File No.: 3BM-PEL1419

June 8, 2018

John Ivey, Senor Administrative Officer Hamlet of Kugaaruk P.O. Box 205 Kugaaruk, NU, X0B 1K0

Email: sao_kug@qiniq.com

RE: NWB Technical Review of 2017 Annual Report for the Hamlet of Kugaaruk; Water Licence No. 3BM-PEL1419

Dear Mr. Ivey:

The Nunavut Water Board (NWB) has completed a technical review of the 2017 Annual Report.

On March 27, 2018, the NWB acknowledged receipt of the Annual Report and provided it to the Kitikmeot distribution list for information. No comments have been received to date.

The technical review of the Annual Report found that additional information is necessary to meet the following requirements of the Licence:

• Part B, Item 1a: The Annual Report shall contain:

tabular summaries of all data generated under the "Monitoring Program";

The Annual Report did not provide tabular summaries of the analytical data provided from Taiga Environmental Laboratory. Summary tables should compare analytical results over time, between sampling locations, and with release requirements.

• Part H, Item 2:

The Licensee shall measure and record, in cubic metres, the daily, monthly and annual quantities of water extracted for all purposes at Monitoring Program Station PEL-1.

The Annual Report did not provide volumes from PEL-1, volumes in cubic metres, or daily volumes. Monthly and annual volumes in Litres from the On Tap Water Delivery System was provided. Since there is no Water storage in the Water Supply Facility, this

volume, if explained, could be an effective surrogate for PEL-1.

• Part B, Item 1d: The Annual Report shall contain:

the daily, monthly and annual quantities in cubic metres of each and all waste discharged; including the hazardous and non-hazardous waste accepted at the Solid Waste Facilities;

The Annual Report did not provide any information on quantities of solid waste.

The Annual Report did not provide daily volume information of liquid waste discharged (sewage). Monthly and Annual estimates were provided in Litres rather than cubic metres. No reference was made to the Monitoring Program Station ID as per Part H, Item 3:

The Licensee shall measure and record in cubic metres the daily, monthly and annual quantities of raw sewage offloaded from trucks at Monitoring Program Station PEL-2 for all purposes.

• Part H. Item 7:

The Licensee shall report all results of acute toxicity testing as required under Part D, Item 7 within the Annual Report as per Part B, Item 1.

The Annual Report did not provide any information on acute toxicity testing.

• Part H, Item 6:

The Licensee shall sample at Monitoring Program Stations PEL-7, PEL-8-1, PEL-8-2, PEL-9-1, PEL-9-2, PEL-10-1 and PEL-10-2 as determined by SWF O&M Manual.

The Annual Report did not provide any information from Monitoring Program Stations PEL-7, PEL-8-1, PEL-8-2, PEL-9-1, PEL-9-2, PEL-10-1 and PEL-10-2. The NWB acknowledges that the required sampling frequency for these stations is not well defined as the NWB has no record of the Licensee submitting the SWF O&M Manual as required by Part F, Item 1 (discussed below).

Please provide this information in the 2018 Annual Report/Other Report Titles and all future reports. If for some reason data or information is not available, include a discussion indicating:

- What information is missing;
- Why it was not provided; and
- Steps being made to provide it in the future.

The NWB notes that the Licensee has not provided all the submissions previously required by the Licence:

• Part F, Item 1:

The Licensee shall submit to the Board for approval, within six (6) months of issuance of the Licence, a "Water Collection and Distribution Operation and Maintenance (O&M) Manual", in accordance with the "Guidelines for the Preparation of an Operation and Maintenance Manual for Sewage and Solid Waste Disposal Facilities in the Northwest Territories; 1996". These Manuals shall provide details regarding, at a minimum, the water system, pump-house, intake line, treatment plant.

To date, the NWB has no record of receiving this information which was due on November 12, 2014. This information is intended to include the SWF O&M Manual referenced in Part H, Item 6 of the Licence.

• Part F, Item 2:

The Licensee shall submit to the Board for review within ninety (90) days of issuance of the Licence, an updated **Environmental Emergency Contingency Plan for Water, Sewage and Solid Waste Operations**. The updated Plan is to take into consideration at a minimum, the comments received during the review of the previous Plan approved by the Board on January 22, 2010, and information regarding the new water treatment plant.

To date, the NWB has no record of receiving this information which was due on August 12, 2014.

• Part G, Item 1:

The Licensee shall submit to the Board for approval within six (6) months of issuance of the Licence, an **Abandonment and Restoration Plan for the existing pumphouse** to be replaced with a new pump-house.

To date, the NWB has no record of receiving this information which was due on November 12, 2014.

• Part H, Item 11:

The Licensee shall submit to the Board for information, within ninety (90) days of issuance of the Licence, a **Quality Assurance/Quality Control Plan** that conforms to the guidance document *Quality Assurance (QA)* and *Quality Control (QC)* Guidelines For Use by Class "B" Licensees in Collecting Representative Water Samples in the Field and for Submission of a QAQC Plan INAC (1996). The Plan shall be acceptable to an accredited laboratory and include a covering letter from the accredited laboratory confirming acceptance of the Plan for analyses to be performed under the Licence.

To date, the NWB has no record of receiving this information which was due on August 12, 2014.

The NWB strongly recommends that the Licensee address issues identified in 2017 by the Inspector¹. Please provide a brief summary of work done to address concerns or deficiencies listed in the inspection reports and/or compliance reports prepared by an Inspector or other parties in the 2018 Annual Report.

Should you have any questions, please feel free to contact me, Dave Baines, at (867) 360-6338 (extension 29), at your earliest convenience.

Sincerely,

Dave Baines

Dave Baines Nunavut Water Board, Technical Advisor

Cc: Distribution List – Kitikmeot

¹ Indigenous and Northern Affairs Canada (INAC) Inspection Report, July 13, 2017.