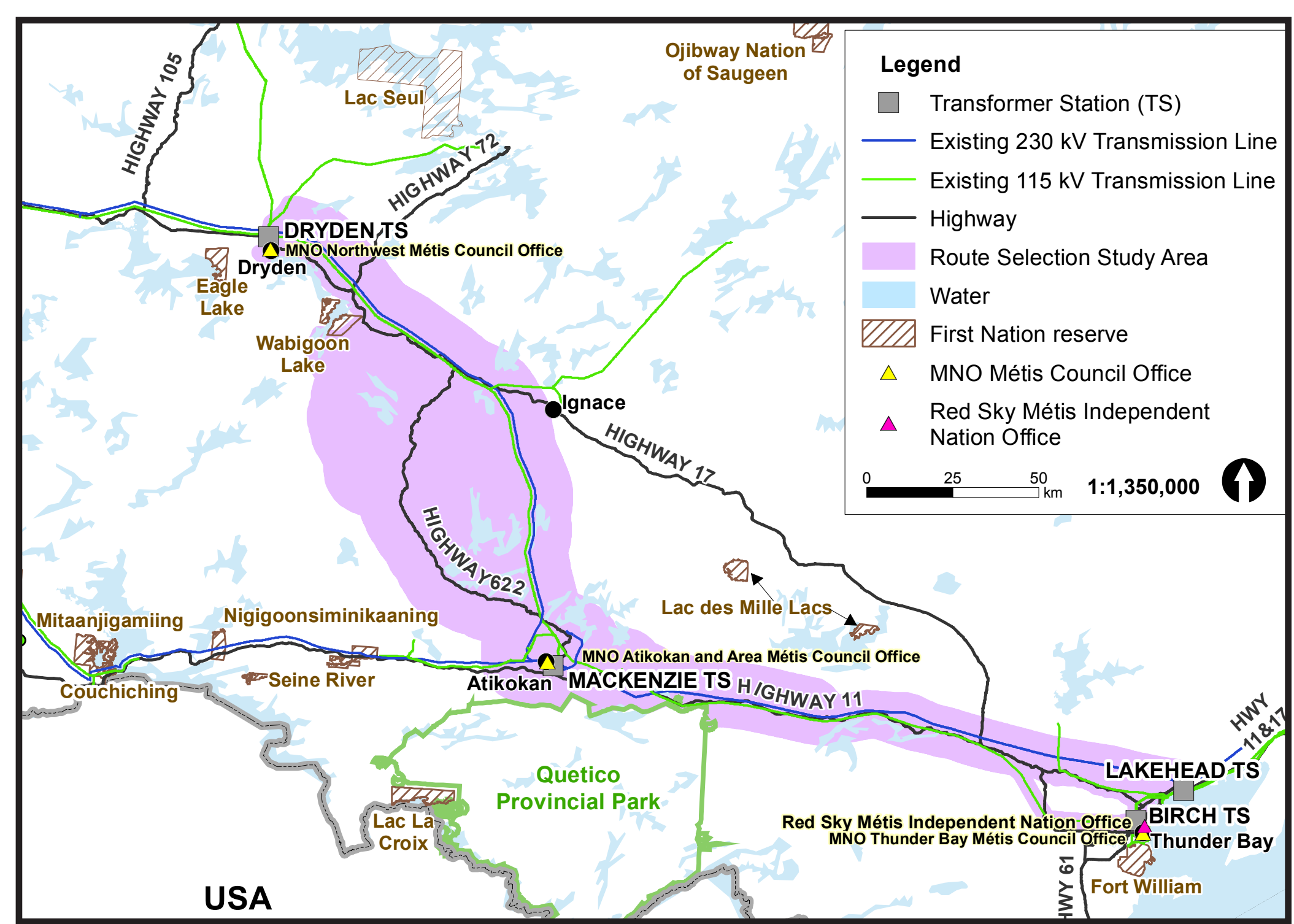
Public review of the draft environmental assessment report

Submit the final environmental assessment report to the Ministry of the Environment, Conservation and Parks for a decision

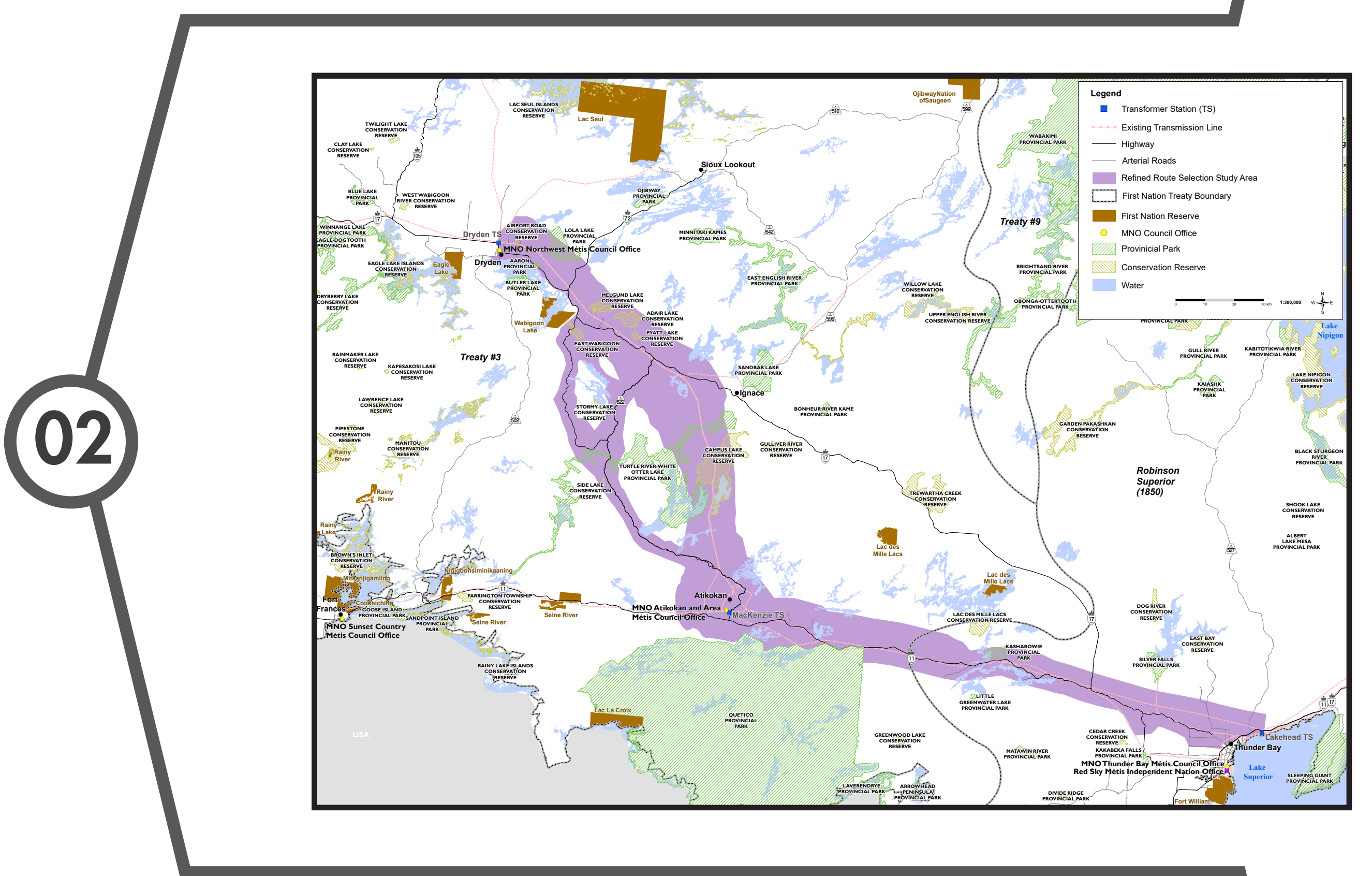


# HOW WERE THE ALTERNATIVE ROUTES SELECTED?

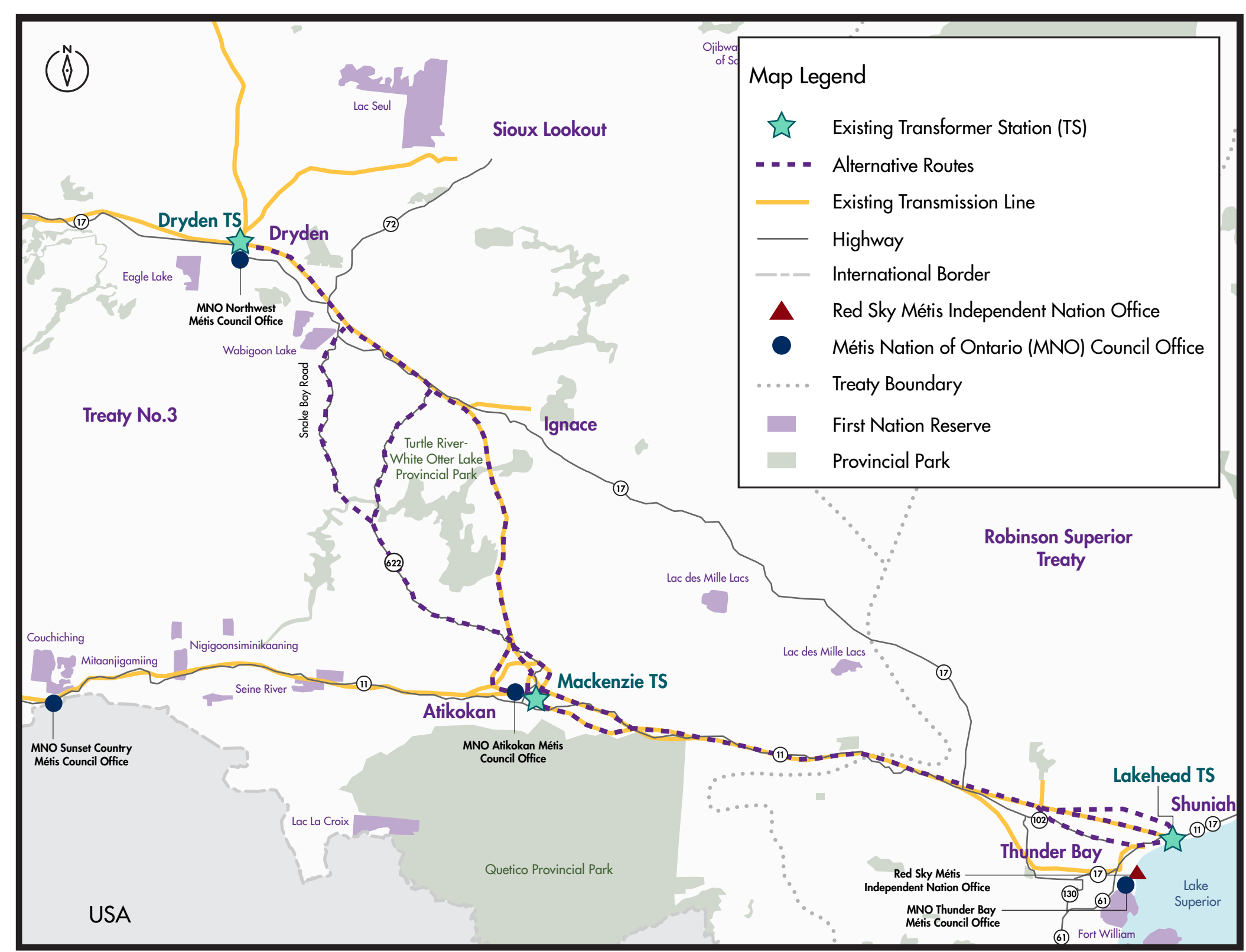
- 1. April 2019** – The Route Selection Study Area was established based on the IESO's required connection points and existing information about land, infrastructure and sensitive features.
- 2. Spring 2020** – The Route Selection Study Area was narrowed down to present areas more suitable for the transmission line based on collaborative workshops with government agencies, organizations and Indigenous communities and public input gathered.
- 3. Summer 2020** – Alternative routes were identified considering potential effects, feedback, and background data.
- 4. January 2023** – A preliminary preferred route was identified following an evaluation of alternative routes.



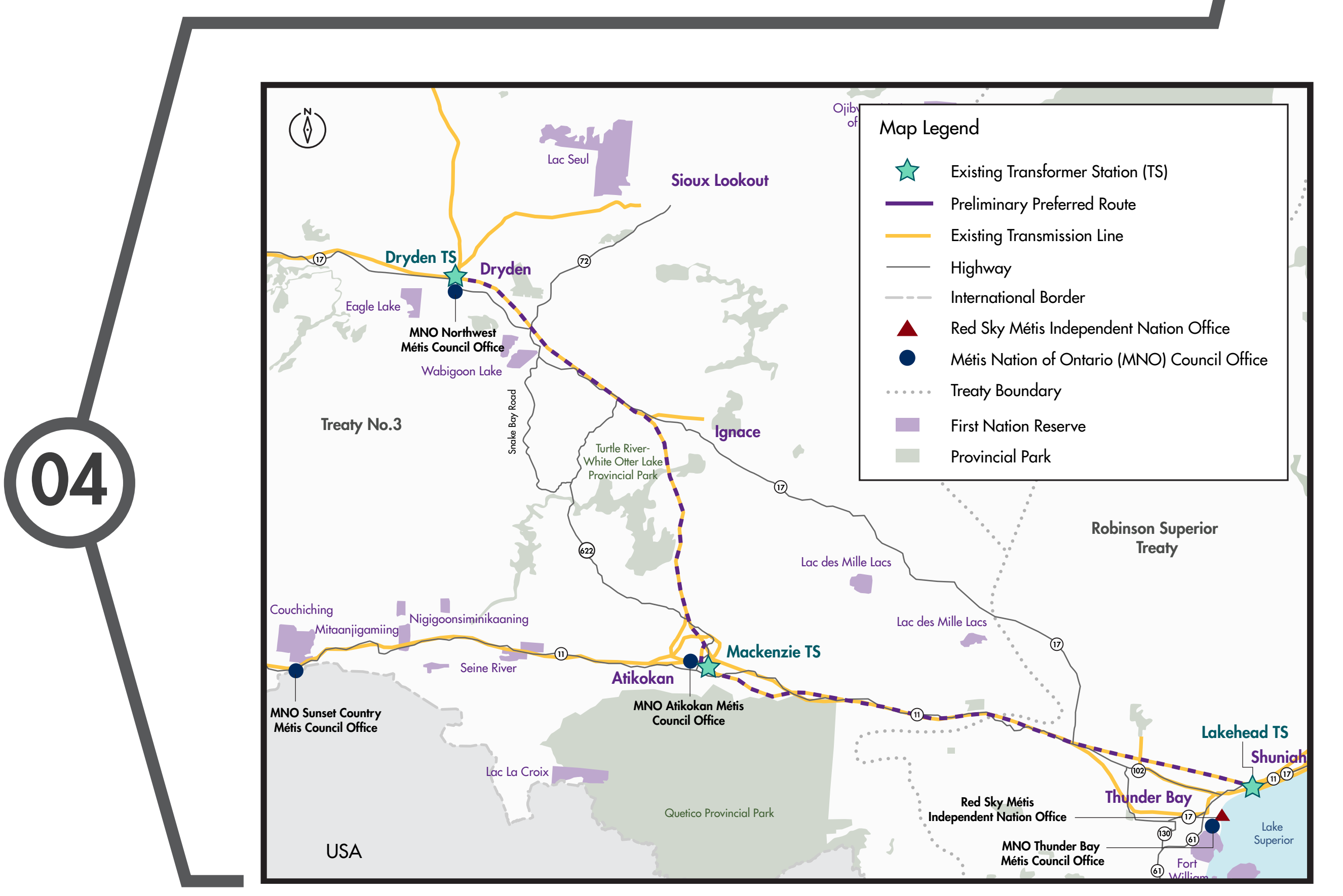
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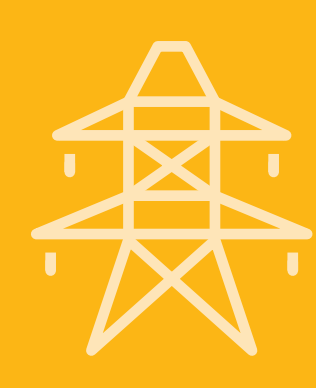
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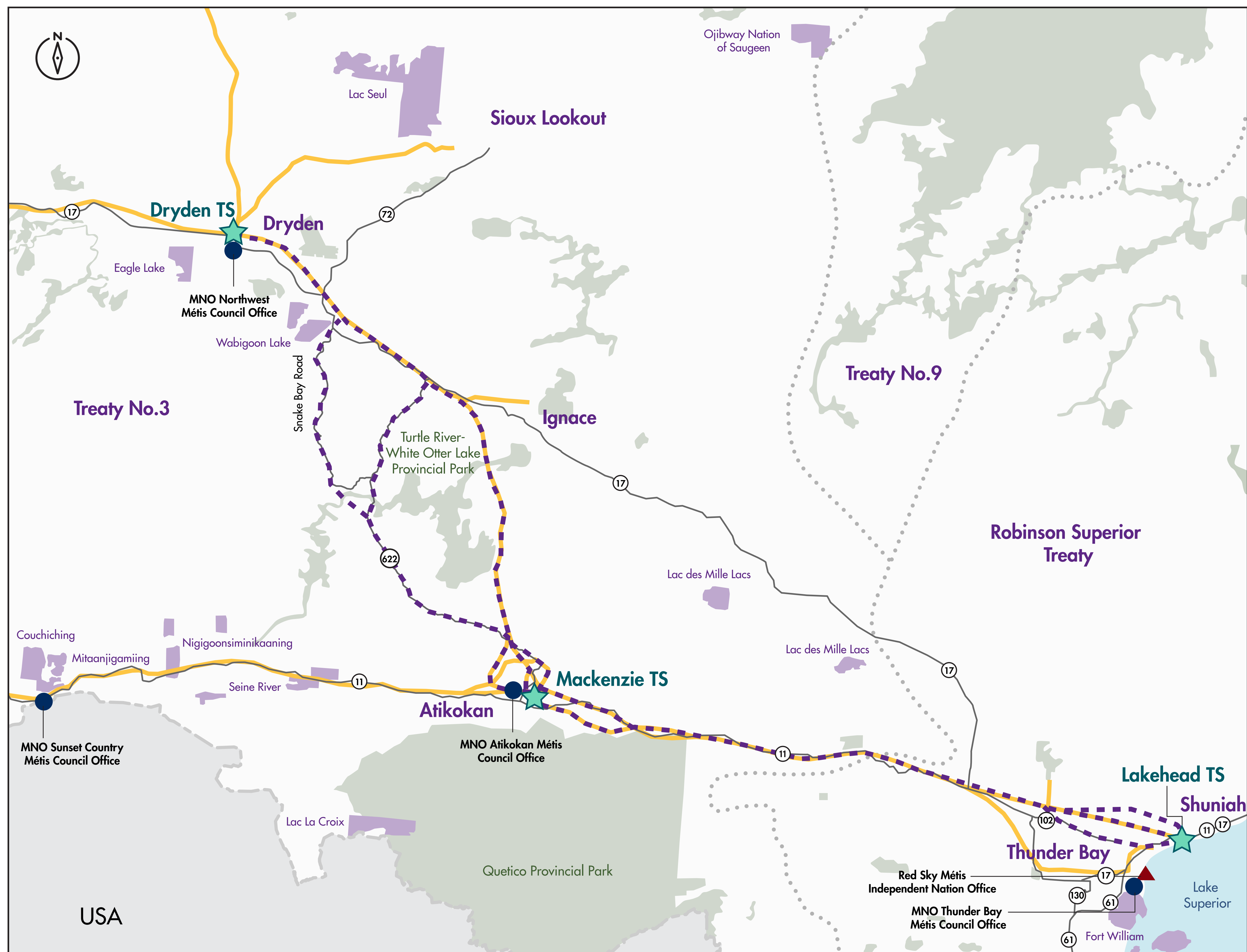


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# WHAT ROUTES WERE ASSESSED?

We sought feedback and completed studies to identify and assess viable route alternatives, as shown on the map.



## Map Legend

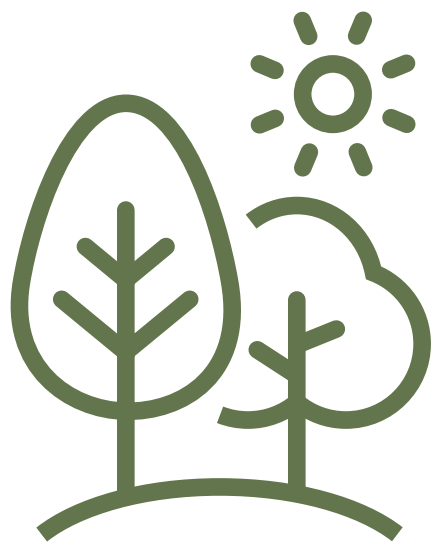
-  Existing Transformer Station (TS)
-  Alternative Routes
-  Existing Transmission Line
-  Highway
-  International Border
-  Red Sky Métis Independent Nation Office
-  Métis Nation of Ontario (MNO) Council Office
-  Treaty Boundary
-  First Nation Reserve
-  Provincial Park



# HOW WERE THE ALTERNATIVES EVALUATED?



The alternative routes were evaluated based on data from environmental field studies and feedback received to understand the advantages and disadvantages of each option based on four criteria categories:



## Natural Environment

- Physiography, geology, surficial geology and soils
- Provincial parks, conservation reserves and areas of natural and scientific interest
- Surface water
- Groundwater
- Vegetation and wetlands
- Species at risk & species of conservation concern
- Wildlife and wildlife habitat
- Fish and fish habitat



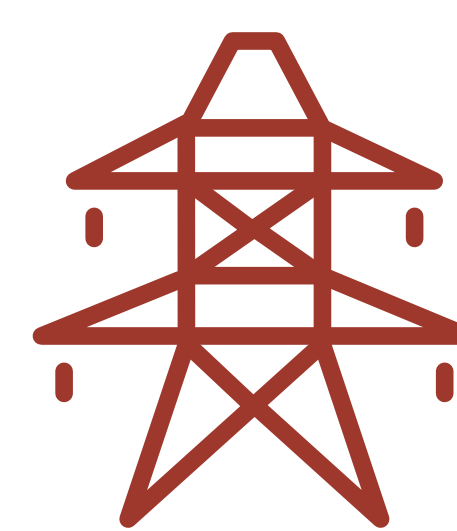
## Indigenous Culture, Values and Land Use

- Features supporting practice of Indigenous community rights/interests and use of land and resources for traditional purposes (including sensitive areas shared, wildlife habitat, Crown land)
- Cultural areas and sites (including archaeology)
- Other applicable criteria/indicators identified by communities (distance from reserve lands)



## Socio-Economic Environment

- Land use designations (e.g., provincial parks, residences)
- Infrastructure and community services
- Recreation and tourism
- Visual landscape
- Archaeology
- Built heritage resources and cultural heritage landscapes



## Technical and Cost

- Project size
- Existing community infrastructure
- Constructibility
- Existing rights-of-way
- Economic (estimated project cost)
- Safety and compatibility with existing grid



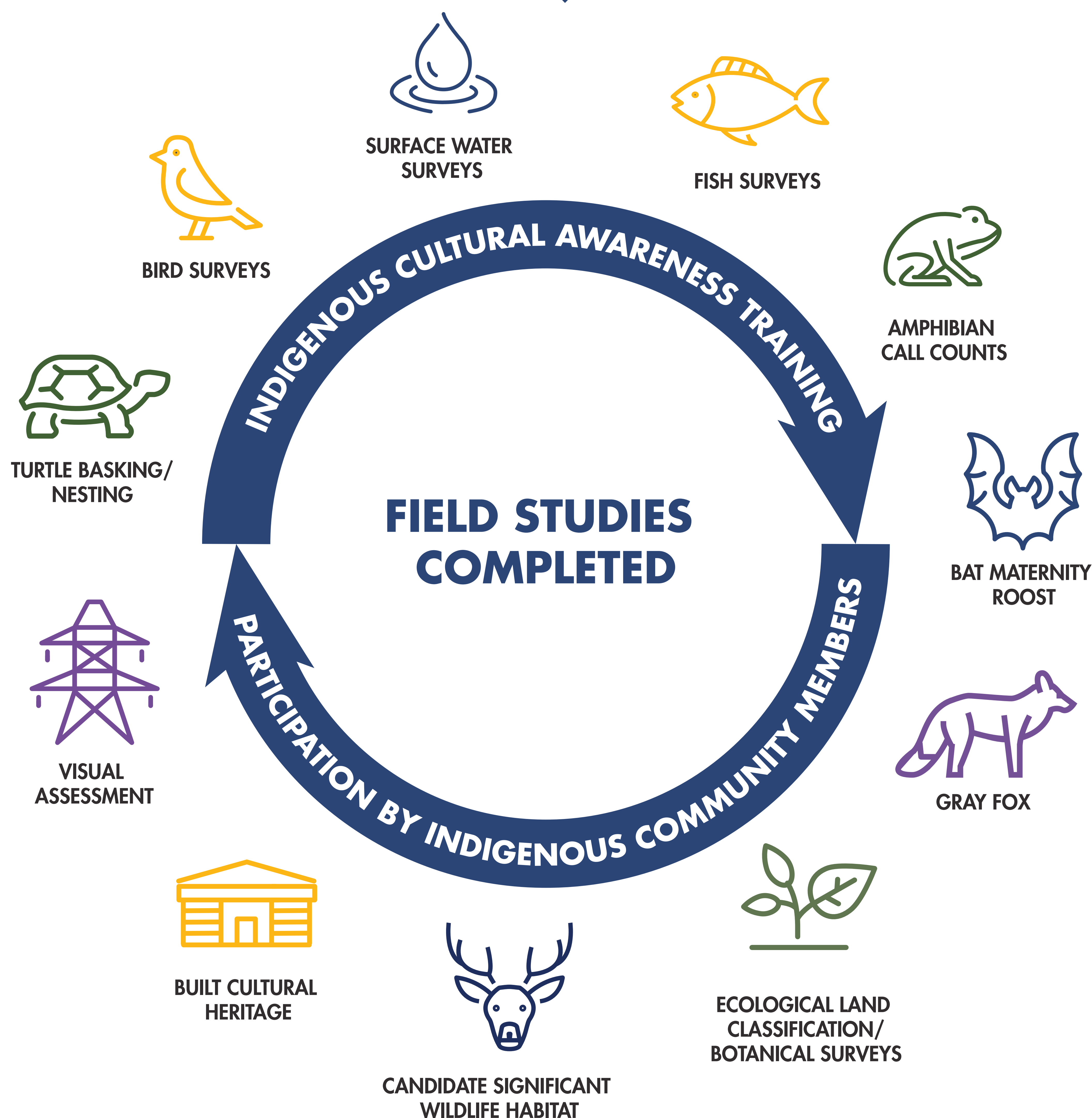


# FIELD PROGRAM

On the ground field studies were completed to inform our understanding of the existing environmental conditions, the route evaluation process and project effects.



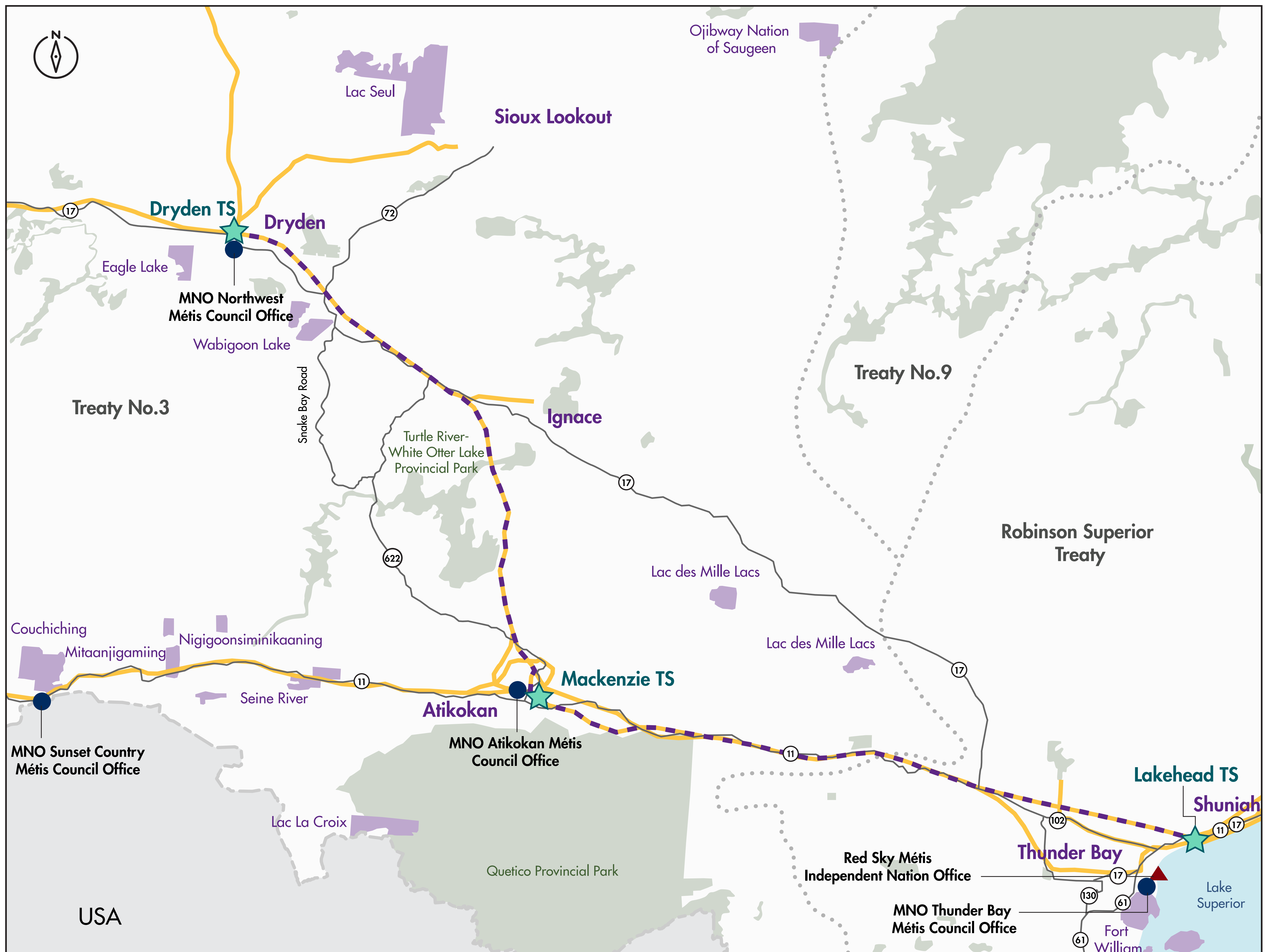
More than 1,200 site visits were completed with field crew members and monitors from several Indigenous communities for the following surveys:



# PRELIMINARY PREFERRED ROUTE



The preliminary preferred route best balances the categories of criteria evaluated overall when compared to the other route alternatives.



## Map Legend

- |                                   |  |
|-----------------------------------|--|
| Existing Transformer Station (TS) | Red Sky Métis Independent Nation Office      |
| Preliminary Preferred Route       | Métis Nation of Ontario (MNO) Council Office |
| Existing Transmission Line        | Treaty Boundary                              |
| Highway                           | First Nation Reserve                         |
| International Border              | Provincial Park                              |





# ONGOING ENGAGEMENT

Community continues to play an important role in our project planning.

At this time, we are listening and seeking ongoing feedback on the preliminary preferred route.

Since, 2019, our outreach has included:

## Community outreach



**13 Open Houses**



Directly heard from more than **1,000 community members**



**50** notices, newspaper, radio and social media ads **and an online survey** across the region



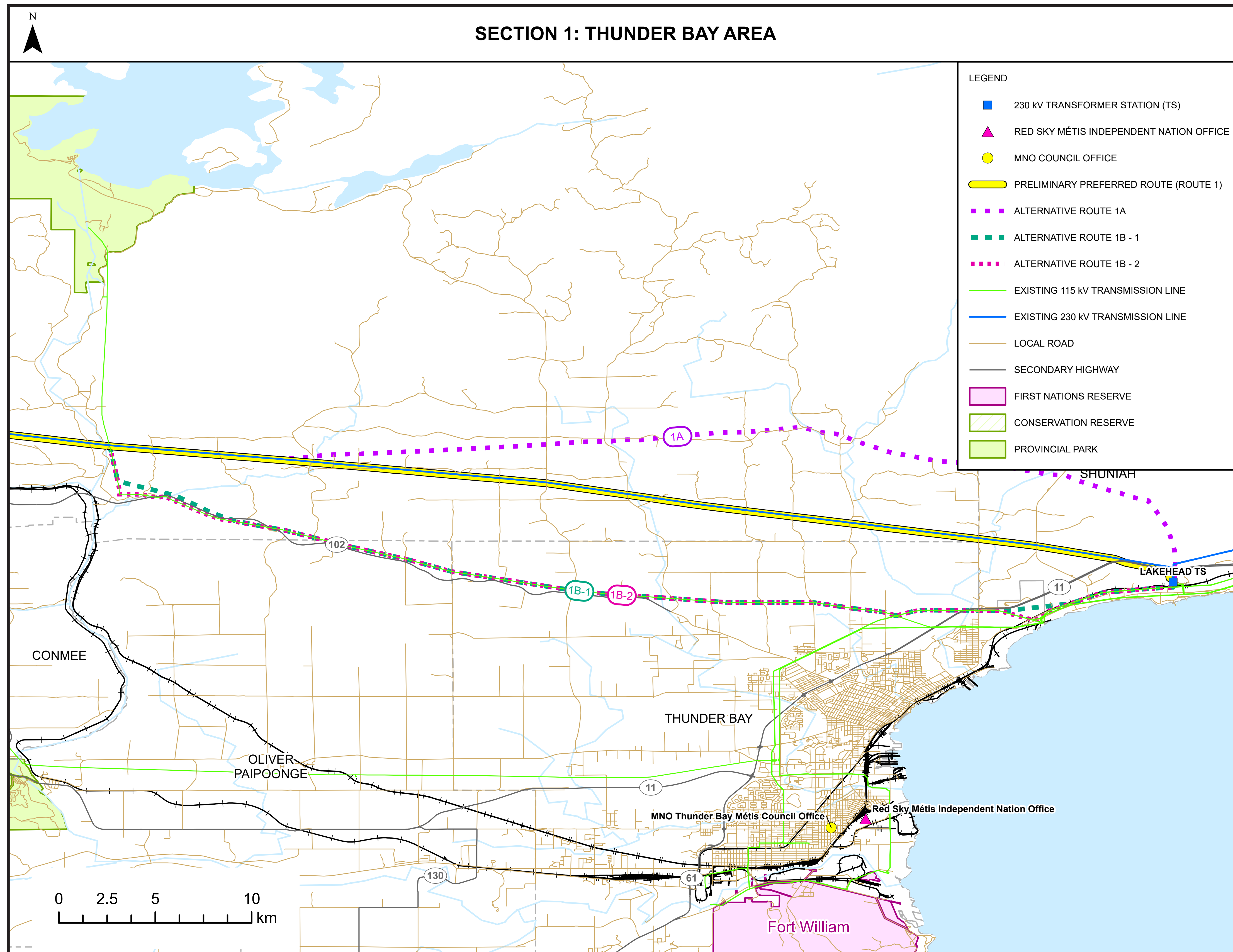
Regularly met with local elected officials and regional leaders



# THUNDER BAY AREA



## PRELIMINARY PREFERRED ROUTE AND ALTERNATIVE ROUTES

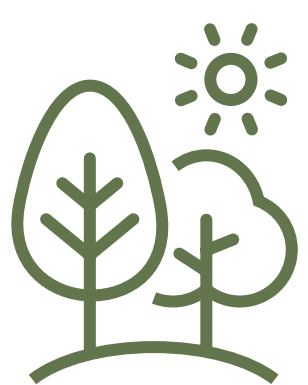


In this area, Route 1 was selected because it best balances the evaluation criteria compared to the other route alternatives. The preliminary preferred route:



**Indigenous Culture, Values and Land Use**

- Has less sensitive areas identified by Indigenous communities compared to Route 1A, but more sensitive areas compared to Route 1B-1 and 1B-2.



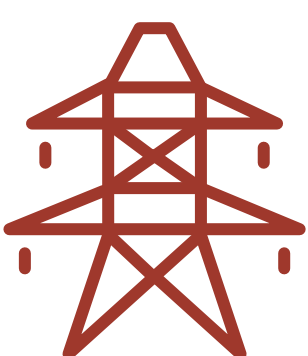
**Natural Environment**

- Is the shortest route with the least impact to the natural environment including crossing the smallest area of significant wildlife habitat. It has the highest percent parallel to existing linear infrastructure, minimizing habitat fragmentation and maximizing the use of existing access.



**Socio-Economic Environment**

- Has the least impact to the socio-economic environment, including the least residential impacts.



**Technical and Cost**

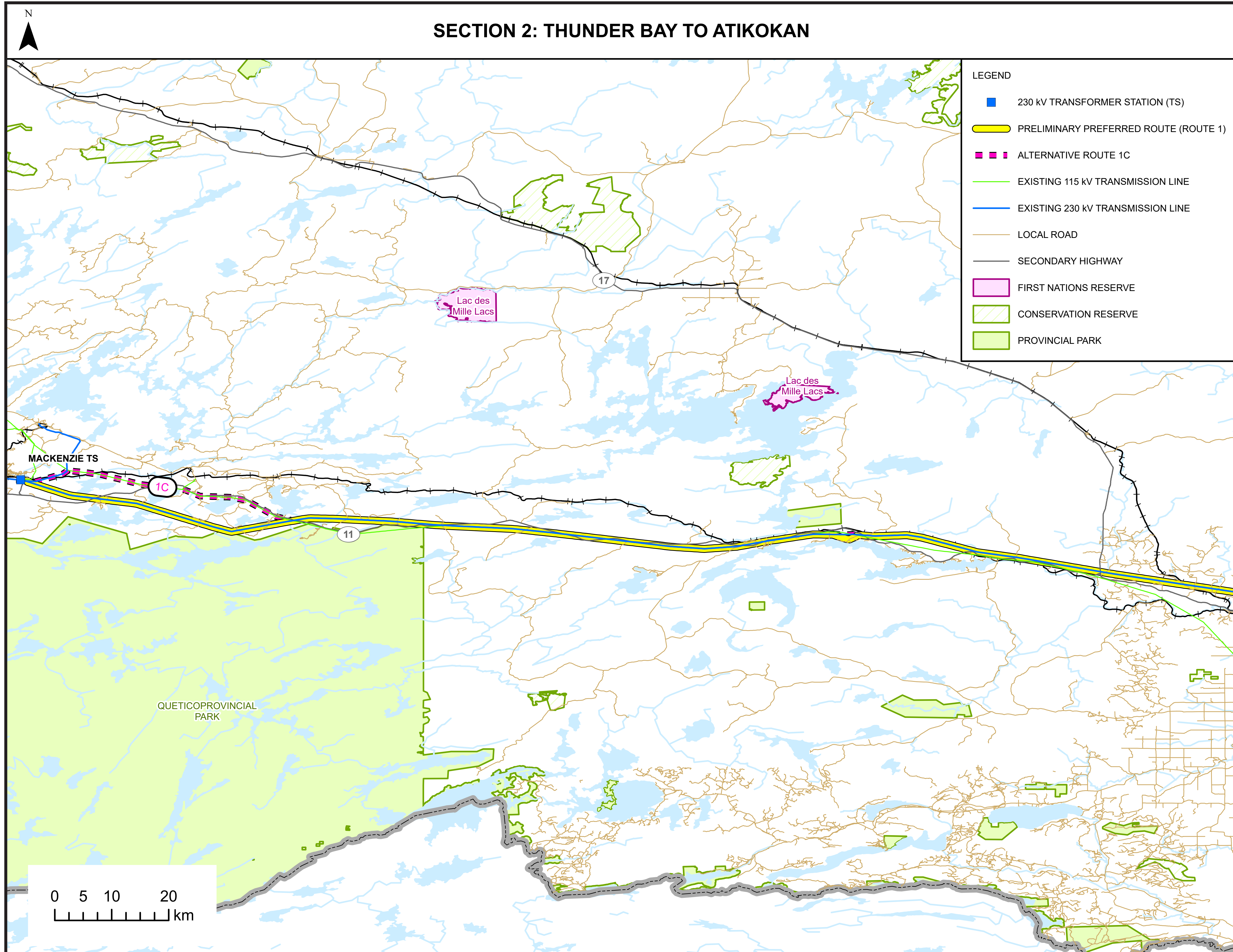
- Has the least technical complexities and cost.



# THUNDER BAY TO ATIKOKAN AREA



## PRELIMINARY PREFERRED ROUTE AND ALTERNATIVE ROUTES

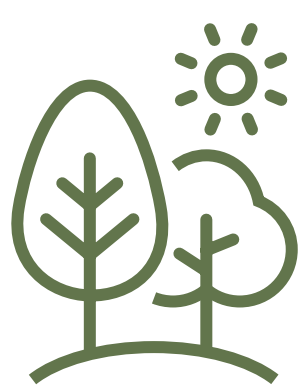


In this area, Route 1 was selected because it balances the evaluation criteria compared to the other route alternatives. The preliminary preferred route:



### Indigenous Culture, Values and Land Use

- Scored better for Indigenous Culture, Values and Land Use indicators.



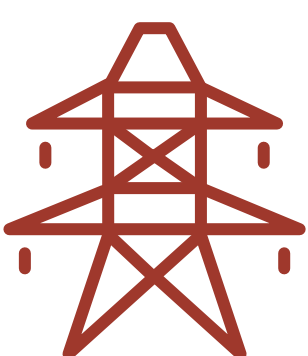
### Natural Environment

- Higher percent parallel to existing linear infrastructure, minimizing habitat fragmentation and maximizing the use of existing access.



### Socio-Economic Environment

- Has significantly less impact to the socio-economic environment, including fewer mapped cabins, cottages and recreational features within 500 m.



### Technical and Cost

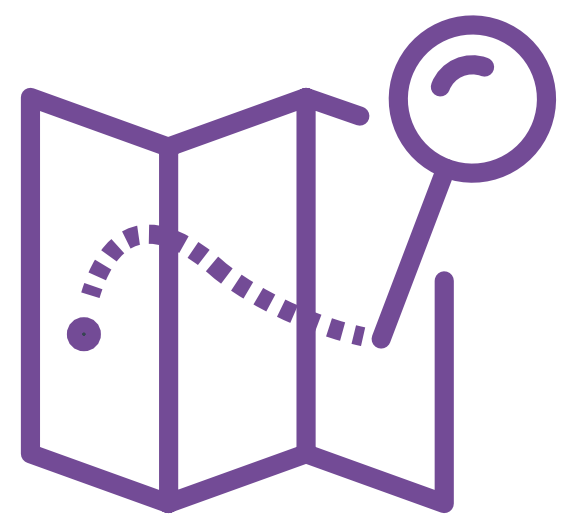
- Has the least technical complexities and cost.



# MITIGATION AND RESTORATION OPPORTUNITIES



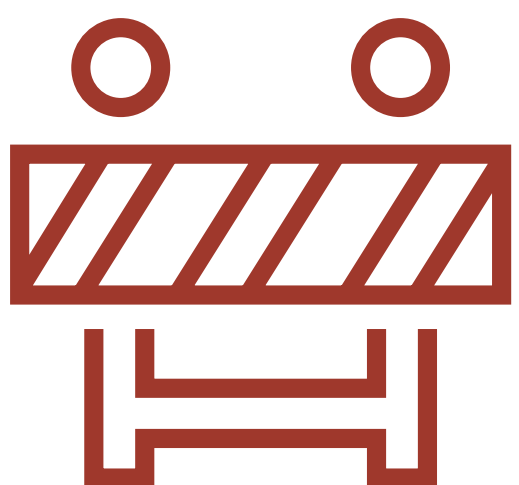
We have identified a number of mitigation measures to implement during and after construction of the new line:



Use existing access and watercourse crossings as much as possible



Restore temporary access roads and work areas after construction



Apply erosion and sediment controls when needed



Retain compatible vegetation



Employ dust control measures

We want to hear your feedback to help us continue identifying measures to avoid or mitigate environmental effects and enhance the new transmission line.



# WORKING WITH PROPERTY OWNERS



Hydro One is committed to working closely with directly impacted property owners.

Our land acquisition process is focused on ensuring:



**Property  
Owner Choice**

Property owners have the choice of Hydro One acquiring the corridor via an easement or purchase.



**Independent  
Valuation**

Offers are based on site-specific reports from independent third-party appraisers.



**Incentives**

Monetary incentives will be offered in addition to market value compensation for voluntary property rights.



# ELECTRIC AND MAGNETIC FIELDS (EMF)



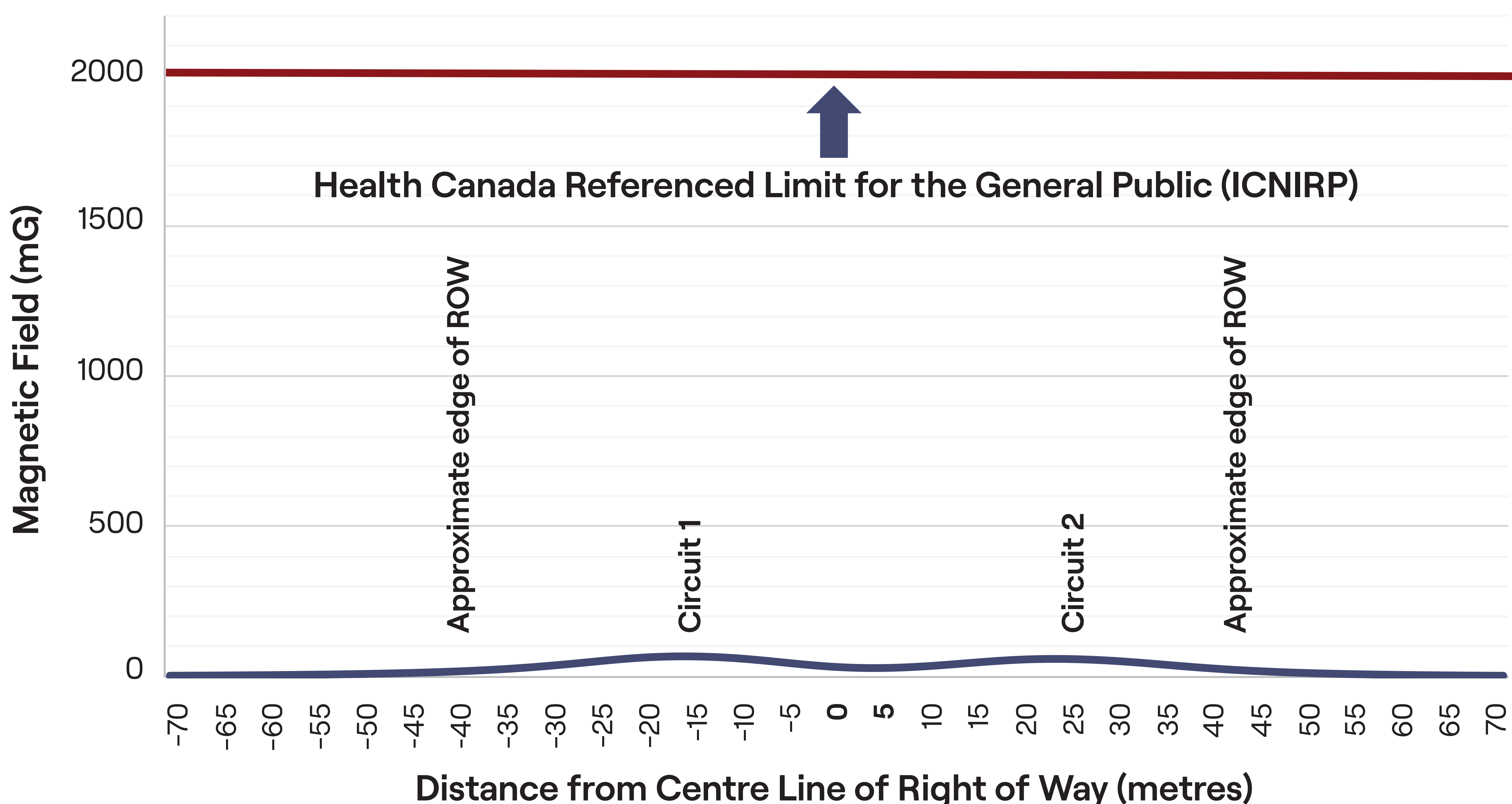
Hydro One has a dedicated team that regularly monitors global studies around electric and magnetic fields (EMF) and ensures that our infrastructure is built and maintained following best practices and industry standards. We look to Health Canada, the World Health Organization and the International Commission on Non-Ionizing Radiation Protection, for guidance on EMF and our approach.

Based on global studies which have and continue to be regularly monitored, these organizations indicate that members of the public do not need to take precautions to protect from fields produced by extremely low frequencies such as transmission lines.

Hydro One is completing modeling to confirm that once the line is energized the fields produced will remain within a safe level.

Typically, EMF levels for a project like Waasigan are less than 1% of the recommended guidelines.

EMF or Magnetic Field Strength (mG) on a Typical Double Circuit 230kV Right of Way





# PROJECT TIMELINES AND NEXT STEPS



## Winter 2023 – Spring 2023

Ongoing engagement and feedback incorporated into the environmental assessment.

## Spring 2023

The draft environmental assessment report available for public review and comment.

## Summer 2023

Feedback received during the draft environmental assessment review period will be incorporated before the final report is submitted to the Ministry of the Environment, Conservation and Parks.

## Summer 2023 – Early 2024

Ministry of the Environment, Conservation and Parks will review the final report, and will provide two opportunities for public review and comment.

## 2023

A Leave to Construct application will be submitted to the Ontario Energy Board.

## Early 2024

Ministry of the Environment, Conservation and Parks will make a decision on the final environmental assessment report.

## Early 2024

Anticipated approval from the Ontario Energy Board on the Leave to Construct application.

## Early 2024

Community open houses to discuss construction.

## 2024

Anticipated start of construction for phase 1.

## The end of 2025

Phase 1 in-service date.





## THANK YOU FOR JOINING US

Please provide your feedback and join our project contact list by contacting Hydro One Community Relations:



**1-877-345-6799**



**Community.Relations@HydroOne.com**



**HydroOne.com/Waasigan**



Please fill out a comment form before you leave, or send us your comments afterwards.



**HydroOne.com/Waasigan**