



Sahtu Land and Water Board

Staff Report

Division: Water Program	Report No.: 1
Date Prepared: April 17, 2018	File No.: S18L3-001
Meeting Date: April 19, 2018	
Subject: Deline Got'ine Government Water Licence Renewal Application	

1. Purpose/Report Summary

The purpose of this Report is to present to the Sahtu Land and Water Board for consideration:

- a) the Water Licence renewal application submitted by the Déljñę Got'jñę Government (DGG) for Deline's use of water and disposal of waste for municipal purposes including:
 - water treatment and use from Great Bear Lake for community use
 - solid waste disposal – currently at a temporary Solid Waste Facility (SWF), to be moved to a new SWF in 2018
 - sewage disposal – at the new lagoon facility commissioned in 2016
 - closure and reclamation – of the temporary SWF and the old sewage lagoon in 2019

2. Background

- **October 27, 2017** – Déljñę Got'jñę Government submitted notification that Stantec Consulting Ltd. Has been retained to assist with preparation of the renewal application;
- **October 30, 2017** - the Sahtu Land & Water Board (SLWB or Board) staff send confirmation of receipt of the notification providing details of renewal application requirements which include addressing ongoing compliance concerns that are anticipated to include a status update with regard to responsibility for the closure and reclamation of the solid waste facility with MACA; which the Board was made aware of July 2017;
- **November 8, 2017** - the Board received a request to amend the term of S12L3-006 with an Amendment Application;
 - On the same day, the Applicant was advised that the Application was Deemed Complete.
- **November 9, 2017** - Review packages were sent out electronically to members of the Deline District Distribution List using the Online Review System with a request for comments by **November 23, 2017**;
- **November 23, 2017** – Reviewer comments received;
- **November 30, 2017** - Applicant response deadline;

- **December 5, 2017** - Board decision to extend licence expiry until May 4, 2018;
- **March 9, 2018** - the Board received the Water Licence renewal application;
- **March 19, 2018** – the Applicant was advised that the Application was Deemed Complete
- **March 19, 2018** – Review packages were sent out electronically to members of the Deline District Distribution List using the Online Review System with a request for comments by **April 10, 2018**;
- **April 10, 2018** – Reviewer comments received;
- **April 17, 2018** – Applicant response deadline - no responses received;
- **April 18, 2018** – Board meeting to consider Water Licence renewal application for a term of 5 years

3. Discussion

3.1 Project Overview

Deline’s water source is Great Bear Lake. The community has been improving the solid waste disposal and sewage treatment facilities since the issuance of the previous Licence in 2012. March 9, 2015 the Board approved the Closure and Reclamation Plan for the facilities however the work plan and associated timeline to implement the remediation process has been outstanding since July 31, 2015. On March 9, 2018, the DGG proposed that once domestic waste disposal is transferred to the new SWF in 2018, MACA will be informed and requested to proceed with closure and reclamation of both facilities (the old sewage lagoon and the temporary SWF) in 2019. This will require MACA to update the Closure and Reclamation Plan for approval by the SLWB and contracting party to complete the closure and reclamation. Below is a table 1 outlining items that required submission in the renewal application and how they have been addressed.

Table 1 - S12L3-006 – Charter Community of Deline – Overdue and Pending Water Licence Submissions

Licence Condition	Report Title /Action Required	Submission due date	Comments
B.1	Annual Report for 2017	March 31, 2018	Annual Report not yet submitted
B.2	SNP - incomplete implementation of required sampling		ECCC and ENR commented on lack of SNP sampling. A revised set of SNP stations will be recommended by the DGG and ENR to the SLWB in the spring of 2018 for their review and approval.
B.8	SNP – Map of sampling locations with associated GPS coordinates – for Board approval		Map provided in application but GNWT-ENR recommended changes to improve mapping and relocate one SNP station
D.12	The Licensee shall maintain the Solid Waste Disposal Facilities to the satisfaction of the Inspector.	March 31, 2016	An updated O & M Plan has been submitted with the application which includes hazardous waste management
E.3	The Licensee shall provide to the Board as-built plans and drawings of modifications within ninety	March 31, 2016	No as-built drawings were included in the application.

	days of completion.		
F.1	The Licensee shall review the Spill Contingency Plan annually and revise the plan as necessary to reflect changes in operations and technology.	March 31, 2016	An updated Spill Contingency Plan was provided with the application
G.2	The Licensee shall implement the Plan (Closure and Reclamation Plan) as and when approved by the Board.	July 31, 2015	A brief Implementation Schedule outlining the work plan and timeline to implementing the remediation process was provided in the cover letter for the application, indicating that an updated Closure and Reclamation Plan will be required prior to proceeding with the work.
I.1	The Licensee shall submit to the Board for approval revised Operation and Maintenance Plans	Prior to use of new facilities	Operation and Maintenance Plans for the Sewage Lagoon and the Solid Waste Disposal Facility were submitted with the application. The O & M Plan for the Water Treatment Plant is outstanding.

3.2 Process Requirements

Application Received: March 9, 2018

Application Deemed Complete: March 19, 2018

Application Forwarded for Review: March 19, 2018

Number of Review Agencies: 22

Review Period End Date: April 10, 2018

Proponent Response Date: April 17, 2018

A Type B Water Licence is required in accordance with Schedule F (Licensing Criteria for Municipal Undertakings), of the Water Regulations, item 1 and 3(a) for: direct water use of 50 or more cubic metres and less than 2,000 m³ per day and a deposit of waste by means of sewage collection or treatment system serving a population of between 50 and 2,000.

Of the 22 organizations to which the application was distributed, nine (9) of which are represented within the Sahtu Settlement Area, review comments were received from:

- Environment and Climate Change Canada (ECCC); and
- GNWT – Department of Environment and Natural Resources (ENR)

The Review Comment Table and submitted letters from ECCC and ENR are attached to this report (Attachment 1). There were no responses to comments and recommendations posted by the Applicant.

4.0 Comments

4.1 Management Plans

The renewal WL Application included updated Management Plans, including Spill Contingency Plan and Operation and Maintenance Manuals for the Solid Waste Disposal Facilities and the Sewage Lagoon. There was no Plan for the Water Treatment Plant. Reviewer comments expressed some concerns with the manuals which would require revisions and a resubmission to the Board for approval.

4.2 Engagement and Traditional Knowledge

Engagement Record and Engagement Plan was not included in the application. Generally for municipal licences there should be some evidence of a written notification of the initiation of the renewal process that has been circulated to the community. A letter of support for current operations and planned improvements to the waste management system was received from the Deline Renewable Resources Council on March 7, 2018, suggesting the community had been informed of the planned renewal application. No other records of engagement were received with the application.

4.3 Preliminary Environmental Screening

Section 124(1) of the Mackenzie Valley Resource Management Act requires the Board to undertake a Preliminary Screening of any proposed development prior to the issuance of a Licence, Permit or Authorization.

The renewal application contained adequate information to update the Board approved Preliminary Environmental Screening (PES) dated November 28, 2012. The updated Preliminary Screening is included as Attachment 2. The report concludes that the environmental impact of the proposed project can be mitigated with known technologies and that no significant public concerns have been raised.

4.4 Conformity with the Land Use Plan

Pursuant to subsection 61(2) of the MVRMA, the Board may not issue a licence or permit except in accordance with any applicable land use plan. The Plan applies throughout the Sahtu Settlement Area except for “lands in a settlement area that comprise a park to which the *Canada National Park Act* applies, that have been acquired pursuant to the *Historical Sites and Monuments Act* or that are situated within the boundaries of a local government.”¹

All infrastructure are contained within the Municipal Boundary of Deline thus the SLUP does not apply.

4.5 Security Deposit

N/A

4.6 Draft Licence

A draft Licence (Attachment 3) with term and conditions was prepared by Board staff and distributed for review on the Online Review System. Reviewer comments recommended some changes and additions to the draft conditions which staff have made.

3. Other Agency Comments

¹ Mackenzie Valley Resource Management Act (MVRMA), Section 34.

The application was distributed to members of the Deline District Distribution List; which includes 22 review organizations, requesting a reply by April 10, 2018. Two organizations responded: Environment and Climate Change Canada (ECCC) and Government of the Northwest Territories – Environment and Natural Resources (GNWT-ENR).

ECCC (ID1 and 4) and **GNWT-ENR** (ID11 and 5) both requested that the appendices for the Sewage Lagoon Operations and Maintenance Manual be included as well as that water/effluent sampling and SNP sampling should be conducted as required.

ECCC made two recommendations about the Solid Waste Disposal Facility O and M Plan – to provide more information about leachate quality (ID2) and that closure and reclamation of the temporary solid waste facility to be implemented upon completion of the new solid waste facility (ID3).

GNWT-ENR requested that the Sewage Lagoon O and M Plan include a map showing the entire wetland treatment path and clearly (ID1) identify and label SNP Stations (ID2). They also recommended the SNP Station 0555-5 be revised to the final discharge point at Great Bear Lake (ID3).

GNWT-ENR provided some recommendations on EQC's for CFU and CBOD in the Water Licence (ID4).

GNWT-ENR (ID6, ID7 and ID8) recommended further details be provided within the rationale for each groundwater well in the SNP section of the Water Licence. They also recommended that the WL Part H add conditions for Closure and Reclamation of the Deline new waste management facilities (WWTS and SWF) (ID9).

GNWT-ENR recommended that additional information be included in the WWTS O and M Plan as typically requested in LWB's templates (ID10) and that the flowchart for the Spill Contingency Plan be posted in a highly visible location within the Deline facilities (ID12).

The Applicant did not provide a response to any of the comments and recommendations by the due date of April 17, 2018. Staff have reviewed all recommendations and have addressed them by:

- requiring a resubmission of the two Operation and Maintenance Plans to include additional information requested by the reviewers;
- updating the Licence conditions to reflect the recommendations made by reviewers;
- including a reminder in the issuance letter to update the flowchart to contain the name and phone numbers of relevant staff (eg. SAO) responsible for and responding to activating the Spill Recovery Plan; to post the flowchart for the SCP in a highly visible location within the Deline facilities; and that an updated flowchart with all current contact information should be submitted to the Board for inclusion in the approved SCP and will be posted to the public registry.
- including a reminder in the issuance letter about the requirement to conduct regular water/effluent sampling and SNP sampling.

4. Conclusion

Déljñę Got'jñę Government retained Stantec Consulting Ltd. to assist with preparation of the renewal WL required for municipal purposes. There were numerous updates and revisions required for the submission including the 2017 Annual Water Licence Report, management plans and operation and

maintenance plans. Most of these plans and reports have been provided; however, the 2017 Annual Water Use Report and the Water Treatment Plant Operation and Maintenance Manual were not provided. The draft Licence conditions include a requirement for submission of the Water Treatment O and M Plan within 90 days of issuance of the Licence.

5. Recommendation

Board staff recommend that the Board grant the renewal of Water Licence request, with a five year term.

Should the Board decide to proceed with the regulatory process for the Water Licence, Board staff also recommend that the Board:

- Approve the draft WL with a term ending May 4, 2023.
- Approve the **Spill Contingency Plan** with the requirement:
 - to update the flowchart to contain the name and phone numbers of relevant staff (eg. SAO) responsible for and responding to activating the Spill Recovery Plan; and
 - An updated flowchart with all current contact information should be submitted to the Board for inclusion in the approved SCP and will be posted to the public registry.
- Not approve the **Sewage Lagoon Operations and Maintenance Manual** or the **Solid Waste Disposal Facility Operations and Maintenance Manual**, requesting that revised manuals be submitted to the Board, for approval, within 60 days of issuance of the licence addressing reviewer comments and recommendations as per Table 2 below.
- Approve the draft **Reasons for Decision** and draft **Letter of Issuance** prepared for Board consideration (see attachment 4 and 5).

Table 2: Revisions required to O and M Manuals

Manual and Information Required	Revision Due Date
Sewage Lagoon Operations and Maintenance Manual	
Include all missing appendices Appendix A DrawingsA.1 Appendix B Current Water LicenceB.2 Appendix C INAC Sampling GuideC.3 Appendix D Site Inspection Template D.4 Appendix E Laboratory Sampling RequirementsE.5	June 18, 2018
Solid Waste Disposal Facility Operations and Maintenance Manual	
provide information on the quality of leachate coming from the solid waste disposal facility and any details on collection within the facility.	June 18, 2018
provide information on the proposed closure and reclamation of the temporary solid waste facility to be implemented upon completion of the new solid waste facility.	
the entire Sewage Disposal Facilities (or WWTS), including the wetland portion location in between the new lagoon cells and the receiving environment (Great Bear Lake), and corresponding SNP monitoring station, be visually represented on a map and included within Deline WWTS O&M Plan.	
the font used to represent SNP stations on the “Existing SNP Map” be increased in order to be readable.	

the suggested location for SNP location 0555-5 be revised and represent the Final Discharge Point, located immediately prior to entering the receiving environment of Great Bear Lake.	
Deline's current WWTS O&M be updated to provide typical WWTS management and information details, such as required in the MVLWB WWTS O&M Template. During the updating process of the WWTS O&M plan, Deline should also refer to the O&M Template Appendix specific to Engineered Lagoons (Schedule C) for further wastewater treatment train specific information.	

Should the Board grant approval, the Licence could be issued on April 19, 2018 with a start date of May 5, 2018.

9. Attachments

1. Review Comment Table with attachments
2. Preliminary Environmental Screening
3. Draft Water Licence Cover Page & Conditions
4. Draft Reason for Decision
5. Draft Issuance Letter

Respectfully submitted,



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