



P.O. Box 119
Gjoa Haven, NU X0B 1J0
Tel: (867) 360-6338
Fax: (867) 360-6369

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NUNAVUT WATER BOARD
NUNAVUT IMALIRIYIN KATIMAYINGI
OFFICE DES EAUX DU NUNAVUT

File: 3AM-IQA0611

The following summary report was prepared to take into consideration all information received as of April 20, 2009.

Subject: Assessment of Administrative Compliance for Municipal Water Licence Amendment for the City of Iqaluit.

The Nunavut Water Board ("NWB") has taken the opportunity to summarize the information received pursuant to water Licence 3AM-IQA0611. A review of public registry files confirms that the following information is on file with the NWB, with respect to requirements of the Licence and if not found on the NWB FTP site, is available upon request for review along with the application.

LICENCE

Licence issued: May 15, 2006.
Approved by Minister: July 24, 2006.
Licence expiry: May 15, 2011
Amendments: Amendment Application received October 17, 2008 with letter dated October 22, 2006. Follow-up letter updating the amendment request received October 8, 2008.

SCOPE, DEFINITIONS AND ENFORCEMENT

Inspection Reports:

Year of Inspection:	Received:
2003	March 11, 2004.
2004	None on file.
2005	None on file.
2006	November 20, 2006.
2007	None on file.
2008	None on file.

Issues raised (2006 inspection report):

- Storage of chemicals;
- Operation and Maintenance Plan;
- Abandonment and Restoration Plan;
- Discharge measuring device;
- SNP station signage;
- Effluent discharge quality;

GENERAL CONDITIONS (PART B)

Annual Report:

Year Reporting:	Received:
2003	None on file.
2004	None on file.
2005	None on file.
2006	April 30, 2007.
2007	None on file.
2008	None on file.

WATER USE AND WATER MANAGEMENT PLANS (PART D)

Licence Condition	Requirement	Status
D, 2	The total annual quantity of water used for all purposes from Lake Geraldine shall not exceed 1,100,000 m ³ or as otherwise approved by the Board.	Annual water use = 721,680m ³ in 2006. No more information available given lack of Annual Reports.
D, 3	The Licensee shall equip the water intake(s) with a screen with a mesh size sufficient such that no entrainment of fish can occur.	Subject of amendment request. DFO input required.
D,4	The Licensee shall ensure that the rate of water withdrawal is such that fish do not become impinged on the screen.	Subject of amendment request. DFO input required.
D,5	The Licensee shall undertake a Dam Safety Inspection of the Lake Geraldine Reservoir between July and September bi-annually starting in 2008. A final report shall be submitted to the Board for review no later than 60 days following the site inspection and include a cover letter from the Licensee indicating how and when recommendations and/or deficiencies identified in the Inspection Report will be addressed.	None on file.

WASTE DISPOSAL AND WASTE MANAGEMENT PLANS (PART E)

Licence Condition	Requirement	Status
E,2	The Licensee shall provide at least ten (10) days written notice to an Inspector and the Board prior to any planned discharges from the Sewage Lagoon.	INAC decant authorization dated June 14, 2007. Licensee provided notice August 14, 2008, following decant. Second notice provided February 19, 2009, following emergency decant.
E,3(a)	E,3 relates to effluent quality criteria.	Subject of amendment request.

		Licensee is out of compliance and proposes to come into compliance upon commissioning Phase II.
E,3(d)	The Licensee shall confirm compliance as part of the commissioning phase for the Wastewater Treatment Plant. Upon completion of commissioning, final results and notification of intent shall be made in writing to the Inspector.	Status update required from Licensee.
E,4	Undiluted Effluent shall be non-acutely toxic under the “Rainbow Trout, <i>Oncorhynchus mykiss</i> (as per Environment Canada’s Environmental Protection Series Biological Test Method EPS/1/RM/13)”.	Subject of amendment request. Licensee proposes to come into compliance upon commissioning Phase II.
E,5	Upon commissioning of the Wastewater Treatment Plant, the Sewage Lagoon shall be considered as a back up facility only. Any discharges from the back-up Sewage Lagoon shall be considered emergency discharges and shall require authorization from an Inspector in accordance with Part E, Item 20 and 21.	Subject of amendment request. Typographical error only. Condition should refer to Part E, Item 18 and 19.
E,6	The Licensee shall submit to the Board for approval an Operation and Maintenance Manual for the Wastewater Treatment Facilities by December 31, 2007. The manual shall be prepared in accordance with the “ <i>Guidelines for the Preparation of an Operation and Maintenance Manual for Sewage and Solid Waste Disposal Facilities in the Northwest Territories</i> (GNWT 1996)”. The manual shall also cover the operation and maintenance of the Sludge Management Facility.	Not received (not on file).
E,7	The Licensee shall submit to the Board for approval the “Final Assessment of the Sludge Management Pilot Project”, completed by an Engineer, within 30 days following notification in accordance with Part E, Item 3(d).	Subject of amendment request. Licensee requested deadline extension to December 31, 2008.
E,8	The Licensee shall undertake a Dam Safety Inspection of the Sewage Lagoon, completed by an Engineer, once before October 31, 2006, then between July and September biannually starting in 2008 until notification has been provided in accordance with Part E Item 3(d). A final report shall be submitted to the Board for review no later than 60 days following the site inspection and include a cover	Not received (not on file).

	letter from the Licensee indicating how and when recommendations and/or deficiencies identified in the Inspection Report will be addressed.	
E,10	The Licensee shall submit to the Board for review by March 31, 2010, a Long-term Solid Waste Management Plan. The plan shall include, but not limited to, the following: a. Options for solid waste disposal and discussion of preferred alternative; and b. Selection of a site for solid waste disposal.	Not yet required.
E,12	The Licensee shall review all Operation and Maintenance Manuals annually and revise them as necessary to reflect changes due to best practices in operation and technology. Any proposed changes to the manual shall be submitted to the Board for approval. Proposed changes shall be submitted as an addendum to the approved manual as part of the Annual Report requirement Part B, Item 1.	O&M Manual required by Part E, Item 6 not received.
E,15	The Licensee shall submit an addendum to the manual referred to in Part E, Item 11 that will include details for contaminated soils and hazardous waste, including, but not limited to: types, volumes ultimate disposal, emergency response, thresholds, and maximum amounts accepted to the facility.	Subject of amendment request. Minor issue relating to lack of submission date for the addendum.
E,16	The Licensee shall collect and contain all leachate within the West 40 Landfill.	Subject of amendment request. The existing landfill does not have an impermeable liner. Currently, only runoff can be collected.
E,17	At least 90 days prior to any proposed release, discharge or transfer of leachate from the West 40 Landfill, the Licensee shall submit to the Board for approval a report prepared by an Engineer that will include at minimum a discussion of available treatment options, proposed discharge criteria in relation to the proposed discharge location(s) and discharge volumes, and a monitoring programme.	Subject of amendment request. Licensee has issue with submission timing. Licensee requests submitting 5 to 10 days prior to leachate management. May be difficult to modify timing of the report's submission as it requires distribution, comment review, and approval from the Board.

CONSTRUCTION (PART F)

Licence Condition	Requirement	Status
F,4	The Licensee shall, within 90 days of completion of any structure designed to contain,	Not on file. Also required for culvert installation approved by the Board on October 16, 2007,

	withhold, divert or retain waters or wastes, submit to the Board for approval, a construction report prepared by an Engineer that shall include as-built drawings, documentation of field decisions that deviate from original plans, and any data used to support these decisions.	pursuant to modification requested by Licensee on September 28, 2007.
F,8	The Licensee shall submit to the Board for approval, the final design and drawings by an Engineer, within 30 days of the effective date of the Licence, for the Lake Geraldine Raw Water Storage Phase II. The Licensee shall ensure that such facilities are designed and constructed to engineering standards such that at a minimum they comply with the Canadian Dam Safety Guidelines. The Design shall be qualified in accordance with Part F, Item 3.	Received as part of updated amendment request of October 8, 2008. May require distribution, expert review and Board approval.
F,9	The Licensee shall undertake a dam safety review of the Lake Geraldine Raw Water Storage Phase II Upgrade, completed by an Engineer, in accordance with the Canadian Dam Safety Guidelines prior to October 31, 2006. The final report shall be submitted to the Board for review no later than 60 days following the safety review and shall include a cover letter from the Licensee indicating how and when recommendations or deficiencies identified in the safety review will be addressed.	Received as part of updated amendment request of October 8, 2008. May require distribution and expert review.
F,10	The Licensee shall submit to the Board for approval, within 30 days of the effective date of the Licence, a Drainage Improvement and Management Design and drawings prepared by an Engineer for all operations in the West 40 Landfill site. The Design shall be qualified in accordance with Part F, Item 3.	Received as part of updated amendment request of October 8, 2008. May require distribution, expert review and Board approval.
F,11	The Licensee shall submit to the Board for approval, within 30 days of the effective date of the Licence, the Final Design for the West 40 Landfill Northern Expansion and drawings by an Engineer. The Design shall be qualified in accordance with Part F, Item 3.	Received as part of updated amendment request of October 8, 2008. May require distribution, expert review and Board approval.
F,12	The Licensee shall submit to the Board for approval, within 60 days of the effective date of the Licence, the Final Design for the Sludge Management Facility and drawings by an	Received as part of updated amendment request of October 8, 2008. May require distribution, expert review and

	Engineer. The Design shall be qualified in accordance with Part F, Item 3.	Board approval.
F,13	The Licensee shall submit to the Board for approval, within 30 days of the effective date of this Licence, the Final Design for the Rehabilitation of the West Berm of the Sewage Lagoon prepared by an Engineer, and an implementation schedule for the recommendations of the Dam Safety Inspection (2005). The Design shall be qualified in accordance with Part F, Item 3.	Not received (not on file).
F,14	The Licensee shall submit to the Board for review, within 10 days of the effective date of the Licence, the Final Design for Phase I of the Wastewater Treatment Plant stamped by an Engineer and qualified in accordance with Part F, Item 3, and As-built drawings.	Not received (not on file).

MONITORING (PART I)

Licence Condition	Requirement	Status
I,1	The Licensee shall install meters or such devices, or use such methods for measuring the volumes or flow of Water used and Effluent discharged. The meters and measuring devices or methods shall be operated and maintained to the satisfaction of an Inspector.	See 2006 inspection report. Issue with discharge meter.
I,2	The Licensee shall maintain the necessary signs to identify the stations of the Monitoring Program to the satisfaction of an Inspector.	See 2006 inspection report. Issue with SNP signage.
I,4	The Licensee shall submit to the Board for approval a Monitoring Program for the water supply, Wastewater Treatment Plant, and West 40 Landfill site, including the Sludge Management Facilities. The Program shall include, but not be limited to, the requirements listed in Schedule C. a. The monitoring program for Lake Geraldine shall be submitted 30 days from the effective date of this Licence; b. The monitoring program for the Wastewater Treatment Plant shall be submitted 60 days following notification of commissioning; and c. The monitoring program for the entire West 40 Landfill site shall be submitted no later than March 31, 2007.	Received June 27, 2008. Comments submitted by INAC and EC. Plan requires Board approval. Also, sewage sludge monitoring subject of amendment request. Licensee is requesting change to monitoring criteria.

I,7	The Licensee shall submit to the Board for approval, within 90 days of the effective date of this License, a Quality Assurance/Quality Control (QA/QC) Plan prepared in accordance with “ <i>Quality Assurance (QA) and Quality Control(QC) Guidelines For Use By Class “A” Licensees in Meeting SNP Requirements and for Submission of a QA/QC Plan (INAC, 1996)</i> ”.	Not received (not on file).
I,11	The Licensee shall, within 60 days following the month being reported, submit to the Board a “Monthly General Monitoring Report” of all data and information required under Schedule C, including the results of the QA/QC program.	Not received (not on file).
I,12	There should be at least one inspection of all facilities defined within the scope of this license annually between July and September. The Inspector shall submit a detailed inspection report with supporting photographs and sampling results as required under Schedule C to the Board no later than 90 days following the date of inspection.	Not received for all years (inspection reports only for 2003 and 2006).

ABANDONMENT AND RESTORATION (PART J)

Licence Condition	Requirement	Status
J,1	The Licensee shall submit to the Board for review, within 90 days of the effective date of the Licence, a conceptual Abandonment and Restoration Plan for the West 40 Landfill site prepared in accordance with industry best practices.	Subject of amendment request. Licensee requests an extension.
J,3	The Licensee shall submit to the Board for approval, one year prior to expiry of this Licence or one year before the West 40 Landfill site will reach capacity, a Final Abandonment and Restoration Plan prepared by an Engineer in accordance with industry best practices.	Licensee applied for Landfill expansion. Plans submitted under Part F, Item 11.
J,6	The Licensee shall implement the Plan referred to in Part J, Item 1 as and when approved by the Board.	Subject of amendment request. Minor issue of wording.
J,8	Further to this Part, the Licensee shall submit to the Board for approval 6 months following notification of final closure, a Final Abandonment and Restoration Plan	Not yet applicable.

	completed by an Engineer in accordance with Part F, Item 3.	
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ANY OTHER RELEVANT LICENSING INFORMATION

Inspector's Direction issued to Licensee on two (2) occasions since Licence 3AM-IQA0611 was issued. The first, on October 6, 2006 was issued regarding the deposit of waste water from the solid waste management area. The second, on March 6, 2007 was issued regarding the uncontrolled release of sewage.

Prepared by:

Stephen Lines
Tunaley Lines & Associates

For:
David Hohnstein
A/Director Technical Services
Nunavut Water Board