



May 29, 2014

Your file - Votre référence
2BB-MEL0914

Our file - Notre référence
IQLAUIT-#802755

Megan Porter
Licensing Administrator Assistant
Nunavut Water Board
GJOA HAVEN, NU X0E 1J0

**Re: Aboriginal Affairs and Northern Development Canada Review of Agnico Eagle Mines Ltd.'s
Application to Renew Water Licence #2BB-MEL0914**

Dear Ms. Porter:

Thank you for your email of April 29, 2014, concerning the above mentioned application. A memorandum is provided for the Board's consideration. Comments and recommendations have been provided pursuant to Aboriginal Affairs and Northern Development Canada's mandated responsibilities under the *Nunavut Waters and Nunavut Surface Rights Tribunal Act* and the *Department of Indian Affairs and Northern Development Act*.

Please do not hesitate to contact me by telephone at 867-975-4555 or email at david.abernethy@aadnc-aadnc.gc.ca for further information.

Sincerely,

David Abernethy
Regional Coordinator
Water Resources Division
Resource Management Directorate
Aboriginal Affairs and Northern Development Canada
IQLAUIT, NU X0A 0H0

Encl.

c.c.: Murray Ball, Manager of Water Resources, AANDC Nunavut
Karen Costello, Director of Resource Management, AANDC Nunavut
Eva Paul, A/Manager of Field Operations, AANDC Nunavut
Phyllis Beaulieu, Manager of Licensing, NWB



Memorandum

To: Megan Porter, Nunavut Water Board

From: David Abernethy, Aboriginal Affairs and Northern Development Canada

CC: Murray Ball (AANDC), Karen Costello (AANDC), Eva Paul (AANDC), and Phyllis Beaulieu (NWB)

Date: May 29, 2014

Re: **Water Licence Renewal Application, #2BB-MEL0914**

Licensee: Agnico Eagle Mines Ltd.
Project: Meliadine Advanced Exploration Project
Region: Kivalliq

Comments:

A. Background

On April 29, 2014, the Nunavut Water Board (NWB) provided notification of Agnico Eagle Mines Ltd.'s (the "Licensee") application to renew Water Licence #2BB-MEL0914 in support of their Meliadine Advanced Exploration Project. The application specifically requests the authorization of a landfarm for the treatment of petroleum hydrocarbon impacted soils.

Interested parties were asked to review this application and provide comments by May 29, 2014.

B. Results of review

On behalf of Aboriginal Affairs and Northern Development Canada (AANDC), the following comments and recommendations are provided:

1.	<p>Issue: Proposed licence term</p> <p>Comment: The Licensee has requested that the licence be renewed for ten years.</p> <p>Recommendation: Renewing the licence term for ten years is reasonable.</p>
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2.	<p>Issue: Proposed landfarm facility and management plan</p> <p>Comment: The Licensee intends to use a bermed and lined area that was formerly used to store fuel bladders as a landfarm facility. The facility's management plan states that the Licensee's aim is to treat soil to the agricultural/wild land criteria for coarse-grained soils included in the Government of Nunavut's Department of Environment's March 2009 <i>Guidelines for Site Remediation</i>. If the criteria cannot be achieved the industrial criteria will be applied. Soils that satisfy the agricultural/ wild land criteria will be stockpiled on the operations pad for site works or reclamation activities and soils that meet the industrial criteria will be stockpiled at the same location for future use on the pad or in the project's decline area. Collected effluent will not be released until it can satisfy the criteria specified in Part D, Item 17 of the licence which apply to bermed fuel containment facilities and contaminated soil storage area.</p> <p>Recommendation: The proposed landfarm will provide a means to remediate petroleum hydrocarbon impacted soils that are suitable for on-site treatment. The soil treatment, effluent quality limits, and operations and management practices included in the management plan are reasonable. AANDC has no issue with the NWB approving this facility and its management plan.</p>
3.	<p>Issue: Management of leachate and surface drainage reporting from the landfill</p> <p>Comment: The Licensee plans to construct a landfill for the disposal of non-salvageable and non-hazardous solid wastes. The proposed landfill will be located in an area where the future tailings and waste rock storage facilities will be situated should a gold mine be developed. The landfill has a four year design life. The landfill will regularly be covered with non-potentially acid generating waste rock and is expected to have leachate with low ionic strength (dilute) due to the controls on what types of waste that can be accepted in the facility and the use of an incinerator for the management of organic waste. As a result, the Licensee recommends that site specific leachate management is not required. It is not clear where landfill leachate and surface water drainage will report to and whether the water quality of receiving water bodies will be sampled monitored.</p> <p>Recommendation: The Licensee should provide further details on how it will manage landfill leachate and surface water drainage. The quality of water flowing from the landfill and to downstream containment areas and/or receiving water bodies should be regularly monitored. AANDC recognizes that the landfill management plan is conceptual and acknowledges the Licensee's statements that efforts will be made as part of the overall site design for water to drain into collection areas that will be monitored (section 1.3).</p>



4.	<p>Issue: Reclamation security</p> <p>Comment: The Licensee has requested that water licence reclamation security remain at \$639,000 (application form). This amount has been furnished to the Minister of Indian Affairs and Northern Development Canada in the form of an irrevocable standby letter of credit. In addition, the Licensee has furnished security in the amount of \$950,000 with the Kivalliq Inuit Association. It should be noted that the January 6, 2011 Licence Amendment #3, "Extension of Underground Bulk Sampling Program," states that the NWB will require the Licensee to revise its security estimate prior to commencing the planned underground extension program. In preparation for this program the Licensee's August 2013 Closure and Reclamation Plan includes a total reclamation estimate of \$1,489,082 using the Reclamation Cost Estimating Model – Version 6.1 (the Reclaim Model).</p> <p>Recommendation: AANDC wants to work cooperatively with the Kivalliq Inuit Association to address reclamation security for this undertaking. It is recommended that the total security amount be evaluated through a workshop with all interested parties during year one of the renewed licence.</p>
5.	<p>Issue: Placement of ore in box cut that leads to the portal entrance as a closure method</p> <p>Comment: Section 7 of the August 2013 Interim Reclamation and Closure Plan states that the 150,406 m³ ore stockpile can be deposited in the box cut that leads to the portal entrance, if required, as a closure method. The Licensee would encapsulate the ore with "at least two metres of waste rock/overburden/glacial materials to ensure that the buried materials are below the active layer and remain frozen year-round. The area would be contoured to have positive drainage to prevent any ponding of water over the buried material." Furthermore, the Licensee has installed five thermistors in this area to monitor existing ground temperatures.</p> <p>Recommendation: The proposed placement of ore in the box cut and subsequent encapsulation with suitable fill material should prevent the development of acid rock drainage conditions. Prior to carrying out such an activity the Licensee should provide engineer design drawings (stamped and signed by a professional engineer of Nunavut) along with a monitoring program that includes thermal monitoring to assess freeze back conditions.</p> <p>It is recognized that the Licensee is proposing to develop a mine in the near future and that the method of handling potentially acid generating ore and waste rock during the project's eventual closure phase may be revised. AANDC looks forward to reviewing future revisions to this plan</p>

Prepared by David Abernethy