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NUNAVUT WATER BOARD  
NUNAVUT IMALIRIYIN KATIMAYINGI  
OFFICE DES EAUX DU NUNAVUT

File No.: **2BE-MRY1421**

April 17, 2014

Erik Madsen, Vice President  
Sustainable Development, Health, Safety & Environment  
Baffinland Iron Mines Corporation  
Suite 300 – 2275 Upper Middle Road East  
Oakville, Ontario L6H 0C3  
Email: [erik.madsen@baffinland.com](mailto:erik.madsen@baffinland.com)

**RE: NWB Renewal Licence No. 2BE-MRY1421**

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Dear Mr. Madsen:

Please find attached Licence No. **2BE-MRY1421** issued to Baffinland Iron Mines Corporation (BIMC or Licensee) by the Nunavut Water Board (NWB or Board) 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 (Nunavut Land Claims Agreement or NLCA)*. 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 Board considers it necessary to hold a public hearing before dealing with the renewal application) 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 Licence, then water use and waste disposal must cease, or the Licensee may be in contravention of the *Nunavut Land Claims Agreement* and the *Nunavut Waters and Nunavut Surface Rights Tribunal Act*. However, the expiry or cancellation of a licence does not relieve the holder from any obligations imposed by the licence<sup>1</sup>. The NWB recommends that an application for the renewal of this Licence be filed at least **three 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's 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,

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<sup>1</sup> Nunavut Waters and Nunavut Surface Rights Tribunal Act, s. 46.

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, are complete and are acknowledged by the Manager of Licensing.

The NWB strongly recommends that the Licensee consult the comments received from interested persons on issues identified. The NWB also recommends that the Licensee take into consideration the NIRB's recommendations where applicable and in the context of the activities and undertakings associated with this licence. Comments are attached for your consideration.<sup>2</sup>

Sincerely,



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Thomas Kabloona  
Nunavut Water Board  
Chair

TK/sj/mp

Enclosure:   **Licence No. 2BE-MRY1421**  
                  Comments – AANDC, EC, QIA  
                  NIRB's April 4, 2014 Screening Exemption Decision

Cc:     Qikiqtani Distribution List

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<sup>2</sup> Aboriginal Affairs and Northern Development Canada (AANDC), February 17, 2014; Environment Canada (EC), February 20, 2014; and the Qikiqtani Inuit Association (QIA), February 17, 2014.

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## DECISION

### RENEWAL LICENCE NO. 2BE-MRY1421

This is the decision of the Nunavut Water Board (NWB) with respect to an application dated December 19, 2013 for the renewal and amendment of a water licence made by

#### BAFFINLAND IRON MINES CORPORATION

to allow for the use of water and disposal of waste during camp operations and exploration-related activities that involve land-based and on-ice mineral drilling; mapping; sampling; geophysical and geochemical surveys; mechanical trenching and stripping of surficial overburden; activities in support of scientific and engineering studies to advance the Mary River Project including geotechnical investigation, geotechnical drilling; progressive reclamation programs; and fuel storage at the Mary River Exploration Project, located within the Qikiqtani Region, Nunavut generally at the following geographical coordinates:

Latitude: 72° 05' 00" N	Longitude: 77° 45' 00" W
Latitude: 72° 05' 00" N	Longitude: 81° 00' 00" W
Latitude: 69° 49' 00" N	Longitude: 81° 00' 00" W
Latitude: 69° 49' 00" N	Longitude: 77° 45' 00" W (Project Extents)

## **DECISION**

After having been satisfied that the application was in conformity with the North Baffin Regional Land Use Plan<sup>3</sup> and exempt from the requirement for screening as described within section 12.4.3 by the Nunavut Impact Review Board<sup>4</sup> in accordance with Article 12 of the *Nunavut Land Claim Agreement (NLCA)*, 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 (Act)* 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, 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 *Act*, waived the requirement to hold a public hearing, and determined that:

**Licence No. 2BB-MRY1114 and relevant amendments be renewed as Licence No. 2BE-MRY1421 subject to the terms and conditions contained therein (Motion #: 2014-B1-002).**

Signed this 17<sup>th</sup> day of April, 2014 at Gjoa Haven, NU.



Thomas Kabloona  
Nunavut Water Board, Chair  
TK/sj/mp

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<sup>3</sup> NPC Conformity Determination, February 14, 2014.

<sup>4</sup> NIRB Screening Exemption Decision, April 4, 2014.

## BACKGROUND

The Mary River Exploration Project (Project) is located on northern Baffin Island within the Qikiqtani Region of Nunavut. The Project is operated by Baffinland Iron Mines Corporation (BIMC) and is aimed at undertaking general exploration-type activities on the mining leases and mineral claims held by the company.

### File History

Licence NWB2MRY0406 was the first licence issued by the NWB to the original Mary River Project. The licence, which was issued on June 11, 2004 and expired June 30, 2006, allowed for the use of 80 cubic metres of Water *per* day and the deposit of waste in support of activities that included camp operations and exploration drilling. On August 4, 2005, the NWB amended Licence NWB2MRY0406 (Amendment No.1) to allow for an increase of up to 290 cubic metres of water *per* day and the operation and maintenance of the Tote Road for seasonal use, including maintenance and repairs when necessary during the months of March, April, and May.

Licence NWB2MRY0406 was renewed as 2BE-MRY0708 on February 20, 2007, with the expiry date set for December 31, 2008. The Licence allowed for the use of 475 cubic metres of water *per* day and the deposit of waste in support of camp operations and exploration drilling. Before expiry, the Licence was renewed and Amended (No. 1) as 2BB-MRY0710 on July 16, 2007. The amendment authorized the construction of an all-weather road and fuel containment structures, the implementation of a bulk-sample program, operation of camp facilities, and the treatment and disposal of domestic waste. On February 13, 2008, Licence 2BB-MRY0710 was amended to allow for the use of alternative water sources.

On April 5, 2011, the NWB renewed and amended Licence 2BB-MRY0710 as 2BB-MRY1114 for a three (3)-year term, with the expiration date set for April 5, 2014. The renewed Licence, 2BB-MRY1114, allowed for the use of 385 cubic metres of Water *per* day and the deposit of waste in support of specific activities at the various project sites, including a bulk-sample program, an all-weather road construction, land-based and on-ice exploration drilling programs, geotechnical drilling, and progressive reclamation programs, activities in support of engineering and scientific studies, ongoing maintenance to existing project infrastructure, camp operations, domestic waste treatment and/or disposal, fuel containment and other associated activities at the Mary River Project.

On June 12, 2013, the NWB issued a separate Licence, 2AM-MRY1325 (Type “A” Licence), to the Mary River Project for the development, operation, closure and reclamation of a proposed open-pit iron ore mine. Licence 2AM-MRY1325 included terms and conditions for some of the activities and facilities associated with Licence 2BB-MRY1114.

On December 4, 2013, the NWB issued a Board Initiated Amendment (BIA or Amendment No.1) to Licence 2BB-MRY1114, without a request or application from the licensee. The aim of the BIA was to remove duplicated activities and facilities that appear under the Type “A” Licence, 2AM-MRY1325, issued for mining activities. Under the BIA, the project’s name was changed from the Mary River Project to the Mary River Exploration Project to highlight the distinction between undertakings and activities associated with exploration and mining projects.

## Current Application

The Nunavut Water Board received, in three separate submissions, the following documents, from Baffinland Iron Mines Corporation, in support of an application to renew and amend Licence 2BB-MRY1114:

### December 19, 2014 Submission

- General Water Licence Application Form
- Appendix 1: Executive Summary in English
- Appendix 2: Executive Summary in Inuktitut
- Appendix 3: Executive Summary in French
- Appendix 4: Project Description
- Appendix 5: Type B Water Licence Compliance Review
- Appendix 6: List of the officers of the company and evidence of registration of the company name
- Appendix 7: Nunavut Impact Review Board (“NIRB”) screening decision, February 23, 2011
- Appendix 8: Nunavut Planning Commission (“NPC”) conformity determination, January 6, 2011

### January 15, 2014 Submission

- Appendix 9 – Map showing approximate location of proposed satellite camps
- Cover Letter accompanying Appendix 9
- Updated Project Description

### February 11, 2014 Submission

- Cover Letter outlining changes to the scope of the amendment renewal application submitted December 19, 2014.

The NWB distributed the application publicly for a thirty (30)-day comment period on January 17, 2014. On January 23, 2014, approximately six days following distribution of the Application, the Qikiqtani Inuit Association (QIA) requested<sup>5</sup> a ten (10) day extension to the comment deadline period. The NWB forwarded the QIA’s request to the Proponent for comments. The proponent in its response<sup>6</sup> to the Board indicated that it was not in favour of extending the comment deadline period. The QIA then asked the NWB to withdraw the QIA’s extension request<sup>7</sup>

On February 11, 2014, the NWB received correspondence<sup>8</sup> from the Proponent requesting changes to the scope of the licence renewal-amendment application to exclude any future bulk-sample program, sealift and laydown areas, winter roads, winter stream/river crossings, and air strips/ice strips.

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<sup>5</sup> Email from S.W. Bathory, QIA, to M. Porter, NWB, Re: RE: 140117 2BB-MRY1114 Baffinland Iron Mines Corporation-Amendment Renewal Application-Type B Qikiqtani Region, January 23, 2014.

<sup>6</sup> Letter from O. Curran, BIMC, to M. Porter, NWB, Re: Application for Renewal and Amendment of Type B Water Licence 2BB-MRY 1114 (the “Type B Water Licence”) – Request for Extension to Comment Period, February 4, 2014.

<sup>7</sup> Email from S.W. Bathory, QIA, to M. Porter, NWB, RE: QIA’s Request for Extension to Comment Period, February 6, 2012.

<sup>8</sup> Letter from A. Curran, BIMC, to A. Hansen, NIRB, C. Tickner, NPC, and D. Hohnstein, NWB, Re: Application for Renewal and Amendment of Type B Water Licence 2BB-MRY 1114, February 11, 2014.

On or before the February 17, 2013 comment-deadline period, the NWB received submissions from Aboriginal Affairs and Northern Development Canada (AANDC) and the Qikiqtani Inuit Association. Further, the Board received a submission from Environment Canada (EC) on February 20, 2014.

The NWB received the Nunavut Planning Commission's (NPC) conformity determination for the file on February 14, 2014 and the Nunavut Impact Review Board's (NIRB's) screening exemption decision for the file on April 4, 2014.

## **ISSUES**

The following sections provide background information relevant to the terms and conditions included in this Licence in the context of submissions received and the Board's rationale. It should be noted that under this renewal-amendment Licence, 2BE-MRY1421, the Board has removed or modified, where appropriate, terms and conditions associated with the previous iteration of the licence that are no longer applicable under this licence.

### *Licence Scope*

The Licensee requested in its application that the NWB remove licence terms and conditions that relate to any bulk-sample program(s) because it is anticipated that future bulk sampling will not be conducted under this licence. However, if bulk sampling is required in the future, the Licensee may apply to undertake such activities under a new licence or an amendment to this licence. For the purposes of making the changes in the scope of this current licence more apparent, the NWB has changed the sub-category of the Licence nomenclature from 2BB to 2BE.

### *Camp Facilities*

In accordance with the terms and conditions of this renewal-amendment Licence, the Licensee is allowed to construct seven (7) satellite camps in support of exploration activities. Each satellite camp established must be limited to a maximum capacity of 49 persons. The licensee is required to provide the Board and an Inspector with at least thirty (30) days' notice prior to establishing each of the satellite camps under this licence.

### *Term of the licence*

The Licensee requested a term of 25 years for the licence. Interveners in their submissions recommended the following with respect to the licence term:

- AANDC recommended 5 years
- QIA recommended a term not exceeding that of the Type A Licence (2025)
- EC recommend a term of 10-12 years

Taking into consideration the comments received and the Licensee's past compliance history, the Board has assigned a seven (7) year term for this licence, a slightly longer term than the term typically assigned to similar type licences. The duration of the licence term will provide stakeholders and the Board with the opportunity to continue to examine the overall performance of the licensee over time and prior to considering a renewal of the licence, allowing the Licensee to carry out the proposed exploration activities.

The Licensee should note that if it determines that it is necessary to renew or amend the Licence, the application for such a renewal or amendment should be filed at least three months prior to the Licence expiry date in order to allow adequate time for the Board to complete the renewal process prior to the expiry of the licence.

#### Security

In accordance with section 76(1) of the NWNSRTA, the Board may require an applicant, a Licensee or a prospective assignee to furnish and maintain security with the Minister in the form, of the nature, subject to such terms and conditions and in an amount prescribed by, or determined in accordance with, the Regulations or that is satisfactory with the Minister.

The Regulations allow the Board to fix the amount of security that the Licensee or applicant is required to furnish to an amount not exceeding the aggregate of the cost of:

- a. Abandonment of the undertaking;
- b. Restoration of the site(s) of the undertaking; and
- c. Any ongoing measures that may remain to be taken after the abandonment of the undertaking.

Under Licence 2BB-MRY1114 – Amendment No.1, the Board had accepted the reduction in the amount of security (from \$6,738,216.00 to \$1,250, 000.00) as proposed and posted by the Licensee, for potentially reclaiming of the reduced scope of activities and undertakings now associated with the Mary River Exploration Project and as contemplated by the Board’s Type “A” Decision<sup>9</sup> Although the scope of the Mary River Exploration Project has been further reduced under this renewal-amendment licence, the licensee and the stakeholders did not request changes to the security amount held under the licence. Therefore, the Board has kept the conditions related to the amount of security to be held under this renewal-amendment licence generally unchanged, except that the security amount may potentially be considered within the context of the Annual Security Review (ASR) for the Type “A” water licence.

#### Water Use

The Licensee has requested changes to the amount of water that is allocated for relevant activities under this licence, such that 49 m<sup>3</sup> per day of water will be allocated for domestic purposes associated with the satellite camps allowed under this licence while 250 m<sup>3</sup> per day will be allocated for drilling purposes. The total volume of water for all purposes under this licence will remain at 299 m<sup>3</sup> per day. For water bodies not identified in the Application and this licence, the Licensee is required to provide notice to an Inspector and the Board, at least fifteen (15) days’ prior to using water from such source(s).

#### Fuel Storage

The licensee has indicated in its Application that a combined maximum volume of 20 m<sup>3</sup> of fuel may be stored in double-walled tanks and barrels at the seven (7) satellite camps allowed under this licence. Conditions have been included in this licence renewal-amendment that requires Secondary Containment measures to be implemented for fuel stored in barrels and/or double-walled tanks. The Licence should note that a double-walled tank is not considered as Secondary Containment under the definition in this licence

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<sup>9</sup> See the discussion in the Type “A” Decision, at pp. 58-63.



### Bulk Sample Management Plan

The Board has removed all conditions related to the Bulk Sampling Program from the licence as requested by the licensee. The licensee indicated that it does not intend to conduct further bulk-sampling program(s) in the future on Deposit No.1.

### Drilling

The Board has not made any changes to the terms and conditions that apply to land-based, on-ice exploration and geotechnical drilling or drilling within thirty (30) metres of the ordinary High Water Mark for the purposes of conducting geotechnical investigations, provided that the Licensee informs the Board at least ten (10) days in advance of conducting geotechnical drilling and that the requirements under Part F in this Licence are satisfied.

### Management Plans

Under the Board Initiated Amendment (BIA) issued in December 2013, the Licensee was required to revise or update to the following management plans and submit to the Board for review or approval:

- Abandonment and Restoration Plan
- Bulk Sample Management Plan
- Environmental Monitoring Plan
- Spill Contingency Plan
- Quality Assurance/Quality Control Plan

It should be noted that prior to the issuance of the BIA, the Board had approved versions of the above-mentioned plans that were much broader in scope than required by the BIA. Therefore, relevant conditions were included in the BIA to reconcile the differences between the scope of the BIA and the Plans.

The Licensee requested in its Application that the Board consider including under this renewal-amendment Licence, requirements pertaining to plans associated with the BIA. While the Board did not provide any specific response to the proponent's request, the requirements related to plans that remain applicable to the scope of this renewal application have been included in this renewal-amendment licence. The Licensee should note that to satisfy the requirements related to management plans in this licence, stand-alone versions of applicable management plans are required instead of addenda to existing plans associated with the Type "A" licence, as recommended by intervening parties.

Specifically, the Licensee is required to submit the following management plans and reports under the requirements of this renewal-amendment licence issued by the Board for the Mary River Exploration Project

- *Abandonment and Restoration*  
In accordance with Part I, Item 1, the Licensee is required to submit an abandonment and restoration plan within sixty (60) days following the date of issuance of this renewal-amendment licence to better reflect the reduced scope of activities associated with the Mary River Exploration Project.

- *Spill Contingency Planning*

In accordance with Part G, Item 1 of this Amended Licence, the Licensee is required to submit to the Board for approval, a revised Spill Contingency Plan that reflects the reduced scope of activities under the Mary River Exploration Project.

- *Trenching Plan*

In accordance with Part F, Item 9 the Licensee is required to provide to the Board, for approval in writing, a Trenching Plan at least sixty (60) days prior to conducting any trenching activities allowed under this licence.



## NUNAVUT WATER BOARD WATER LICENCE RENEWAL

Licence No. 2BE-MRY1421

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 to

BAFFINLAND IRON MINES CORPORATION

(Licensee)

2275 UPPER MIDDLE ROAD EAST, SUITE 300, OAKVILLE, ON L6H 0C3

(Mailing Address)

hereinafter called the Licensee, the right to alter, divert or otherwise use water or dispose of waste for a period subject to restrictions and conditions contained within this Licence Amendment:

Licence Number/Type: 2BE-MRY1421 TYPE "B" RENEWAL/AMENDMENT

Water Management Area: GIFFORD (21) & ECLIPSE SOUND (48) WATERSHEDS

Location: MARY RIVER EXPLORATION PROJECT  
QIKIQTANI REGION, NUNAVUT

Classification: MINING UNDERTAKING

Purpose: DIRECT USE OF WATERS AND DEPOSIT OF WASTE

Quantity of Water use not to Exceed: TWO HUNDRED AND NINETY-NINE (299) CUBIC METRES  
PER DAY

Date of Licence Issuance: APRIL 17, 2014

Expiry of Licence: APRIL 16, 2021

This Licence amendment, recorded at Gjoa Haven, Nunavut, includes and is subject to the annexed conditions.

**Thomas Kabloona,**  
**Nunavut Water Board, Chair**

## **PART A: SCOPE, DEFINITIONS AND ENFORCEMENT**

### **1. Scope**

This renewal-amendment licence allows for the use of Waters and the deposit of Waste for a Mining undertaking, classified as per Schedule 1 of the *Regulations* at the Mary River Exploration Project, located approximately 160 kilometres south of Pond Inlet within the Qikiqtani Region of Nunavut.

- 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 Amendment 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;

**“Amendment”** 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;

**“Licence”** refers to Licence 2BE-MRY1421;

**“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*;

**“Effluent”** means treated or untreated liquid waste material that is discharged into the environment from any structures and/or facilities associated with this Amended Licence;

**“Engineer”** means a professional engineer registered to practice in Nunavut in accordance with the *Consolidation of Engineers and Geoscientists Act S. Nu 2008, c.2* and the *Engineering and Geoscience Professions Act S.N.W.T. 2006, c.16 Amended by S.N.W.T. 2009, c.12*;

**“Greywater”** means all liquid wastes from showers, baths, sinks, kitchens and domestic washing facilities, but does not include toilet wastes;

**“High Water Mark”** means the usual or average level to which a body of water rises at its highest point and remains for sufficient time so as to change the characteristics of the land (ref. Department of Fisheries and Oceans Canada, Operational Statement: Mineral Exploration Activities);

**“ICP Scan”** means the laboratory method for determining trace metals in water through Emission Spectroscopy using inductively coupled plasma (including from approximately 22 to 32 elements, depending on the laboratory performing the analysis);

**“Inspector”** means an Inspector designated by the Minister under Section 85 (1) of the *Act*;

**“Licensee”** means the holder of this Amended 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 *Nunavut Waters Regulations* SOR/2013-69 18<sup>th</sup> April, 2013;

**“Secondary Containment”** means an impermeable structure, external to and separate from primary containment, which prevents unplanned spills of hazardous materials and provides a minimum capacity of 110% of the original vessel. Where multiple vessels are stored within the containment, it must provide a minimum capacity equal to the sum of the largest vessel and 10% of the aggregate volume of all other vessels located in the containment. This structure shall also provide containment and control of hoses and nozzles;

**“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;

**“Sewage”** means all toilet wastes and greywater;

“**Sump**” is a structure or depression that collects, controls, and filters liquid waste before it is released to the environment. This structure should be designed to prevent erosion while allowing percolation of liquid waste;

“**Toilet Wastes**” means all human excreta and associated products, but does not include greywater;

“**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;

“**Water**” or “**Waters**” means waters as defined in section 4 of the *Act*.

### 3. **Enforcement**

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*;

- a. All inspection and enforcement services regarding this Licence will be provided by Inspectors appointed under the *Act*; and
- b. 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 Water use fees payable to the Receiver General for Canada shall be sent to the Board annually for the right to the use of Waters in accordance with s.12 of the *Regulations*.
2. The Licensee shall maintain financial security with the Minister, in the form that is satisfactory to the Minister, in the amount of one million, two hundred and fifty thousand (\$1,250,000.00) dollars in support of potential reclamation activities under this Licence.
3. The security deposit shall be maintained until such time as the Minister is satisfied that the Licensee has complied with all provisions of the approved Abandonment and Restoration Plan. This clause shall survive the expiry of this Licence Amendment.
4. The Licensee or other participants in the Annual Security Review (ASR), conducted in accordance with Schedule C of Licence 2AM-MRY1325, may consider the security amount furnished under Part B, Item 2 in the global context of the ASR.

5. The Licensee may submit to the Board, for approval, a written request for adjustment to the amount of security indicated under Part B, Item 2. The submission shall include supporting evidence to justify the request.
6. The Licensee shall file with the Board no later than March 31st of the year following the calendar year being reported, an Annual Report on the appurtenant undertaking, which shall contain the following information:
  - i. the monthly and annual volumes, in cubic metres, of freshwater used for all purposes under the Licence and obtained from sources located on, in or flowing through Crown Lands;
  - ii. the monthly and annual volumes, in cubic metres, of freshwater used for all purposes under the Licence and obtained from sources located on, in or flowing through Inuit-owned lands;
  - iii. A summary, including photographic records before, during and after any relevant construction activities or modifications and/or major maintenance work carried out on facilities under this Licence and an outline of any work anticipated for the next year;
  - iv. The geochemical analysis of drill cores as per Part F, Item 3;
  - v. Detailed discussion on the performance, installation, and evaluation, including the use of photographic record, of the primary and secondary containment functions used in fuel storage to safeguard impacts to freshwaters;
  - vi. Report all artesian flow occurrences as required under Part F, Item 6;
  - vii. A list of unauthorized discharges and a summary of follow-up action(s) taken;
  - viii. A brief description of follow-up action(s) taken to address concerns presented within inspection and compliance reports prepared by the Inspector;
  - ix. Updates in the form of an addendum or revisions to the Abandonment and Restoration Plan, and Spill Contingency Plan;
  - x. A description of all progressive and/or final reclamation work undertaken, including drill sites, presented with photographic records of site conditions before, during and after completion of operations;
  - xi. An updated estimate of the current restoration liability required under Part B, Item 2, based upon the results of restoration assessment, project development monitoring, and any changes or modifications to the project;
  - xii. A summary of public consultation/participation, describing consultation with local organizations and residents of the nearby communities, if any were conducted;

- xiii. A summary of any specific studies or reports requested by the Board, and a brief description of any future studies planned or proposed; and
  - xiv. Any other details on Water use or Waste disposal requested by the Board by November 1 of the year being reported.
7. The Licensee shall notify the Board of any changes in operating plans or conditions associated with this project at least thirty (30) days prior to any such change.
  8. The Licensee shall install and maintain flow meters or other such devices, or implement suitable methods required for the measuring of Water and Waste volumes, to be operated and maintained to the satisfaction of an Inspector.
  9. 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.
  10. The Licensee shall, for all Plans submitted under this Licence, implement the Plan as approved by the Board in writing.
  11. The Licensee shall review the Plans referred to in this Licence, as required by changes in operation and/or technology, and modify the Plan accordingly. Revisions to the Plans, including a record of revision, are to be submitted in the form of an Addendum within the Annual Report.
  12. 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.
  13. The Licensee shall post signs in the appropriate areas to identify the location of all Monitoring Stations designated under Part J. All signs shall be located and maintained to the satisfaction of an Inspector.
  11. 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@nwb-oen.ca](mailto:licensing@nwb-oen.ca)



(b) **Inspector Contact:**  
Manager of Field Operations, AANDC  
Nunavut District, Nunavut Region  
P.O. Box 100  
Iqaluit, NU X0A 0H0  
Telephone: (867) 975-4295  
Fax: (867) 979-6445

12. 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 with translation in Inuktitut.
13. The Licensee is responsible for ensure that any documents or correspondence submitted by the Licensee to the Board have been received and acknowledged by the Manager of Licensing.
14. This Licence is assignable as provided in s. 44 of the *Act*.
15. The expiry or cancellation of this Licence does not relieve the holder from any obligations imposed by the Licence as per s. 46 of the Act.

**PART C: CONDITIONS APPLYING TO WATER USE**

1. Licensee shall obtain all water for domestic camp use from sources proximal to each camp. Total camp water use shall not exceed forty-nine (49) cubic metres *per* day. Drill water shall be obtained from water source(s) proximal to the drilling targets, as outlined in the application, and shall not exceed 250 cubic metres per day. The volume of water for all purposed under this licence shall not exceed two hundred and ninety-nine (299) cubic metres *per* day.
2. The Licensee shall provide to the Board and an Inspector, at least fifteen (15) days' notice prior to the use of Waters from any sources not currently identified, for the purposes outlined under Part C, Item 1.
3. Streams cannot be used as a water source unless authorized and approved by the Board in writing.
4. The Licensee shall submit to the Board for approval in writing, at least thirty (30) days prior to the use of Water, in cases where the Licensee requires Water in sufficient volume that the source Water body may be drawn down, the following information: volume required, hydrological overview of the Water body, details of impacts, and proposed mitigation measures.
5. The Licensee shall equip all Water intake hoses with a screen of an appropriate mesh size to ensure that fish are not entrained and shall withdraw water at a rate such that fish do not become impinged on the screen.

6. The Licensee shall not remove any material from below the ordinary High Water Mark of any water body unless authorized.
7. The Licensee shall not cause erosion to the banks of any body of water and shall provide necessary controls to prevent such erosion.
8. The Licensee shall implement sediment and erosion control measures prior to and maintain such measures during the undertaking to prevent entry of sediment into Water.

**PART D: CONDITIONS APPLYING TO WASTE DISPOSAL**

1. The Licensee shall locate areas designated for waste disposal at a minimum distance of thirty-one (31) metres from the ordinary High Water Mark of any water body such that the quality, quantity or flow of Water is not impaired, unless otherwise approved by the Board in writing.
2. The Licensee shall not practice on-site landfilling or open-burn plastics, wood treated with preservatives, electric wire, Styrofoam, asbestos or painted wood so as to prevent the deposition of waste materials of incomplete combustion and/or leachate from contaminated ash residual, from impacting any surrounding Waters, unless otherwise approved by the Board in writing.
3. The Licensee is authorized to dispose of all acceptable food waste, paper waste and untreated wood products in an incinerator.
4. The Licensee shall provide to the Board with documented authorization from all communities in Nunavut receiving Wastes from the Mary River Exploration Project prior to any backhauling and disposal of wastes to those communities.
5. Licensee shall provide to the Board a copy of the written authorization received from the Licensee of 2AM-MRY1325 at least 30 days prior to backhauling waste from facilities and undertakings under this licence to facilities associated with Licence 2AM-MRY1325.
6. The Licensee shall backhaul and dispose of all hazardous wastes, waste oil and non-combustible waste generated through the course of operation at a licensed waste disposal facility.
7. 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 or the Board upon request.
8. The Licensee shall contain all greywater in a Sump located at a distance of at least thirty-one (31) metres above the ordinary High Water Mark of any Water body, at a site where direct flow into any Water body is not possible and no additional impacts are created, unless otherwise approved by the Board in writing.

9. The Licensee shall contain all toilet wastes in latrine pits or use incineration, chemical, portable or composting toilets. Latrine pits shall be located at a distance of at least thirty-one (31) metres above the ordinary High Water Mark of any Water body, treated with lime and covered with native material to achieve the pre-existing natural contours of the land prior to abandonment.

**PART E: CONDITIONS FOR CAMPS, ACCESS INFRASTRUCTURES AND OPERATIONS**

1. The Licensee is allowed to construct at most the seven (7) satellite camps referred to in the Project Description Document, dated January 15, 2014.
2. The Licensee is required to provide thirty (30) days' notice to the Board and an Inspector prior to constructing and operation of any of the camp facilities mentioned in Part E, Item 1.
3. The Licensee shall conduct all activities in such a way as to minimize impacts on surface drainage, and the Licensee shall immediately undertake corrective measures in the event of any impacts on surface drainage.
4. With respect to pad construction or other earthworks, the deposition of debris or sediment into or onto any Water body is prohibited. These materials shall be disposed at a distance of at least thirty-one (31) metres from the ordinary High Water Mark and in such a manner that they do not enter the Water. The Licensee shall prevent any chemicals or waste associated with the undertakings from entering any Water body.
5. The Licensee shall not cut any stream bank or remove any material from below the ordinary High Water Mark of any Water body.
6. The Licensee shall not do anything that will cause erosion to the banks of any body of Water and shall provide necessary controls to prevent such erosion.
7. The Licensee shall undertake appropriate corrective measures to mitigate impacts on surface drainage resulting from the Licensee's operations.
8. The Licensee shall limit any in-stream activity to low flow periods. In-stream activity is prohibited during fish migration.
9. 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.
10. Machinery is not permitted to travel up the stream bed and fording of any water body is to be kept to a minimum and limited to one area and a one-time event. Equipment used should be well cleaned and free of oil and grease and maintained free of fluid leaks.

11. The Licensee shall, during activities involving machinery fording the Water crossings, prevent pollutants from entering Water.
12. The Licensee shall only use fill material during construction that is from an approved source and shall be free of contaminants.
13. 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.
14. 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.
15. 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 F: CONDITIONS APPLYING TO DRILLING AND TRENCHING OPERATIONS**

1. The Licensee shall not conduct any land-based exploration drilling and trenching operations within thirty-one (31) metres of the ordinary High Water Mark of any water body, unless otherwise approved by the Board in writing.
2. The Licensee may for the purpose of any geotechnical investigations carry out drilling activities within thirty (30) metres of the ordinary High Water Mark of any Water body, provided that such activities are consistent with the terms of this Licence and a request has been submitted and received by the NWB, at least ten (10) days in advance of such drilling, that includes a thorough description of the proposed activities and the following:
  - a. An appropriate scaled site map, complete with approximate GPS coordinates of planned drilling locations and the associated Water bodies;
  - b. Locations of waste deposition, that are consistent with Part F, Item 4; and
  - c. Mitigation measures that are planned to be in place, prior to, during drilling and following if required to protect Waters.
3. The Licensee shall analyze the geochemical constituents of drill cores as follows:
  - a. That reflects actuality and is truly representative of the drilling program for all constituents that may impact waters as determined, and clearly qualified, by a Geochemist registered in Nunavut;
  - b. All assumptions, and any limitation to each assumption, in determining a representative sampling population reflecting actuality and the geochemical testing methods employed;

- c. Includes all raw data and an accompanying summary table of the geochemical analysis;
  - d. Define clear conclusions on the results of the geochemical analysis; and
  - e. Present the geochemical analysis in the Annual Report as required by Part B, Item 6(iv).
4. The Licensee shall dispose of all drill waste, including water, chips, muds and salts ( $\text{CaCl}_2$ ) in any quantity or concentration, from land-based drilling, in a properly constructed Sump or an appropriate natural depression located at a distance of at least thirty one (31) metres from the ordinary High Water Mark of any adjacent Water body, where direct flow into a Water body is not possible and no additional impacts are created.
5. Drill additives or mud shall not be used in connection with holes drilled through lake ice unless they are re-circulated or contained such that they do not enter the Water, or are demonstrated to be non-toxic.
6. If artesian flow is encountered, drill holes shall be immediately sealed and permanently capped to prevent induced contamination of groundwater or salinization of surface Waters. The Licensee shall report all artesian flow occurrences within the Annual Report to NWB, including the location (GPS coordinates) and dates.
7. For “On-Ice” drilling where drill additives are not being used, return water released must be non-toxic, and not result in an increase in total suspended solids in the immediate receiving waters above the Canadian Council of Ministers of the Environment Guidelines for the Protection of Freshwater Aquatic Life (i.e. 10 mg/L for lakes with background levels under 100 mg/L or 10% for those above 100 mg/L).
8. The Licensee shall establish water quality conditions prior to and upon completion of any drilling program through lake ice.
9. The Licensee shall submit to the Board for approval in writing, at least sixty (60) days prior to commencing any trenching activities, a stand-alone Trenching Plan that includes but not limited to the following:
  - Size and location (including GPS coordinates) of trenches;
  - Approximate dimensions (length, width, and depth) of each trench;
  - Approximate mass of extracted materials (overburden, waste, ore) from trenches;
  - Proposed mitigation measures for the prevention of the transport of sediments, blasting residues, fly rock and other materials, from the trench area to nearby water bodies;
  - Plans for disposal of any waste rock or overburden generated from the activity;
  - Projected volume and quality of water discharged from each trench and potential treatment required; and
  - The proposed monitoring program to be carried out on trench wastewater prior to discharge.

## **PART G: CONDITIONS APPLYING TO SPILL CONTINGENCY PLANNING**

1. The Licensee shall submit, to the Board for approval, a revised, stand-alone, Spill Contingency Plan within sixty (60) days from the date of issuance of this Licence. The revised Spill Contingency Plan shall be prepared in the format set out by the Consolidation of Spill Contingency Planning and Reporting Regulations (R-068-93) and must address the reduced scope of activities under this licence.
2. The Licensee shall prevent any chemicals, petroleum products or wastes associated with the project from entering 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 prevent any chemicals, petroleum products or wastes associated with the project from entering 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 Water body and inspected on a regular basis.
4. The Licensee shall conduct any equipment maintenance and servicing 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.
5. 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 approved 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.
6. The Licensee shall, in addition to Part H, Item 5, report to the NWT/NU Spill Line if the release is near or into a Water body, regardless of the quantity or type of releases of harmful substances.

## **PART H: CONDITIONS APPLYING TO MODIFICATIONS**

1. The Licensee may, without written consent from the Board, carry out Modifications to any Water Supply Facilities and Waste Disposal associated Facilities associated with the project provided that such Modifications are consistent with the terms of this Licence and the following requirements are met:

- i. the Licensee has notified the Board in writing of such proposed Modifications at least sixty (60) days prior to beginning the Modifications;
  - ii. such Modifications do not place the Licensee in contravention of the Licence or the *Act*;
  - iii. such Modifications are consistent with the NIRB Screening Decision;
  - iv. 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
  - v. the Board has not rejected the proposed Modifications.
2. Modifications for which all of the conditions referred to in Part H, Item 1, have not been met can be carried out only with written approval from the Board.
3. The Licensee shall provide as-built plans and drawings of the Modifications referred to in this Licence within ninety (90) days of completion of the Modification. These plans and drawings shall be stamped by an Engineer.

**PART I: CONDITIONS APPLYING TO ABANDONMENT AND RESTORATION OR TEMPORARY CLOSING**

1. The Licensee shall submit to the Board for approval within sixty (60) days following the issuance of this Licence, a revised, stand-alone, Abandonment and Restoration Plan prepared in accordance with applicable sections of the "Guidelines for Abandonment and Restoration Planning for Mines in the Northwest Territories (1990) and that must reflect the reduced scope of activities under this licence.
2. Licensee shall complete all restoration work prior to the expiry of this Licence.
3. The Licensee shall carry out progressive reclamation of any components of the project no longer required for the Licensee's operations.
4. The Licensee shall backfill and restore, to the satisfaction of an Inspector, all Sumps to the pre-existing natural contours of the land.
5. The Licensee shall remove from the site, all infrastructure and site materials, including but not limited to, all fuel caches, drums, barrels, buildings and contents, docks, water pumps and lines, material and equipment prior to the expiry of this Licence.
6. The Licensee shall, unless otherwise identified within the approved Plan under Part H, Item 1, remove all culverts and open the natural drainage channels of all water crossings associated with the Project. In carrying out this activity, measures shall be implemented to minimize erosion and sedimentation.
7. In order to promote the 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.



8. 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 (2010). The use of reclaimed soils for the purpose of backfill or general site grading may be carried out only upon consultation and approval by the Government of Nunavut, Department of Environment and an Inspector.
9. The Licensee shall restore all drill holes and disturbed areas to natural conditions immediately upon completion of drilling. The restoration of drill holes must include the removal of any drill casing materials and if having encountered artesian flow, the capping of holes with a permanent seal.
10. The Licensee may store drill core produced by the appurtenant undertaking in an appropriate manner and location at least thirty-one (31) metres above the ordinary High Water Mark of any adjacent Water body, where any direct flow into a Water body is not possible and no additional impacts are created.
11. The Licensee shall contour and stabilize all disturbed areas to a pre-disturbed state upon completion of work.

**PART J: CONDITIONS APPLYING TO THE MONITORING PROGRAM**

1. The Licensee shall measure and record, in cubic metres, the daily volume of Water utilized for drilling and any other purposes under this Licence.
2. The Licensee shall provide the GPS co-ordinates (in degrees, minutes and seconds of latitude and longitude) of all locations where sources of Water are utilized for all purposes
3. The Licensee shall determine the GPS co-ordinates (in degrees, minutes and seconds of latitude and longitude) of all locations where wastes are deposited in association with drilling operations and any other purpose under this Licence.
4. An Inspector may impose additional monitoring requirements.
5. The Licensee shall provide the GPS co-ordinates (in degrees, minutes and seconds of latitude and longitude) of all locations where Water bodies are utilized for all purposes not previously identified. The Licensee shall report the coordinates of all proposed Water sources to the Inspector and the Board at least 10) days prior to the initial use of any Water from that source.



6. The Licensee shall obtain representative samples of the water column below any ice, where required under Part F, Items 8 and 9. Monitoring to establish water quality conditions shall include, at minimum the following:
  - a. Total Suspended Solids
  - b. Electrical Conductivity
  - c. pH
  - d. Total Trace metals as determined by a standard ICP Scan (to include at a minimum, the following elements: Al, Sb, Ba, Cd, Cr, Co, Cu, Fe, Pb, Li, Mn, Mo, Ni, Se, Sn, Sr, Tl, Ti, U, V, Zn), Trace Arsenic and Mercury
7. 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.
8. All analyses shall be performed in a laboratory accredited according to ISO/IEC Standard 17025. The accreditation shall be current and in good standing.
9. The Licensee shall include in the Annual Report required under Part B, Item 6, all data, monitoring results and information required by this Part.