May 15, 2014

Your file - Votre reference 2AM-MEA0815

Our file - Notre reference IQLAUIT-#799165

Phyllis Beaulieu Manager of Licensing Nunavut Water Board GJOA HAVEN, NU X0E 1J0

Re: Aboriginal Affairs and Northern Development Canada Review of Agnico Eagle Mines Ltd.'s 2013 Monitoring Report for the Meadowbank Gold Mine

Dear Ms. Beaulieu:

Thank you for your email of April 15, 2014, concerning the above mentioned annual report. A memorandum is provided for the Board's consideration. Comments and recommendations are provided for the Nunavut Water Board's consideration pursuant to the Department'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 <u>david.abernethy@aandcaadnc.gc.ca</u> for further information.

Regards,

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

Encl.

c.c.: Murray Ball, Manager of Water Resources, AANDC Nunavut Erik Allain, Manager of Field Operations, AANDC Nunavut Megan Porter, Licensing Administrator Assistant, NWB

Memorandum

To: Phyllis Beaulieu, Nunavut Water Board

From: David Abernethy, Aboriginal Affairs and Northern Development Canada

CC: Murray Ball (AANDC), Erik Allain (AANDC), and Megan Porter (NWB)

Date: May 15, 2014

Re: 2013 Annual Report, Water Licence #2AM-MEA0815

Proponent: Agnico Eagle Mines Ltd.
Project: Meadowbank Gold Mine

Comments:

A. Background

On April 15, 2014, the Nunavut Water Board (NWB) provided notification that Agnico Eagle Mines Ltd.'s (AEM) 2013 Annual Report is available for review on their online public registry. This report was prepared pursuant to Part B, Item 5 of the Meadowbank Gold Mine's Type 'A' Water Licence, #2AM-MEA0815. Interested parties were asked to review this report and provide comments by May 15, 2014.

B. Results of review

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

1. Approval of revised management plans

Comment:

Three updated management plans are included as supporting documentation to the annual report: (i) an Updated Mine Waste Rock and Tailings Management Plan; (ii) a 2013 Water Management Plan and Report; and (iii) an Interim Closure and Reclamation Plan. AANDC's did not perform a detailed review of these plans due to their technical nature. It is believed that these plans will also be included in AEM's upcoming licence renewal application.

Recommendation:

The updated management plans included in AEM's annual report should not be approved under the current annual report review due to their technical nature. Rather, these plans should be distributed for review as part of the upcoming licence renewal application. These plans are: (i) an Updated Mine Waste Rock and Tailings Management Plan; (ii) a 2013 Water Management Plan and Report; and (iii) an Interim Closure and Reclamation Plan.

2. 2013 Water Licence Amendment Application for Increased Water Usage

Comment:

On April 26, 2013, AEM applied to amend Part E, Item 3 of the licence to increase their project's annual 700,000 m³ freshwater consumption limit to 1,870,000 m³ in 2013 and 1,150,000 m³ from 2014 to 2018. This water will be used for domestic purposes, mining, milling, and associated uses. In 2013 the NWB facilitated a completeness review, technical review, and final written hearing of this application but to date has not issued a decision. Until the requested increase in water consumption is approved, AEM are in non-compliance with the above mentioned licence condition.

Recommendation:

The NWB should inform AEM and interested parties, in writing, of how they will process the 2013 water licence amendment application to allow increased water usage.

3. As-built drawings for East Dike non-contact seepage water discharge system

Comment:

According to section 8.1.12.3 of the annual report, the discharge of East Dike non-contact seepage water started on January 6, 2014. On July 3, 2013, the NWB approved AEM's April 23, 2013 notice of modification to Part F, Item 4 of the licence to include this seepage water as noncontact water effluent. Although comprehensive information pertaining to the activity was provided in AEM's notice of modification and an as-built drawing of the system installation is provided in Appendix B3 of the 2012 Annual Report, I believe that additional as-built plans and drawings detailing the piping and diffuser installation should be provided. I can't find this documentation on the NWB's public registry. Part G, Item 4 of the licence requires that as-built plans and drawing of licence modifications be provided to the NWB within 90 days of completion of the modification.

Recommendation:

AEM should provide an update on when all as-built plans and drawings associated with the East Dike non-contact seepage water discharge system will be provided to the NWB pursuant to Part G, Item 4 of the licence.

4. Surface water sample collection from all-weather road quarries

Comment:

According to section 5.1 (g) of the annual report AEM are proposing that, "unless there are significant changes during reclamation, it is recommended that quarry surface water sampling not be completed in the future as follow-up water sampling has not provided evidence of geochemical issues in the quarries." It is noted that this position is consistent with AEM's 2010 All-Weather Private Access Road Water Quality Management Report. Of the 22 quarries situated along the all-weather private access road, two are permanently flooded (Quarry 4 and 14) and one has seasonal pooling of water (Quarry 7). In March 2009, AEM provided a 2008 geochemical characterization study of the all-weather private access road and airstrip quarries. All of the

quarries were classified as unlikely to be acid generating and metal leaching. From 2008 to 2011 AEM collected and analyzed water quality samples from quarries where water accumulation was enough to warrant surface water collection and subsequent analysis.

Recommendation:

AANDC agrees with AEM's recommendation to not collect additional surface water quality samples from the all-weather private access road quarries unless there are significant changes during reclamation.

5. Technical review of certain monitoring components deferred to upcoming licence renewal application

Comment:

As can be expected, the scale of AEM's reporting requirements is comprehensive so as to ensure that any impacts to water that may result from the deposit of wastes can be prevented and if necessary, mitigated. The licence requires the collection and analysis of certain monitoring data (technical in nature) that should be reviewed by subject matter experts. Examples of such monitoring requirements are:

- the Part E, Item 7 requirement to recalibrate the mine's Water Balance and Water Quality Model:
- the Part E, Item 8 requirement to compare the predicted water quantity and quality within the pits to the measured water quantity and quality;
- the Part I, Item 12 and 13 requirement to provide an annual geotechnical inspection report of all major earthworks and implementation plan; and
- the Schedule B, Item 1(b) requirement to compare the measured versus predicted performance of dikes and dams.

Recommendations:

Where considered necessary, AANDC will perform a technical review of certain (specialized) monitoring data during the upcoming licence renewal application. Value added feedback on issues such as the mine's Water Balance and Water Quality Model re-calibration and geotechnical inspection of major earthworks should be provided by subject matter experts.

Prepared by David Abernethy