Our reference File #9545-2-2.2AM.MEAA CIDMS #393822

March 24, 2010

Richard Dwyer Licensing Administrator Nunavut Water Board Gjoa Haven, Nunavut X0E 1J0 Your reference 2AM-MEA0815

Sent Via Email

Dear Richard,

Subject Water License #2AM-MEA0815, Agnico-Eagle Mines Ltd.,

Meadowbank Gold Project, Kivalliq Region, Amendment

**Application (Fuel Tank Farm Expansion)** 

Please be advised that on behalf of Indian and Northern Affairs Canada, I have completed a review of the above referenced Agnico-Eagle Mines Ltd. submission to the Nunavut Water Board.

A Technical Review Memorandum (attached) is provided to the Board for consideration.

Should you have any questions regarding this submission, feel free to contact me at 867 975-4555 or <a href="mailto:david.abernethy@inac-ainc.gc.ca">david.abernethy@inac-ainc.gc.ca</a>.

Regards,

David W. Abernethy
Water Resources Regional Coordinator
Operations Directorate, Nunavut Regional Office
Indian and Northern Affairs Canada
Iqaluit, Nunavut
X0A 0H0

Attached.

Cc: Lou-Ann Cornacchio, INAC Water Resources Manager

Peter Kusugak, Manager of Field Operations



## TECHNICAL REVIEW MEMORANDUM

Date: Mar. 24/10

To: Richard Dwyer, Nunavut Water Board

From: David Abernethy, Indian and Northern Affairs Canada

Re: Water License #2AM-MEA0815, Agnico-Eagle Mines Ltd.,

Meadowbank Gold Project, Kivalliq Region, Amendment

**Application (Fuel Tank Farm Expansion)** 

## A. PROJECT DESCRIPTION

On Mar. 1/10 the Nunavut Water Board (NWB or Board) distributed Agnico-Eagle Mines Ltd.'s (AEM) Feb. 5/10 application to amend their Type A license, #2AM-MEA0815, to allow for the expansion of their Baker Lake Marshalling Area Bulk Fuel Storage Facility. The NWB has requested representations from interested parties on or before Apr. 1/10.

The NWB's Oct. 13/09 letter to AEM stated that when reviewing their Jul. 30/09 request for modification under Part G, Item #1 of their license to increase this facility's fuel storage capacity from 40 million litres (ML) to 60 ML of diesel fuel and the storage of 2 ML of Jet-A fuel it was determined that the proposed modification is not consistent with the definition provided under Schedule A: Scope, Definitions, and Enforcement, of the license. This definition states,

"Marshalling Area Bulk Fuel Storage Facility," means the facility, constructed to contain a nominal capacity of approximately twenty (20) million litres of diesel fuel and all associated infrastructure, as described in the Application dated Apr. 8/07 and all supporting documentation.

As a result, AEM was notified that they must submit a license amendment application for this undertaking.

When refining their estimate of annual operating supply requirements, AEM determined that Cumberland Resources Ltd.'s (previous project proponent) underestimated the electrical power requirements for the planned 8,500 ton per day (TPD) mill. The project's current diesel fuel capacity is 45.6 ML (combined between the mine site and the Baker Lake tank farm). This quantity will not meet the anticipated annual diesel fuel requirement of 65 ML (estimate varies annually based on mine plan).

The proposed 2 ML Jet-A fuel storage tank is required for the refueling of Boeing 737 aircraft that will service the mine-site following the expansion of the Meadowbank airstrip.

Included in AEM's submission are Drawings VD2259-BKL 100 – 106 and Nov. 30/09 Expansion of Fuel Storage Facilities Technical Specifications Document in response to an information request included in the NWB's Oct. 13/09 letter. More specifically, the NWB requested,

- Design stamped and signed for Construction drawings showing details of the facility expansion overall site plans, grading details, pad and backfill details, profiles, and cross-sections and details; and,
- Design specifications including information on construction material that meets the requirements of Part D, Item #8, geotechnical concerns, liner specifications, or other secondary containment requirements suitable for the bulk storage of fuel products.

AEM has noted that the expanded facility will comply with license requirements, including Part D, Item #36 which requires bulk fuel storage facilities to be constructed and operated in accordance with all applicable legislation and industry standards, including the Canadian Council of Ministers of the Environment 2003 Environmental Code of Practice for Aboveground and Underground Storage Tank Systems Containing Petroleum and Allied Petroleum Products and the 1995 National Fire Code. Pending a license amendment, AEM will revise their Dec. 2009 Baker Lake Bulk Fuel Storage Facility Environmental and Performance Monitoring Plan (Part I, Item #17 License requirement) and their Nov. 2009 Emergency Response Plan (Part H, Item #1 License requirement) to take into account an expansion to this facility.

## B. ENVIRONMENTAL IMPACT OF THE PROPOSED UNDERTAKING

An expansion to the Baker Lake Marshalling Area Bulk Fuel Storage Facility will result in an increase in green-house gas emissions due to an increase in fuel consumption from the mine site's power plant, fuel delivery requirements (barge and truck), and the use of Boeing 737 aircraft. There will be no increase in the anticipated amounts of tailings and waste rock generated by mining operations.

## C. RESULTS OF REVIEW

On behalf of Indian and Northern Affairs Canada (INAC) I am providing the following comments / recommendations to the Board for their consideration,

 The submitted license amendment application addresses the information requirements (stated above) provided in the NWB's Oct. 13/09 letter to AEM.

- Upon review of the NWB's public registry there is no record of any license amendment applications for the previous increase in the Baker Lake Marshalling Area Bulk Fuel Storage Facility's diesel fuel capacity from 20 to 40 ML. The current license amendment application will bring AEM into compliance by setting the fuel storage capacity to the amount required for the Meadowbank Gold Project's operation.
- Any hazardous material spills resulting at the Baker Lake Marshalling Area Bulk Fuel Storage Facility or associated with the delivery of fuel will be addressed through the project's Spill Contingency Plan, Emergency Response Plan, and Hazardous Materials Management Plan. These provisions provide confidence that procedures are in place to protect water resources from spill occurrences.

Prepared by David Abernethy

Cc: Lou-Ann Cornacchio, INAC Water Resources Manager Peter Kusugak, Manager of Field Operations