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File No.: **1BW-DUV0911** 

October 26, 2009

John Stecyk, P.Eng.
Small Craft Harbours Branch
Central and Arctic Region
Department of Fisheries and Oceans Canada
501 University Crescent
Winnipeg, MB R3T 2N6

Email: john.stecyk@dfo-mpo.gc.ca

RE: NWB Licence No. 1BW-DUV0911

Dear Mr. Stecyk,

Please find attached Licence No. **1BW-DUV0911** issued to the Department of Fisheries and Oceans Canada, Small Craft Harbours Branch, Central and Arctic Region by the Nunavut Water Board (NWB) pursuant to its authority under Article 13 of the *Agreement between the Inuit of the Nunavut Settlement Area and Her Majesty the Queen in Right of Canada*. The terms and conditions of the attached Licence related to water use and waste disposal are an integral part of this approval.

If the Licensee contemplates the renewal of this Licence, it is the responsibility of the Licensee to apply to the NWB for its renewal. The past performance of the Licensee, new documentation and information, and issues raised during a public hearing, if the NWB is required to hold one, will be used to determine the terms and conditions of the Licence renewal. Note that if the Licence expires before the NWB issues a new one, then water use and waste disposal must cease, or the Licensee will be in contravention of the *Nunavut Land Claims Agreement* (NLCA) and the *Nunavut Waters and Nunavut Surface Rights Tribunal Act* (NWNSRTA). However, the expiry or cancellation of a licence does not relieve the holder from any obligations imposed by the licence. Where a renewal of this Licence is required, the NWB recommends that an application be filed at least three (3) months prior to the Licence expiry date.

If the Licensee contemplates or requires an amendment to this licence, the NWB may decide, in the public interest, to hold a public hearing. The Licensee should submit applications for amendment as soon as possible to give the NWB sufficient time to go through the amendment process. The process and timing may vary depending on the scope of the amendment; however a minimum of sixty (60) days is required from time of acceptance by the NWB. It is the responsibility of the Licensee to ensure that all application materials have been received and

acknowledged by the Manager of Licensing.

The NWB strongly recommends that the Licensee consult the comments received by interested persons<sup>1</sup> on issues identified. This information is attached for your consideration.

If the Licensee chooses to assign the Water Licence to another party or entity, an assignment application would be required prior to the expiry of this Licence. Otherwise the complete abandonment and restoration of the undertaking will be required prior to the expiry of the Licence.

Sincerely,

Thomas Kabloona

Nunavut Water Board, Chair

TK/tla

Enclosure: Licence No. 1BW-DUV0911

Comments INAC, EC and GN-CLEY

cc: Distribution – Qikiqtani

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<sup>&</sup>lt;sup>1</sup> Indian and Northern Affairs Canada (INAC), October 16, 2009; Environment Canada (EC), October 18, 2009 and the Government of Nunavut – Department of Culture, Language, Elders and Youth (GN-CLEY), October 6, 2009.

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## **DECISION**

## **LICENCE NUMBER: 1BW-DUV0911**

This is the decision of the Nunavut Water Board (NWB) with respect to an application for a new Water Licence dated September 18, 2009 made by:

## FISHERIES AND OCEANS CANADA SMALL CRAFT HARBOURS BRANCH, CENTRAL AND ARCTIC REGION

to allow for the construction of a watercourse crossing and drainage redirection for the Pangnirtung Small Craft Harbour Project, located at the Hamlet of Pangnirtung within the Qikiqtani Region, Nunavut generally located at the approximate geographical coordinates as follows:

Duval River Crossing 69°9'2.87"N; 65° 41'30.01"W Drainage redirection 66°8'40"N; 65° 42'55"W

## **DECISION**

After having been satisfied that the application did not require a Land Use Plan conformity determination and that it was exempt from Screening by the Nunavut Impact Review Board, the NWB decided that the application could proceed through the regulatory process. In accordance with S.55.1 of the *Nunavut Waters and Nunavut Surface Rights Tribunal Act (NWNSRTA)* and Article 13 of the *NLCA*, public notice of the application was given and interested persons were invited to make representations to the NWB.

After reviewing the submission of the Applicant and considering the representations made by interested persons, the NWB, having given due regard to the facts and circumstances, the merits of the submissions made to it and to the purpose, scope and intent of the *NLCA* and of the *NWNSRTA*, waived the requirement to hold a public hearing, and determined that:

Licence Number 1BW-DUV0911 be issued under Motion No. 2009-11-3, subject to the terms and conditions contained therein.

SIGNED this 23<sup>rd</sup> day of October 2009 at Gjoa Haven, NU.

Thomas Kabloona

Nunavut Water Board, Chair

TK/tla

## **LICENCE NUMBER: 1BW-DUV0911**

## **INTRODUCTION**

The Department of Fisheries and Ocean's Canada, Small Craft Harbours Branch, Central and Arctic Region (DFO) intends to construct a temporary crossing where the Duval River outlets into the bay east of the Hamlet of Pangnirtung, NU. The crossing will be made from three steel culverts placed on the river bed with backfill as described in drawing No. 0913451001A004 submitted with the application information. Each culvert is 1.8 metres in diameter and approximately 40 metres long. The crossing will join an existing roadway using approximately 3,500 cubic metres of crushed rock. The crossing is required for the transportation of quarry material from an existing quarry to the Pangnirtung harbour, which is under construction.

In addition, an intermittent drainage feature that outlets into the existing harbour will be redirected along the existing road where it will flow into an existing culvert located next to the Hamlet Office. This action is required to allow for dredging activities at the drainage feature's current outlet. Once the harbour has been constructed this drainage feature will be redirected through a new culvert positioned under the gravel road followed by an open channel through the marshalling area to the northeast of the existing breakwater.

## PROCEDURAL HISTORY

On September 18, 2009, the NWB received a new application for a Type "B" water licence from DFO for the Duval River crossing in conjunction with the Pangnirtung Small Craft Harbour Project. The application consisted of the following documents:

- ➤ Water Licence Applications received September 18, 2009
- Culvert Bridge Ouestionnaire received September 18, 2009
- ➤ Inuktitut & English Summary received September 18, 2009
- Transport Canada determination Navigable Waters Project Act received September 18, 2009
- ➤ Google Photo Image received September 18, 2009
- NIRB Screening Decision on file dated August 20, 2009
- ➤ NPC Conformity on file dated September 3, 2009

Additional documents provided during the review period and on file include:

- ➤ Authorization for Works or Undertakings Affecting Fish Habitat, DFO October 3, 2009
- Pangnirtung Harbour Dredging Small Vessel Basin LOA, DFO October 2, 2009

On September 18, 2009, the application was distributed to parties for a thirty (30) day review and comment period. By October 18, 2009, comments had been received from Indian Northern Affairs Canada (INAC), Environment Canada (EC), and Government of Nunavut Department of Culture, Language, Elders and Youth (GN-CLEY).

#### LICENCE CONSIDERATIONS

The following section outlines the issues identified by the NWB and raised by interested persons during the review of the application. It provides the background on the terms and conditions imposed within the body of the licence.

## A. General Conditions

Term of Licence

The Licensee requested a Licence term of two (2) years to fully carry out the proposed project. There were no comments regarding the term requested. The NWB believes that the two (2) year term proposed is appropriate for the undertaking. The licence duration will allow the Licensee to develop, submit and implement the plans required under the licence to the satisfaction of the NWB and carry out the proposed activities during this period.

## **B.** Spill Contingency Planning

Both the Nunavut Impact Review Board (Screening Decision Item 10) and Indian and Northern Affairs Canada recommended that the Licensee be required to submit a Spill Contingency Plan (SCP) for the Project. The NWB generally requires that Licensees develop a SCP where the handling and storage of fuel and other petroleum products or chemicals is involved. The requirements for the SCP are outlined in Part F, item 1.

#### C. Construction

It is the NWB's policy to require construction drawings to be submitted prior to the commencement of construction. These drawings must be stamped and signed by a qualified engineer registered in Nunavut. INAC also presented this recommendation in its submission. The Licensee will be required to submit construction drawings to the NWB prior to any construction activity relating to the Duval River crossing and drainage diversion. This requirement is outlined in Part E, Item1.

Following construction, the Licensee is required to submit to the NWB, a Construction Summary Report. Again this requirement is standard in Licences issued for construction projects and was also identified by INAC. The Construction Summary Report requirement is outlined in Part E, Items 2 and 3. It must be submitted within ninety (90) days of completion of the construction of the Duval River crossing and drainage diversions, and include stamped asbuilt plans and record drawings, providing explanation to reflect any deviations from design and construction drawings taking into account construction and field decisions and how they may affect the performance of the engineered facilities.

## D. Abandonment and Restoration Plan

To ensure that undertakings are reclaimed in an appropriate manner, the NWB requires Licensees to submit an *Abandonment and Restoration Plan* (A&R Plan). The A&R Plan must

be submitted, within six (6) months of Licence issuance, to the NWB for review and approval. Although INAC requested that the A&R Plan be submitted before the issuance of the Licence, the NWB believes that the six (6) month period being allowed will preserve the Licensee's construction schedule while leaving sufficient time to review and approve the A&R Plan so it can be implemented prior to the expiration of the Licence in October of 2011.

## E. Monitoring

For consistency with similar licences issued by the NWB and to verify that the project has been carried out as planned in order to minimize impacts to freshwater, the NWB has imposed basic monitoring requirements to be undertaken by the Licensee during the construction and reclamation phases of the project. The monitoring requirements are outlined in Part H with, Item 8 requiring that monitoring results be submitted to the NWB as part of the Construction Summary Report outlined in Part E, Item 2.

## LICENCE NO. 1BW-DUV0911

Nunavut Water Board, Chair

Pursuant to the *Nunavut Waters and Nunavut Surface Rights Tribunal Act* and the *Agreement Between the Inuit of the Nunavut Settlement Area and Her Majesty the Queen in Right of Canada*, the Nunavut Water Board, hereinafter referred to as the Board, hereby grants to

## DEPARTMENT OF FISHERIES AND OCEANS CANADA SMALL CRAFT HARBOURS BRANCH, CENTRAL AND ARCTIC REGION

(Licensee)	ens britten, chitika into intelle region
of	
501 UNIVERSIT	Y CRESCENT, WINNIPEG, MB, R3T 2N6
(Mailing Address)	
	e right to alter, divert or otherwise use water and/or dispose of actions and conditions contained within this Licence:
Licence Number	1BW-DUV0911
Water Management Area	NUNAVUT 05
	G SMALL CRAFT HARBOUR PROJECT NIRTUNG, QIKIQTANI REGION
Purpose WATER C	CROSSING AND DRAINAGE DIVERSION
Classification of Undertaking	INDUSTRIAL – TYPE "B"
Quantity of Water Not to Exceed	NO WATER USE AUTHORIZED
Date of Licence	OCTOBER 23, 2009
Expiry Date of Licence	OCTOBER 31, 2011
Dated this 23 <sup>rd</sup> day of October	· 2009 at Gjoa Haven, NU.
Thomas Kabloona	

## PART A: SCOPE, DEFINITIONS AND ENFORCEMENT

## 1. Scope

This Licence allows for the construction of a temporary crossing where the Duval River outlets into the bay east of the Hamlet of Pangnirtung. The crossing is required for the transportation of quarry material from an existing quarry to the Pangnirtung harbor in carrying out the Pangnirtung Small Craft Harbour Project. Also, an intermittent drainage feature that outlets into the existing harbour will be redirected along the existing road where it will flow into an existing culvert located next to the Hamlet Office. This action is required to allow for dredging activities at the existing drainage outlet. Once the harbour has been constructed this drainage feature will be redirected through a new culvert positioned under the gravel road followed by an open channel through the marshalling area to the northeast of the existing breakwater.

- a. This Licence is issued subject to the conditions contained herein with respect to the taking of water and the depositing of waste of any type in any waters or in any place under any conditions where such waste or any other waste that results from the deposits of such waste may enter any waters. Whenever new Regulations are made or existing *Regulations* are amended by the Governor in Council under the *Nunavut Waters and Nunavut Surface Rights Tribunal Act*, or other statutes imposing more stringent conditions relating to the quantity or type of waste that may be so deposited or under which any such waste may be so deposited, this Licence shall be deemed, upon promulgation of such Regulations, to be subject to such requirements; and
- b. Compliance with the terms and conditions of this Licence does not absolve the Licensee from responsibility for compliance with the requirements of all applicable Federal, Territorial and Municipal legislation.

## 2. **Definitions**

"Act" means the Nunavut Waters and Nunavut Surface Rights Tribunal Act;

"Addendum" means the supplemental text that is added to a full plan or report usually included at the end of the document and is not intended to require a full resubmission of the revised report.

"<u>Amendment</u>" means a change to original terms and conditions of this Licence requiring correction, addition or deletion of specific terms and conditions of the Licence; modifications inconsistent with the terms of the set terms and conditions of the Licence;

"Appurtenant Undertaking" means an undertaking in relation to which a use of water or a deposit of waste is permitted by a licence issued by the Board;

- "Board" means the Nunavut Water Board established under the *Nunavut Land Claims Agreement* and the *Nunavut Waters and Nunavut Surface Rights Tribunal Act*;
- "Engineer" means a professional engineer registered to practice in Nunavut in accordance with the Engineering, Geological and Geophysical Act (Nunavut) S.N.W.T. 1998, c.38, s.5;
- "Inspector" means an Inspector designated by the Minister under Sec. 85 (1) of the Act;
- "Licensee" means the holder of this Licence;
- "Modification" means an alteration to a physical work that introduces a new structure or eliminates an existing structure and does not alter the purpose or function of the work, but does not include an expansion;
- "Nunavut Land Claims Agreement (NLCA)" means the "Agreement Between the Inuit of the Nunavut Settlement Area and Her Majesty the Queen in right of Canada", including its preamble and schedules, and any amendments to that agreement made pursuant to it;
- "Regulations" means the *Northwest Territories Water Regulations sor/93-303 8th June, 1993*, omitting Section 5, Water Use or Waste Deposit Without a Licence;
- "Spill Contingency Plan" means a Plan developed to deal with unforeseen petroleum and hazardous materials events that may occur during the operations conducted under the Licence;
- "Waste" means, as defined in S.4 of the *Act*, any substance that, by itself or in combination with other substances found in water, would have the effect of altering the quality of any water to which the substance is added to an extent that is detrimental to its use by people or by any animal, fish or plant, or any water that would have that effect because of the quantity or concentration of the substances contained in it or because it has been treated or changed, by heat or other means.

## 3. **Enforcement**

- a. Failure to comply with this Licence will be a violation of the *Act*, subjecting the Licensee to the enforcement measures and the penalties provided for in the *Act*;
- b. All inspection and enforcement services regarding this Licence will be provided by Inspectors appointed under the *Act*; and
- c. For the purpose of enforcing this Licence and with respect to the use of water and deposit or discharge of waste by the Licensee, Inspectors appointed under the *Act*, hold all powers, privileges and protections that are conferred upon them by the *Act* or by other applicable law.

## **PART B: GENERAL CONDITIONS**

- 1. The Licensee shall notify the NWB of any changes in operating plans or conditions associated with this project at least thirty (30) days prior to any such change.
- 2. The Licensee shall, for all Plans submitted under this Licence, include a proposed timetable for implementation. Plans submitted, cannot be undertaken without subsequent written Board approval and direction. The Board may alter or modify a Plan if necessary to achieve the legislative objectives and will notify the Licensee in writing of acceptance, rejection or alteration of the Plan.
- 3. The Licensee shall, for all Plans submitted under this Licence, implement the Plan as approved by the Board in writing.
- 4. Every Plan to be carried out pursuant to the terms and conditions of this Licence shall become a part of this Licence, and any additional terms and conditions imposed upon approval of a Plan by the Board become part of this Licence. All terms and conditions of the Licence should be contemplated in the development of a Plan where appropriate.
- 5. The Licensee shall ensure a copy of this Licence is maintained at the site of operations at all times. Any communication with respect to this Licence shall be made in writing to the attention of:

## (a) Manager of Licensing:

Nunavut Water Board

P.O. Box 119

Gjoa Haven, NU X0B 1J0

Telephone: (867) 360-6338 Fax: (867) 360-6369

Email: licensing@nunavutwaterboard.org

## (b) Inspector Contact:

Manager of Field Operations, INAC Nunavut District, Nunavut Region

P.O. Box 100

Iqaluit, NU X0A 0H0

Telephone: (867) 975-4295 Fax: (867) 979-6445

- 6. The Licensee shall submit one paper copy and one electronic copy of all reports, studies, and plans to the Board. Reports or studies submitted to the Board by the Licensee shall include a detailed executive summary in Inuktitut.
- 7. The Licensee shall ensure that all documents or correspondence submitted by the Licensee to the Board are received and acknowledged by the Manager of Licensing.

8. This Licence is not assignable except as provided in Section 44 of the *Act*.

## PART C: CONDITIONS APPLYING TO THE PROTECTION OF WATER

- 1. The Licensee shall ensure that all fill material used is from an approved source and shall be free of contaminants.
- 2. The Licensee shall not cause erosion to the banks of any body of water and shall provide necessary controls to prevent such erosion.
- 3. Sediment and erosion control measures shall be implemented prior to and maintained during the operation to prevent entry of sediment into water.
- 4. To minimize impacts on surface drainage, the Licensee shall prepare all sites in such manner as to prevent rutting of the ground surface.
- 5. The Licensee shall undertake appropriate corrective measures to mitigate impacts on surface drainage resulting from the Licensee's operations.
- 6. The Licensee shall limit any in-stream activity to low water period. In-stream activity is prohibited during fish migration.
- 7. The Licensee shall locate stream crossings to minimize approach grades. Approaches shall be stabilized during construction and upon completion of the project, to control runoff, erosion and subsequent siltation to any water body.
- 8. Machinery is not permitted to travel up the stream bed and fording is to be kept to a minimum and limited to one area.
- 9. Equipment used should be well cleaned and free of oil and grease and maintained free of fluid leaks. The Licensee shall ensure that pollutants from machinery used during construction do not enter water.
- 10. Equipment storage holding areas should be located on gravel, sand or other durable land, a distance of at least thirty one (31) metres above the ordinary high water mark of any water body in order to minimize impacts on surface drainage and water quality.
- 11. The Licensee shall designate an area for the deposition of excavated and stockpiled materials that is at least thirty one (31) metres above the ordinary high water mark of any water body.
- 12. The Licensee shall not utilize any equipment or vehicles in the course of this undertaking unless the ground surface is in a state capable of fully supporting the equipment or vehicles without rutting or gouging. Overland travel of equipment or vehicles shall cease if rutting occurs.

## PART D: CONDITIONS APPLYING TO WASTE DISPOSAL

- 1. The Licensee shall not practice on-site land filling of domestic waste, unless otherwise approved by the Board in writing.
- 2. The Licensee shall provide to the Board, documented authorization from the community of Pangnirtung prior to the backhauling of any waste.
- 3. The Licensee shall backhaul and dispose of all hazardous wastes, waste oil and non-combustible waste generated through the course of the operation, in a licensed waste disposal site.
- 4. The Licensee shall maintain records of all waste backhauled and records of confirmation of proper disposal of backhauled waste. These records shall be made available to an Inspector upon request.

## PART E: CONDITIONS APPLYING TO CONSTRUCTION AND MODIFICATIONS

- 1. The Licensee shall provide to the Board, construction drawings of the Duval River crossing and drainage diversions prior to carrying out any construction and installation. These plans and drawings shall be stamped by an Engineer.
- 2. The Licensee shall, within ninety (90) days of completion of construction of the Duval River crossing, submit to the Board a Construction Summary Report along with stamped as-built plans and record drawings, providing explanation to reflect any deviations from construction drawings taking into account construction and field decisions and how they may affect the performance of the engineered facilities.
- 3. The Licensee shall, within ninety (90) days of completion of construction of the drainage diversions at the Marshalling area, submit to the Board a Construction Summary Report along with stamped as-built plans and record drawings, providing explanation to reflect any deviations from construction drawings taking into account construction and field decisions and how they may affect the performance of the engineered facilities.
- 4. The Licensee may, without written consent from the Board, carry out Modifications to the Project provided that such Modifications are consistent with the terms of this Licence and the following requirements are met:
  - a. the Licensee has notified the Board in writing of such proposed Modifications at least sixty (60) days prior to beginning the Modifications;
  - b. such Modifications do not place the Licensee in contravention of the Licence or the *Act*;
  - c. the Board has not, during the sixty (60) days following notification of the proposed Modifications, informed the Licensee that review of the proposal will

- require more than sixty (60) days; and
- d. the Board has not rejected the proposed Modifications.
- 5. Modifications for which all of the conditions referred to in Part G, Item 4 have not been met, can be carried out only with written approval from the Board.
- 6. The Licensee shall provide to the Board as-built plans and drawings of the Modifications referred to in this Part within ninety (90) days of completion of the Modification. These plans and drawings shall be stamped by an Engineer.

## PART F: CONDITIONS APPLYING TO SPILL CONTINGENCY PLANNING

- 1. In accordance with section 6(2)(g)(i) and (ii) of the Regulations, the Licensee shall, within thirty (30) days of issuance of this licence, keep on the site of operations a Spill Contingency Plan that will describe how petroleum products and hazardous materials will be handled, stored and disposed of, as well as how they will be contained and cleaned-up in the event of a spill. This Plan shall include the following:
  - a. The name, address and contact number for the person in charge, management or control of the contaminant (in this case, fuel oil and any other chemicals associated with the program);
  - b. The name and address and telephone number of the employer;
  - c. The name, job title and 24 hour contact number for the person or persons responsible for activating the spill plan;
  - d. A detailed description of the site, including its geographic location in UTM coordinates (map sheet number, Eastings and Northings) and geographic coordinates (Lat/Long);
  - e. A description of the type and amount of chemicals stored on site;
  - f. A description of the spill prevention measures to be undertaken in the handling, storage and disposal of petroleum products and hazardous materials;
  - g. Steps taken to report, contain, clean up and dispose of a spill;
  - h. A site map of sufficiently large scale to show the location of buildings, contaminants storage areas, sensitive areas such as water bodies, probable pathways of contaminant flow and general topography;
  - i. A description of the spill response training provided to employees who will respond to a spill;
  - j. An inventory and location of the response and clean up equipment available to the spill clean up team;
  - k. The means by which the spill plan is activated; and
  - 1. The date that the spill plan was prepared.
- 2. The Licensee shall prevent any chemicals, petroleum products or wastes associated with the project do not enter water. All sumps and fuel caches shall be located at a distance of at least thirty one (31) metres from the ordinary high water mark of any adjacent water body and inspected on a regular basis.

- 3. The Licensee shall ensure any equipment maintenance and servicing be conducted only in designated areas and shall implement special procedures (such as the use of drip pans) to manage motor fluids and other waste and contain potential spills.
- 4. The Proponent shall use secondary containment or a surface liner (drip pans, fold-a-tanks, etc) at all fuel-transfer and refueling stations.
- 5. The Proponent shall ensure that an adequate supply of spill kits (minimum capacity of 205L), shovels, barrels, sorbents and pumps are maintained on site at all times.
- 6. The Proponent shall ensure that all on site personnel are properly trained in fuel and hazardous waste handling procedures and spill response procedures.
- 7. If during the term of this Licence, an unauthorized discharge of waste occurs, or if such a discharge is foreseeable, the Licensee shall:
  - a. Employ the Spill Contingency Plan;
  - b. Report the spill immediately to the 24-Hour Spill Line at (867) 920-8130 and to the Inspector at (867) 975-4295; and
  - c. For each spill occurrence, submit to the Inspector, no later than thirty (30) days after initially reporting the event, a detailed report that will include the amount and type of spilled product, the GPS location of the spill, and the measures taken to contain and clean up the spill site.

# PART G: CONDITIONS APPLYING TO ABANDONMENT AND RESTORATION OR TEMPORARY CLOSING

- 1. The Licensee shall submit to the Board for approval, an Abandonment and Restoration Plan for the Duval River crossing and drainage diversion, within six (6) months of Licence issuance, that includes planned procedures for the removal of culverts, mitigation and monitoring measures to be employed for the protection of water, disposal of materials removed from the crossing(s) and a schedule and implementation plan for the timely removal of the temporary infrastructure.
- 2. The Licensee shall complete all restoration work detailed in the Abandonment and Restoration Plan prior to the expiry of this Licence.
- 3. The Licensee shall carry out progressive reclamation of all components of the project no longer required for the Licensee's operations.
- 4. The Licensee shall remove from the site, all infrastructure and site materials prior to the expiry of this Licence.
- 5. In order to promote growth of vegetation and the needed microclimate for seed deposition, all disturbed surfaces shall be prepared by ripping, grading, or scarifying the surface to conform to the natural topography.

- 6. Areas that have been contaminated by hydrocarbons from normal fuel transfer procedures shall be reclaimed to meet objectives as outlined in the Government of Nunavut's Environmental Guideline for Site Remediation, January 2002. The use of reclaimed soils for the purpose of back fill or general site grading may be carried out only upon consultation and approval by the Government of Nunavut, Department of Environment and an Inspector.
- 7. All disturbed areas shall be contoured and stabilized upon completion of work and restored to a pre-disturbed state.

## PART H: CONDITIONS APPLYING TO THE MONITORING PROGRAM

- 1. The Licensee shall monitor all activities for signs of erosion.
- 2. The Licensee shall obtain a digital photographic record of the water crossing before, during and after construction has been completed.
- 3. The Licensee shall, during periods of flow, conduct water quality testing immediately upstream and downstream of the Duval River crossing site prior to construction, weekly during construction and upon completion for the following parameters:

pH Temperature
Conductivity Total Suspended Solids
Total Oil and Grease

- 4. Licensee shall, during periods of flow, conduct water quality testing immediately upstream and downstream of the Duval River crossing site prior to decommissioning of the crossing, weekly during decommissioning activity and upon completion for the parameters indicated in Part H, Item 3.
- 5. All sampling, sample preservation and analyses shall be conducted in accordance with methods prescribed in the current edition of *Standard Methods for the Examination of Water and Wastewater*, or by such other methods approved by the Board in writing.
- 6. All analyses shall be performed in a laboratory accredited according to ISO/IEC Standard 17025. The accreditation shall be current and in good standing.
- 7. Additional monitoring requirements may be requested by the Inspector.
- 8. The Licensee shall include in the Construction Summary Report, required under Part E, Item 2 all data, monitoring results and information required by this Part.