

PROJECT DESCRIPTION: LUPIN MINE WINTER ACCESS

Purpose

In 2019, Nahanni Construction Ltd. (NCL; the Applicant), obtained access to a portion of the Tibbitt to Contwoyto Winter Road (TCWR) route from the Ekati Mine turnoff on Lac de Gras in the Northwest Territories (NT; Lac de Gras) to the Lupin Mine in Nunavut (NU; Lupin) in order to construct and operate this portion of the TCWR to mobilize and demobilize equipment and supplies that may be used for ongoing reclamation and closure of Lupin in the Kitikmeot Region of Nunavut (the Program). Authorizations for this work are Type A Land Use Permit MV2018F0024 in Northwest Territories and Class A Land Use Permit N2019F0001 in Nunavut.

Due to logistical constraints and weather, the project did not proceed during the 2019 winter road season. NCL plans to commence construction during the 2020 winter road season. To do so, and to support accelerated winter road construction and on-time execution of works at Lupin, NCL is amending the scope authorized under Type A Land Use Permit MV2018F0024 to include additional supporting activities in Northwest Territories, and is applying for a Type B water licence in Nunavut.

It is understood that the Tibbitt to Contwoyto Joint Venture (TCJV) currently holds a licence of occupation for the entire winter road route; conversations with TCJV personnel indicate that there are no current plans to construct the segment of the TCWR extending from Lac de Gras to Lupin and so there are no known conflicts with this aspect of the land use.

Location

The Program will extend from Lac de Gras to Lupin along the existing TCWR route, traversing 95 km in NT and 118 km in NU (213 km in total).

Mobilization to construct and operate this portion of the winter road will occur from the existing seasonally constructed portion of the TCWR from Yellowknife to Lac De Gras, and/or from Lupin.

As the route crosses the NT/NU border, this is a transboundary project.

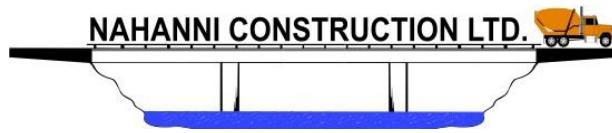
Timing

Use is expected to be seasonal for two (2) years, commencing in January 2020 and recurring in 2022, however, as a contingency, use over a five (5) year period is being sought in the event of unforeseen delays or schedule changes.

Construction is expected to occur in December and January each year.

Operations are expected to occur from January to April, depending on ice conditions.

Closure will occur seasonally once ice conditions are such that ice travel is deemed unsafe. Typically, this will occur in April.



Scope

To execute the Program, authorization of the following activities is being sought:

- Construction, operation and closure of a winter road occurring within the existing corridor for the TCWR from Lac de Gras to Lupin;
- Use of up to two temporary mobile construction camps in Northwest Territories;
- Establishment of temporary fuel caches in Northwest Territories for up to 43,850 L diesel 2,550 L gas, 25 gallons of various lubricants and 1000 lbs of propane;
- Staging equipment and fuel year-round in Northwest Territories;
- Withdrawal of up to 299 m³/day of water in Nunavut.

Construction of the winter road will follow current best practices and standards for winter road construction. Depending on conditions and staging area availability, construction will either start at Lupin with crews working southward, or crews may also start simultaneously at Lac de Gras and Lupin, working both northwards and southwards. Crews will either be accommodated at the Lupin mine site or accommodated in a mobile construction camp.

Operation of the winter road will occur generally in accordance with the procedures already in place for the TCWR, along with those associated with this application. Operational activities include:

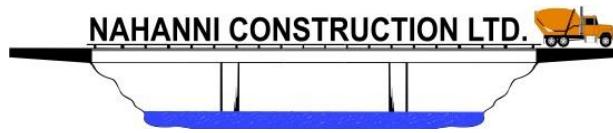
- Transport of equipment and supplies required for mine reclamation activities;
- Maintenance of the winter road including removal of blowing snow, and repairing potholes and rough areas.

Should the need arise during operation of the winter road, the staged temporary construction camps may be used as emergency shelters.

Seasonal closure of the winter road will occur once conditions are deemed unsafe for operations. Equipment and fuel may be staged along the route during construction, operation and seasonal closure to support late season use of the Project area, and early season construction, without being reliant on the TCWR and weather conditions south of the Project area.

Water for industrial use (road and portage construction and maintenance; NU and NWT) and domestic use (temporary camps; NWT only) will be withdrawn from nearby lakes. Withdrawal volumes will be within applicable permitted limits.

Waste generated over the life of the project will involve a combination of on-site treatment and disposal (incinerate camp waste, discharge black and greywater to upland sumps) and off-site treatment and disposal, with waste backhauled to approved facilities at Lupin or Yellowknife. Waste generation is limited to Northwest Territories.



Alternatives

Alternatives to the project have been considered and involve:

- Lupin Mine construct and operate the TCWR. While winter access to Lupin has occurred in the past, the current owners have no current plan to construct and operate the TCWR.
- TCJV construct and operate the TCWR. Personnel at the TCJV indicate that this option is not favourable as they currently have no plans to construct this portion of the TCWR in the upcoming years.
- Airlift supplies and equipment into Lupin. Equipment and supplies required to support ongoing reclamation activities are of a size and weight that is either not possible, logistically difficult and/or cost prohibitive to transport to site by air.

Accordingly, it is the Applicant's preference to seasonally construct, operate and close the TCWR from Lac de Gras to Lupin themselves, to ensure an economic and efficient means of transporting supplies and equipment to Lupin in support of ongoing reclamation activities.