



Environment and
Climate Change Canada

Environnement et
Changement climatique Canada

Environmental Protection Operations Directorate
Prairie & Northern Region
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Yellowknife, NT X1A 2P7

ECCC File: 6100 000 011/004
NWB File: 2AM-MRY1325

November 23, 2018

Via email at: licensing@nwb-oen.ca

Karén Kharatyan
Director, Technical Services
Nunavut Water Board
P.O. Box 119
Gjoa Haven, NU X0B 1J0

Dear Karen Kharatyan:

**RE: 2AM-MRY1325 – Baffinland Iron Mines Corporation – Mary River Phase 2
Development – Type A Water Licence Amendment Information Requests**

Environment and Climate Change Canada (ECCC) has reviewed the information submitted to the Nunavut Water Board (NWB) regarding the above-mentioned Type A Water Licence Amendment Information Requests and is submitting comments via email. ECCC's specialist advice is provided based on our mandate, in the context of the *Canadian Environmental Protection Act*, and the pollution prevention provisions of the *Fisheries Act*.

The Information Requests are provided in the attached table.

Should you require further information, please do not hesitate to contact me at (867) 669-4746 or Gabriel.Bernard-Lacaille@canada.ca.

Sincerely,

Susanne Forbrich
Regional Director

Attachment: Information Request Table

cc: Georgina Williston, Head, Environmental Assessment North (NT and NU)
ECCC Review Team
Lou Kamermans, Approvals Manager, Baffinland Iron Mines Corporation

Canada

www.canada.ca/en/environment-climate-change
www.canada.ca/fr/environnement-changement-climatique

Table 1. Environment and Climate Change Canada's Information Requests regarding Baffinland's Mary River Phase 2 Type A Water Licence Amendment 2AM-MRY1325 submitted to the Nunavut Water Board

IR #	IR Directed to	Subject	Reference	Issue/Concern	Information Request
1	Proponent	Use of contact water for dust suppression	<p>Application To Amend Type A Water Licence 2AM-MRY1325</p> <p>Table 4.1 Proposed Changes to Existing Mine Effluent Discharges</p> <p>Section 3.5</p>	<p>Section 3.5 Dust Suppression Water Use states that: <i>"[...]stormwater collected at the ore staging area will be used for dust suppression provided the effluent is confirmed to meet the mine effluent discharge limits in Table 10 (Part F, Item 24) of the Licence."</i> (Pdf page 33)</p> <p>This licence section requires monthly testing for metals, hydrocarbons, and annual acute lethality testing for all discharge.</p> <p>Table 4.1 lists the need for at least 7 new collection ponds to be constructed to manage runoff from ore stockpiles. Final discharge is either to Milne Inlet via Stormwater Ponds, or to use for dust suppression on the Tote Road.</p> <p>Table 6.1 Proposed Additional Monitoring Stations - lists two new Milne Port Stormwater ponds, and 3 drainage sites, plus the North Railway Ore Staging Stormwater Pond.</p> <p>There is no monitoring proposed for these new collection ponds. If the water is to be used for dust suppression the quality of the water should be confirmed. to ensure it meets licence criteria as stated above. Additionally, it will be important to ensure water quality is appropriate for release as there are stream crossings which may receive incidental amounts of this contact water.</p>	<p>ECCC requests that Baffinland Iron Mines Corporation (the Proponent)</p> <ol style="list-style-type: none"> 1. Clarify whether monitoring of collection pond water quality will be done prior to use for dust suppression and how this monitoring would be undertaken. 2. Identify whether it is feasible to consolidate collected runoff for management and water quality testing.

				Directing all ore stockpile runoff to the main stormwater ponds would consolidate testing prior to discharge for road watering or to Milne Inlet.	
2	Proponent	Crushing Feed Stockpile runoff management	<p>Application To Amend Type A Water Licence 2AM-MRY1325 Attachment 10.1 Mine Site Water Management Plan</p> <p>Section 5.1 Crushing Feed Stockpile</p>	Section 5.1 outlines water flows in the ore processing drainage area, and states that runoff will be captured in a settling pond and discharged once the water quality criteria has been met. It is not indicated where effluent will be discharged.	ECCC requests that the Proponent clarify where pond water in the ore processing drainage area will be discharged.
3	Proponent	Wastewater treatment capacity and redundancy	<p>Main Addendum - Project Description, Section 4.1.3 Page 4.6 TSD2 Water Licence application Project Description Appendix D Section 4.7</p> <p>Fresh Water Supply, Sewage and Wastewater Management Plan, Rev 5 (Issue date March 29, 2018)</p> <p>Sewage Treatment Plant O & M Manual</p>	<p>The Fresh Water Supply, Sewage and Wastewater Management Plan does not indicate whether there is sufficient capacity and redundancy in the wastewater treatment system for Phase 2 camp occupancy. The main Addendum document indicates that sewage treatment capacity will be expanded at the Milne camp but does not provide details. TSD 28 Management & Monitoring Plans identifies that an update will be needed to describe sewage disposal plans for temporary camps, but this does not cover the permanent expansion.</p> <p>ECCC notes that the recent modification request in the Water Licence Amendment Application includes a new sewage treatment plant, and that there will be an application for a third system (Section 4.7 Sewage Disposal). Details are not provided, nor any discussion of impacts of increased discharges.</p>	ECCC requests that the Proponent identify how additional camp wastewater treatment needs will be met, and if there will be any potential changes to receiving environments due to increased discharges as well as if additional mitigation measures will be required.