

In the matter of the Agreement Between the Inuit of the Nunavut Settlement Area and Her Majesty the Queen in right of Canada, S.C., 1993, c. 29 Article 12, Part 5

And

In the matter of an application by TMAC Resources Inc. for development of the Phase 2 Hope Bay Belt Project in the Kitikmeot Region of Nunavut

**NIRB PROJECT CERTIFICATE [NO.: 009]** 

November X, 2018

#### 1.0 BACKGROUND

#### Whereas:

- A. Pursuant to the Agreement Between the Inuit of the Nunavut Settlement Area and Her Majesty the Queen in right of Canada (Nunavut Agreement), the Nunavut Impact Review Board (NIRB or Board) has completed a Review of the potential ecosystemic and socio-economic effects of the Phase 2 Hope Bay Belt Project (the Project), NIRB File No. 12MN001;
- B. The Board has considered the commitments made by TMAC Resources Inc. throughout the NIRB's Review of the Project, including during the NIRB Final Hearing, and the Board has every expectation that the Proponent will fulfill the commitments made during the Final Hearing, within its Final Environmental Impact Statement, and contained within supporting documentation submitted during the review of the Project, not solely the commitments that are expressly included as terms and conditions in this Project Certificate;
- C. The Board has determined, pursuant to Article 12, Section 12.5.5 of the *Nunavut Agreement*, that taking into account the implementation of the measures necessary to avoid or mitigate the potential adverse environmental and socio-economic effects associated with the Project and set out as terms and conditions in this Project Certificate, the Phase 2 Hope Bay Belt Project is not likely to cause significant adverse ecosystemic and socio-economic effects;
- D. The Board has found, pursuant to Article 12, Section 12.5.5 of the *Nunavut Agreement* and taking into account all matters relevant to its mandate including Section 12.2.5 of the *Nunavut Agreement*, that the Phase 2 Hope Bay Project will protect the existing and future well-being of the residents and communities of the designated area, taking into account the interests of other Canadians;
- E. The Minister of Intergovernmental Affairs and Northern Affairs Canada and the Minister of Crown-Indigenous Relations have agreed with the determination within the NIRB's Final Hearing Report for the Phase 2 Hope Bay Belt Project, and accepted the recommended terms and conditions contained in the Report that are now included in the Project Certificate;
- F. Recognizing the importance of co-ordination, integration, and avoiding duplication with other monitoring requirements in permits, licences and other authorizations, the project-specific monitoring program, provided as Appendix A to this Project Certificate, will be issued in final form after key regulatory authorizations, including land use permits, water licences and mineral leases, are issued;
- G. The Project Certificate, as issued, is not a statutory instrument for the purposes of the *Statutory Instruments Act*.

Now therefore, the Nunavut Impact Review Board pursuant to Article 12, Section 12.5.12 of the *Nunavut Agreement*, issues this Project Certificate for the Phase 2 Hope3 Bay Belt Project to TMAC Resources Inc., subject to the terms and conditions contained herein.

#### 2.0 Project History and Overview

On December 8, 2011 the NIRB received the Phase 2 Hope Bay Belt Project (the Project) from Hope Bay Mining Ltd., and on January 12, 2012 the Board received a referral to screen the Project from the Kitikmeot Inuit Association (KIA). The Board subsequently conducted a screening of the Project pursuant to the Nunavut Agreement, Article 12, Part 4, and recommended to then Minister of Aboriginal Affairs and Northern Development that the Project undergo a Review pursuant to the Nunavut Agreement, Article 12, Part 5 or 6. The NIRB's recommendation to undertake further assessment via a Review under Article 12 of the Nunavut Agreement was accepted by the Minister of Indigenous and Northern Affairs Canada on May 30, 2012. In 2013, the ownership of the existing Doris North Project and associated assets, including the mineral deposits and infrastructure included within the scope of the proposed Phase 2 Hope Bay Belt Project, was transferred from Hope Bay Mining Ltd. to TMAC Resources Inc. (TMAC or the Proponent). Subsequently, on December 28, 2016 the NIRB received a Draft Environmental Impact Statement (DEIS) for the Project from TMAC and, after confirming conformity of the DEIS to the projectspecific Environmental Impact Statement (EIS) Guidelines issued by the Board, commenced the Technical Review of the Project. As part of the Review of the Project, the NIRB conducted consultation sessions in potentially impacted communities in the Kitikmeot region in February and March 2017 and hosted a Technical Meeting and Pre-hearing Conference (PHC) in Cambridge Bay in June 2017.

On December 21, 2017 the NIRB received TMAC's Final Environmental Impact Statement (FEIS) for the Project, and on January 17, 2018 the Board confirmed that the FEIS was in compliance with the NIRB's EIS Guidelines and PHC Decision for the Project and commenced the 60-day technical review period. On March 19, 2018 the NIRB received final written submissions from parties, and on April 4, 2018 TMAC provided its response to parties' final written submissions to the Board. From May 8 to May 12, 2018 the NIRB hosted a Final Hearing, including a Community Roundtable, in Cambridge Bay with participation of intervenors, community representatives from all seven (7) communities in the Kitikmeot region, Cambridge Bay, Kugluktuk, Gjoa Haven, Taloyoak, Kugaaruk, including the two (2) seasonal communities in the region, Omingmaktok (Bay Chimo) and Kingaok (Bathurst Inlet), and the general public.

Unfortunately, due to flight cancellations and other travel issues, the Board's Chairperson and a second Board Member travelling from the Qikiqtani Region were unable to reach Cambridge Bay in time for the start of the Final Hearing. As only three members of the Board were able to attend the Final Hearing, the Board would not have had quorum to conduct the Final Hearing as a full Board (quorum requires a minimum of five members). Consequently, the full Board met by teleconference in advance of the Final Hearing to delegate decision-making for the file to the three-member TMAC Phase 2 Hope Bay Belt Panel (the Panel). As required under Article 12, Section 12.2.14, the Panel consisted of a Chairperson for the Panel, Allen Maghagak and Philip (Omingmakyok) Kadlun, the government-nominated Panel Members and Henry Ohokannoak, the nominee of the Designated Inuit Organization. As the full Board delegated the power to the Panel to complete the decision-making for the file, the Panel Members conducted the Final Hearing its Final Hearing Report on June 26, 2018. The report included the NIRB's conclusions and recommendations to the Minister of Crown-Indigenous Relations and Northern Affairs, reflecting the Board's authority under the Nunavut Agreement. The Board noted that it had sufficient information to draw conclusions and make recommendations regarding the potential effects of the project and recommended that the Project should be allowed to proceed in accordance with the Final Hearing Report and the associated recommendations within.

On October 12, 2018 the NIRB received notification from the Honourable Dominic LeBlanc, Minister of Intergovernmental Affairs, Northern Affairs and Internal Trade and the Honourable Carolyn Bennett,

Minster of Crown-Indigenous Relations that the Final Hearing Report for the Review of TMAC Resources Inc.'s Phase 2 Hope Bay Belt Project had been accepted pursuant to section 12.5.7(a) of the *Nunavut Agreement*.

### 2.1. Project Overview<sup>1</sup>

The Phase 2 Hope Bay Belt Project (the Project) involves the proposed underground and above ground mining of three gold deposits located at the Hope Bay property, approximately 150 kilometres (km) southwest of Cambridge Bay in the Western Kitikmeot, Nunavut, and approximately 700 km northeast of Yellowknife. TMAC Resources Inc. (TMAC or the Proponent) proposes the development of the Phase 2 Hope Bay Belt Project to mine three gold deposits in the Hope Bay property as part of a proposed long-term mining operation in the Canadian Arctic that provides sustained economic stability and benefits to the Kitikmeot region. The Project would include mining for gold at the Madrid North, Madrid South and Boston mineral deposits in the approximately 1,600 square-kilometre Hope Bay Greenstone Belt. The total mineral reserves at the Madrid North, Madrid South, and Boston sites, based on a cut-off grade of 4.5 grams per tonne, is estimated to be approximately 4.8 million ounces of gold.

Most of the ore would be mined by underground mining methods; however, portions of the ore near the surface would be recovered by surface mining methods (Crown Pillar Recovery). As part of the mining activities for the Project, the Proponent would use and expand specific infrastructure at the Doris North site and the Roberts Bay site in addition to the construction and operation of new infrastructure at the Madrid and Boston sites. Development of the Project would require the following facilities and activities:

- Underground mine workings;
- Surface mining (Crown Pillar Recovery);
- Ore, waste rock pads and laydown areas;
- Ore processing facilities;
- Quarries;
- Tailings management facilities;
- Site water management infrastructure;
- Infrastructure to support land, air and marine transport;
- On-site accommodations;
- Shipping to and from site of supplies via barge, and personnel, and gold bars by aircraft;
- Shipping of fuel to the Project site via tanker vessels;
- Sealifting or airlifting of all hazardous waste generated at the Project site;
- Bulk fuel and explosives storage;
- Other mine support facilities; and
- Decommissioning and closure.

The project workforce would work at the mines on a fly-in/fly-out rotation. The maximum workforce at the project site would be 870, with 400 personnel housed at an expanded camp at the existing Doris North site and 300 personnel housed at the camp that would be developed at the Boston site. The proposed life of the Project, from mobilization and construction to operation, closure and post-closure, would be 19 years.

<sup>&</sup>lt;sup>1</sup> Unless otherwise stated, information in this section is based on the information provided by the Proponent in the Final Environmental Impact Statement, received by the NIRB on December 21, 2018.

#### 3.0 IMPLEMENTATION

As per Article 12, Section 12.9.1 and 12.9.2 of the *Nunavut Agreement*, the terms and conditions of the NIRB Project Certificate shall be implemented by all government departments and agencies in accordance with their authorities and jurisdictional responsibilities and shall incorporate the relevant terms and conditions of the NIRB Project Certificate into permits, certificates, licences or other government approvals issued by these departments or agencies.

If the Kitikmeot Inuit Association or other Designated Inuit Organization, or person or body that would normally have standing to seek this type of court determination, have concerns that any term or condition is not being implemented, these parties may seek a determination before the appropriate court regarding whether or not the terms and conditions in the Project Certificate have been implemented.

This Project Certificate is implemented by regulatory authorities in accordance with the *Nunavut Agreement* (Section 12.9.7):

*Nunavut Agreement*, Article 12, Section 12.9.7: A licence, permit, certificate or other governmental approval which implements or incorporates any term or condition of a NIRB project certificate may not be called into question in a court of law on the grounds that the issuing agency thereby fettered its discretion or otherwise acted without jurisdiction, when implementing any term or condition of a NIRB project certificate.

The NIRB has the authority to reconsider the terms and conditions of the Project Certificate to ensure that the terms and conditions are achieving their intended purpose. Clearly, the NIRB expects the Proponent to meet its obligations under this Project Certificate. However, under Article 12, Section 12.8.2 of the *Nunavut Agreement*, the NIRB may revisit specific terms and conditions in the Project Certificate if the NIRB determines that the terms and conditions are not achieving their purpose.

#### 3.1. General Principles of Interpretation Applicable to Terms and Conditions:

In order to view the project-specific terms and conditions set out within this Project Certificate in the appropriate context, the following general principles of interpretation apply to the Project Certificate in its entirety, with all terms and conditions being interpreted in accordance with:

- a. The NIRB's Final Hearing Report (namely NIRB File No.: 12MN001, Final Hearing Report for the Phase 2 Hope Bay Belt Project, June 26, 2018, available from the NIRB's public registry);
- b. The rights, responsibilities, authorities, and jurisdiction granted under the *Nunavut Agreement*;
- c. The limits and obligations imposed under laws of general application applicable to the Proponent or any party referred to in the term and condition, as those laws may be amended over time (e.g., privacy legislation, worker's health and safety, etc.);
- d. The specific jurisdictional and policy limits applicable to regulatory authorities, Nunavut Tunngavik Incorporated, the Kitikmeot Inuit Association, or other regulatory authority with jurisdiction in respect of the Project;
- e. Where terms and conditions include specific references to items that must be taken into consideration or included in work plans, etc. these specific references are intended to establish minimum expectations but are not intended to limit the Proponent or prevent the Proponent

- from undertaking additional measures beyond those expressly prescribed in such terms and conditions; and
- f. As noted in the Final Hearing Report, for those items where a more stringent version of the precautionary principle has been applied, it is the Board's expectation that the adaptive management strategies chosen will be highly responsive to early warning signs that risks may materialize, and that rather than waiting for impacts to be noted before mitigation measures are triggered, thresholds and active management targets will be set to require responses long before adverse impacts are likely.

#### 3.2. Format of Terms and Conditions

Wherever possible, the NIRB has used the following format for the project-specific terms and conditions set out within this Project Certificate to provide clear direction on the intended application, objectives, and reporting requirements:

**Category:** Identifies the relevant environmental component or project activity to which the term and condition applies. Wherever possible categories have been labelled to directly associate back to the Environmental Impact Statement prepared for the Project.

**Responsible Parties:** Identifies the parties responsible for implementation of the term and condition. While this is generally the Proponent, at times other regulatory authorities have been identified as also having a role in the Proponent's compliance with the term and conditions (such as consulting with the Proponent, participating on a working group, etc.).

**Project Phase:** Identifies the phase(s) of Project development to which the term and condition is applicable. Project phase may include any one or more of the following:

- Pre-Construction includes site preparation and staging of materials and equipment in advance of construction
- Construction
- Operations
- Temporary Closure /Care and Maintenance
- Closure and Post-Closure includes abandonment, decommissioning and reclamation

**Objective:** Provides a short description of the impact or effect being mitigated, or issue the term and conditions is meant to address. Where relevant, expectations have been provided regarding the timing for when terms and conditions will be deemed to be satisifed (i.e., sunset clause), and who has discretion for determining they are satisfied.

**Term or Condition:** Provides specific direction on the required action or follow up. In most instances the NIRB has endeavoured to use wording that is clearly understood by all parties, but that also allows for some flexibility for the Proponent to determine how best toachieve the stated objective. However, there are some terms and conditions for which the Board has decided that more explicit direction is necessary, and more prescriptive language has been used in those terms and conditions.

**Varied Term or Condition**: Where the Minister has varied the Board's recommendations for a Term or Condition, the Board has identified the *Varied* Term or Condition, with deletions to the Term or Condition identified by strike through text and additions to the text identified in bold and underlining.

**Reporting Requirements:** Sets out any specific reporting parameters required to measure achievement of objectives or to demonstrate compliance, as well as the required frequency of reporting. Consideration will be given to coordination of Project Certificate reporting requirements with reporting requirements as established by other regulatory instruments associated with the Project.

It should be noted that, for some of the recommended terms and conditions, a non-binding **Commentary** section has also been added following the specific term and condition as an aid to interpretation. The Commentary section reflects clarification of the term and condition, recording the common understanding and interpretation resulting from discussions and guidance provided during the Project Certificate Workshop held on XXXX X, 2018. The Commentary section is offered as a reference only and is not legally binding; in the event of a conflict between the wording in the Project Certificate and the clarification provided in the Commentary, the express wording of the Project Certificate prevails.

#### 3.3. Flexibility

It is acknowledged that the NIRB's monitoring program will have varying requirements over the course of the Project lifecycle, and that monitoring requirements will apply from construction to eventual reclamation and abandonment. In areas where there may be a need for flexibility in relation to the terms and conditions of the Project Certificate or their application, the NIRB has endeavoured to reflect this in the associated language and/or acknowledge that objectives may be achieved through various means.

The NIRB retains the ability to give additional clarification or direction on an ongoing basis through its Monitoring Officer, with respect to compliance requirements for the Project. Upon request by the Proponent or other parties, the NIRB can provide additional clarification or direction regarding implementation of Project Certificate terms and conditions.

Where the objective of a Project Certificate term or condition can be achieved through more efficient alternate means, the Proponent is encouraged to consult with the NIRB (and other parties as required) to seek acceptance of proposed alternatives.

The NIRB has the authority to reconsider the terms and conditions of the Project Certificate to ensure that the terms and conditions are achieving their purpose. Clearly, the NIRB expects the Proponent to meet its obligations under this Project Certificate; however, the NIRB may revisit the Project Certificate if the NIRB determines that the terms and conditions are not achieving their purpose. In the event that the monitoring program needs to be modified to better achieve its purpose, the Board, the Proponent, the Designated Inuit Organization or other interested parties may cause the Board, under Section 12.8.2 of the *Nunavut Agreement* to revisit the monitoring program, or any other terms and conditions in the Project Certificate.

#### 3.4. Proponent Commitments

The Board expects that the Proponent will fulfill all commitments made during the Final Hearing, within its Environmental Impact Statement and supporting documentation submitted during the Review, not just those commitments that have been incorporated into the Terms and Conditions of this Project Certificate. To support transparency and accountability associated with the Proponent's commitments, the Board encourages the Proponent to provide, in an annual report to the NIRB, a summary of the status of the Proponent's progress with respect to meeting any commitments which are intended to prevent or mitigate adverse ecosystemic or socio-economic effects of the Project and that are beyond the scope of ensuring compliance with Project Certificate terms and conditions.

#### 4.0 Overview of NIRB Monitoring Program

As set out in Article 12, Sections 12.7.1 and 12.7.2 of the *Nunavut Agreement*, the NIRB has the jurisdiction to establish a project-specific monitoring program to: measure the ecosystemic and socioeconomic effects of a project; assess whether the project is in compliance with the prescribed project terms and conditions; share information with regulatory authorities to support the enforcement of land, water or resource use approvals and agreements; and to assess the accuracy of predictions contained in the environmental impact statements. Given the Board's application of the precautionary approach to several aspects of the assessment for this Project, in the Board's view project-specific monitoring will play a crucial role in addressing the uncertainty regarding project effects and enabling all parties to adapt mitigation measures on an ongoing basis to ensure the Project's negative effects are prevented or limited to the extent possible.

The role of the Board with respect to the establishment of monitoring programs is to focus the terms and conditions in relation to the Project. With respect to existing or future general regional and territorial monitoring programs that may include some of the same monitoring parameters/indicators as the project-specific monitoring program, the *Nunavut Agreement* also directs the NIRB to avoid duplication but facilitate co-ordination and integration between the project-specific monitoring programs required by the NIRB and more general programs such as the Nunavut General Monitoring Program. Where the requirements of regional or territorial programs are more extensive or substantively different from those established through the Project Certificate, at all times the Proponent must ensure compliance with the project certificate terms and conditions.

In order to co-ordinate, integrate and avoid duplication with other monitoring programs, but also to ensure that the NIRB's project-specific monitoring program yields the information required to measure effects and adequately assess compliance with terms, conditions, regulatory instruments and agreements, the NIRB's monitoring program will continue to be developed through consultation with Responsible Authorities, the resource and land owners, and the Proponent as the remaining regulatory instruments for the Project are developed. Following the issuance of the Project Certificate by the NIRB, the framework for a project-specific monitoring program will be developed and will be provided in draft form as Appendix A to the Project Certificate. As noted in the Preamble, this framework cannot be issued in final form until key regulatory authorizations, including land use permits, water licences, mineral leases, etc. are issued so that the monitoring program supplements and supports, but does not duplicate, the monitoring requirements in regulatory and land use instruments. Prior to finalization, the Proponent will be required to comply with all aspects of the draft framework as directed by the NIRB.

## 4.1. Board Guidance on General Regulatory and Administrative Responsibilities

Both the NIRB and the Proponent have various administrative and regulatory obligations that support the efficient and effective implementation of the Project Certificate, including responsibilities to ensure interested members of the public have reasonable access to information about the Project as it progresses. The NIRB provides the following guidance regarding the regulatory and administrative responsibilities of the NIRB and the Proponent.

#### **NIRB Monitoring Responsibilities**

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<sup>&</sup>lt;sup>2</sup> See Sections 12.7.4 and 12.7.5 of the *Nunavut Agreement*.

- 1. The NIRB will appoint Monitoring Officers as required to monitor the Project in accordance with the purpose of a monitoring program as set out in Article 12, Section 12.7.2 of the Agreement Between the Inuit of the Nunavut Settlement Area and Her Majesty the Queen in right of Canada (Nunavut Agreement), for the full life of the Project, including closure and reclamation. Subject to direction from the NIRB, the responsibilities of the NIRB Monitoring Officers will include:
  - a. Providing direction to the Proponent, the Project's advisory groups, regulatory authorities, and the Kitikmeot Socio-Economic Monitoring Committee to provide the NIRB with information respecting the activities relating to the Project, its impacts and the implementation of any mitigative measures;
  - b. Conducting a periodic evaluation of the program for the Project;
  - c. Producing a report of the adequacy of the program based on the information obtained during the periodic evaluations of the program for the Project and on the ecosystemic and socio-economic impacts of the Project; and
  - d. Where appropriate, recommending to the NIRB reconsideration of Project Certificate Terms and Conditions in accordance with section 12.8.2 of the *Nunavut Agreement*.
- 2. The NIRB will report annually (in English, Inuinnaqtun, and Inuktitut) on the results of its Monitoring Program for the Project.
- 3. The NIRB will schedule periodic updates regarding its Monitoring Program for the communities most affected by the Project.
- 4. The NIRB Monitoring Officer(s) will schedule periodic site inspections at the Project, coordinating with other regulatory agencies to the extent possible.

#### **General Regulatory Requirements**

- 5. The Proponent must obtain all required federal and territorial permits and other approvals, and shall comply with the requirements of such regulatory instruments.
- 6. The Proponent shall take prompt and appropriate action to remedy any occasion of non-compliance with environmental laws and regulations and/or regulatory instruments, and shall report any non-compliance as required by law immediately. A description of all instances of non-compliance and associated follow up is to be reported annually to the NIRB.
- 7. The Proponent shall meet with respective licensing authorities prior to the commencement of construction to discuss the posting of adequate performance bonding. Licensing authorities are encouraged to take every measure to require that sufficient security is posted before construction begins.

#### **Monitoring Records**

- 8. All monitoring information collected pursuant to the Project Certificate and various regulatory requirements for the Project shall, if appropriate, given the type of monitoring conducted, contain the following information:
  - a. The name of the person(s) who performed the sampling or took the measurements including any relevant accreditations;
  - b. The date, time and place of sampling or measurement, and weather conditions;
  - c. The date of analysis;

- d. The name of the person(s) who performed the analysis including any relevant accreditations;
- e. A description of the analytical methods or techniques used; and
- f. A discussion of the results of any analysis.
- 9. The Proponent shall make significant monitoring results and/or summaries of significant results available in English, Inuinnagtun, and Inuktitut, to the extent feasible.
- 10. The Proponent shall keep and maintain the records, including results, of all Project-related monitoring data and analysis for the life of the Project, including closure and post-closure monitoring.
- 11. The Proponent shall maintain the Environmental Impact Statement and the environmental monitoring programs developed for the Project, with predictions updated as new baseline data is collected. If the results of monitoring programs necessitate updates to effects predictions, the Proponent shall update the associated management programs and plans as required to address or reflect the updated assessment of effects.
- 12. The Proponent shall establish a publically-accessible Project-specific web portal or web page to make available in a central location all significant non-confidential monitoring and reporting information submitted to regulatory authorities pursuant to the Project Certificate and other territorial or federal permits issued for the Project. For clarity, posting on the Project-specific site does not replace any reporting obligation of the Proponent pursuant to the Project Certificate or any territorial or federal permit.

#### On-going Engagement in Project Monitoring, Modelling, Management, and Reporting

- 13. The Proponent is encouraged to provide on-going opportunities for consultation and comment on any substantive revisions to the Project-specific monitoring program, modelling, studies, management plans, management measures, and reporting under the Project Certificate.
- 14. To the extent feasible, the NIRB will provide an opportunity for comment on any substantive revisions to the Project-specific monitoring, modelling, studies, management plans, management measures, and reporting provided by the Proponent under the Project Certificate.

#### 5.0 **ENFORCEMENT**

As noted in section 12.10.3 of the *Nunavut Agreement*, where the terms and conditions of the Project Certificate are implemented or incorporated by reference into permits, certificates, licences or other governmental approvals, the enforcement of the terms and conditions included in that authorization remains with the agency responsible for the authorization (i.e., Regulatory Authority). In addition, under Part 8, Article 12 of the *Nunavut Agreement*, if the Board determines that these terms and conditions are not achieving their purpose for any reason, including instances of significant non-compliance, the NIRB may revisit the terms and conditions contained in the Project Certificate.

#### 6.0 Project Specific Terms and Conditions

# 6.1. Terms and Conditions Of the Doris North Gold Mine Project Certificate No. 003 Applying To the Phase 2 Hope Bay Belt Project

With respect to the NIRB's regulatory process and outcomes, the Phase 2 Hope Bay Belt Project is unique as TMAC Resources Inc. (TMAC; the Proponent) plans a phased development approach for the Hope Bay Greenstone Belt, with the planned development of the Madrid North, Madrid South and Boston deposits being coordinated with the ongoing development associated with the approved Doris North Gold Mine. As part of this phased development approach, TMAC plans to use some of the existing infrastructure at the Doris North Gold Mine site to support development of the three additional deposits. As identified at the Final Hearing, the Board expects that there will be some terms and conditions in the existing Doris North NIRB Project Certificate (No. 003, as amended) that will continue to apply to that infrastructure after the Doris North Gold Mine itself may cease operations, but while this infrastructure continues to be used by the operations for the Project.

Specifically, the Board has identified that aspects of the following existing terms and conditions in the amended Project Certificate No. 003<sup>3</sup> will continue to apply to the Project infrastructure associated with the Doris North Gold Mine site, even after the closure and reclamation of the mine at the Doris North Gold Mine site:

- Wildlife and Terrestrial Environment, Terms and Conditions 22-27;
- Socio-Economics, Terms and Conditions 28, 40-49

The continued applicability of these existing terms and conditions as identified in the Doris North NIRB Project Certificate (No. 003, as amended) was addressed in the NIRB Final Hearing Report and was further discussed by the NIRB, the Proponent and parties during the Project Certificate Workshop held on XXXX X, 2018. During the discussions at the Project Certificate Workshop, the parties confirmed that the terms and conditions within the Doris North NIRB Project Certificate (No. 003, as amended) and listed above are intended to extend beyond the end of operations at the Doris North Gold Mine and will continue to apply to the Phase 2 Hope Bay Belt Project. As discussed at the Project Certificate Workshop, the Proponent may choose the extent to which the reporting and monitoring requirements under the Doris North NIRB Project Certificate (No. 003, as amended) and this Project Certificate can be integrated. However, as expressed by the parties and the NIRB, if the Proponent chooses to provide integrated reporting and monitoring, the documents provided must clearly identify the linkage between the information provided and the specific Project Certificate terms and conditions. Further detail regarding the Monitoring Program for the Project will also be provided within Appendix A as the Program details are developed.

### 6.2. Phase 2 Hope Bay Belt Project Terms and Conditions

#### **Ecosystemic Terms and Conditions**

Term and Condition No.	1.
Category:	Air Quality – Air Quality Management Plan
Responsible Parties:	The Proponent, Environment and Climate Change Canada

<sup>&</sup>lt;sup>3</sup> The NIRB issued the amendment 001 of the Project Certificate No. 003 to TMAC Resources Inc. on April 11, 2013 following the approval by the Minister of Indigenous and Northern Affairs.

Project Phase:	All Phases
Objective:	To ensure that impacts of the Project on air quality are identified, effectively mitigated and adaptively managed.
Term or Condition:	The Proponent shall maintain an Air Quality Management Plan that addresses the following areas/issues:
	<ul> <li>regular stack testing of incinerators to demonstrate emissions are within levels predicted or within applicable guidelines or standards;</li> </ul>
	<ul> <li>b) continuous NO2 monitoring and demonstration that NO2 emissions do not exceed levels impact predictions nor relevant guidelines; and</li> </ul>
	<ul> <li>c) implementation of dust suppression measures and demonstration that dustfall and concentrations of suspended particulate matter are within levels predicted or committed to, and within levels or limits established by applicable guidelines and regulations.</li> </ul>
Reporting Requirements:	The Plan should be submitted to the Nunavut Impact Review Board (NIRB) prior to the start of construction, and reported on annually (or more frequently for monitoring results that may already be required under Project Certificate No. 003, such as Term and Condition #30). For years when stack testing has been conducted, the stack testing results must also be reported to Environment and Climate Change Canada (ECCC) as ECCC directs.

Term and Condition No.	2.
Category:	Climate and Meteorology – Greenhouse Gas Reduction Plan
Responsible Parties:	The Proponent
Project Phase:	Construction and Operations
Objective:	To monitor and reduce greenhouse gas emissions produced by the Project.
	The Proponent shall maintain a Greenhouse Gas Emissions (GHG) Reduction Plan which includes:
	<ul> <li>a) an estimate of the Project's GHG baseline emissions;</li> </ul>
Term or Condition:	<ul> <li>a description of monitoring measures to be undertaken, including the methods, frequency, parameters, and a description the analysis that will be carried out on the monitoring data generated; and</li> </ul>
	<ul> <li>c) a description of mitigative and adaptive strategies to reduce project-related greenhouse gas emissions over the Project lifecycle.</li> </ul>
Reporting Requirements:	The Plan should be submitted to the Nunavut Impact Review Board (NIRB) prior to the start of construction, with subsequent updates or revisions to the Plan submitted annually thereafter or as may otherwise be required by the NIRB.
Term and Condition No.	3.
Category:	Climate and Meteorology – Mine Closure and Reclamation Plan
Responsible Parties:	The Proponent

Project Phase:	Temporary Closure/Care and Maintenance, Closure and Post-Closure
Objective:	To ensure mitigation, monitoring, and adaptive management measures are
	in place for the long-term stability, containment, and integrity of project
	components and the protection of environmental features.
Term or Condition:	The Proponent shall maintain a Mine Closure and Reclamation Plan that addresses the following areas/issues:
	<ul> <li>a) adaptive management approaches for monitoring and mitigation measures to ensure long-term containment of the Tailings Storage Facility and Waste Rock Storage Areas;</li> </ul>
	b) measures to maintain the integrity of the groundwater quality within and adjacent to the Project; and
	c) estimates of the approximate fill time for the mine pits.
Reporting Requirements:	The Plan should be submitted to the Nunavut Impact Review Board (NIRB)
	prior to the start of construction, with subsequent updates or revisions to
	the Plan submitted annually thereafter or as may otherwise be required by
	the NIRB.

Term and Condition No.	4.
Category:	Noise and Vibration – Noise Abatement and Monitoring
Responsible Parties:	The Proponent, Government of Nunavut-Department of Environment, Environment and Climate Change Canada, Health Canada, Fisheries and Oceans Canada
Project Phase:	All Phases
Objective:	To minimize sensory disturbance to humans and wildlife
Term or Condition:	The Proponent shall, in consultation with the Government of Nunavut- Department of Environment, Environment and Climate Change Canada, and Health Canada, maintain a Noise Abatement Monitoring Plan that addresses the following areas/issues:
	<ul> <li>a) measures to protect people, fish, and wildlife, from mine activity noise and vibration, including blasting, drilling, equipment, vehicles and aircraft;</li> </ul>
	<ul> <li>b) monitoring of noise at least once during each phase of the Project and following quarry blasts to demonstrate that noise levels remain within predicted levels and below applicable guidelines and standards; and</li> </ul>
	c) adaptive management and monitoring measures to be implemented should monitoring identify an exceedance; and
	d) the procedure employees should follow if they have any noise complaints.
Reporting Requirements:	The Plan should be submitted to the Nunavut Impact Review Board (NIRB) prior to the start of construction, and reported on annually (or more frequently for monitoring results that may already be required under Project Certificate No. 003, such as Term and Condition #29).

Term and Condition No.	5.
Category:	Acid Rock Drainage and Metal Leaching Management
Responsible Parties:	The Proponent
Project Phase:	All Phases
Objective:	To mitigate potential impacts from acid rock drainage and metal leaching.
	The Proponent shall maintain a stand-alone Acid Rock Drainage and Metal Leaching Management Plan (or equivalent as may be specified under the Type "A" Water Licence) that includes the following information:
	<ul> <li>a) procedures for inspection and sampling/testing of waste rock, ore, tailings storage facilities, and quarry source material;</li> </ul>
	<ul> <li>thermal monitoring of waste rock and tailings storage facilities, including tailings management areas;</li> </ul>
	c) seepage management and monitoring;
	<li>d) a schedule for reporting of results and periodic updating of predictions for seepage water quality;</li>
Term or Condition:	<ul> <li>e) planning for optimal cover conditions above-ground mine- and quarry-related material storage facilities;</li> </ul>
	<li>f) contingency measures that may be implemented if required, including measures to address the potential for leaching of arsenic from waste rock and ore stockpiles, and tailings under neutral pH conditions;</li>
	g) plans for comparing monitoring results from receiving waters to model predictions; and
	<ul> <li>h) identification of thresholds that will trigger specific management actions, including active water treatment, if trends analyses indicate water quality objectives may be exceeded.</li> </ul>
Reporting Requirements:	The Plan should be submitted to the Nunavut Impact Review Board (NIRB) prior to the start of construction, with subsequent updates or revisions to the Plan submitted annually thereafter or as may otherwise be required by the NIRB.

Term and Condition No.	6.	
Category:	Site-specific Geotechnical Studies, Permafrost Monitoring, Mapping a Thermal Analysis	and
Responsible Parties:	The Proponent	
Project Phase:	Pre-construction	
Objective:	To prevent potential impacts to sensitive land features and to ensure to integrity of site infrastructure is maintained through beto characterization and monitoring of ground ice conditions addentification of sensitive terrain in the project area.	tter
Term or Condition:	n consultation with applicable regulatory agencies and experts such Natural Resources Canada, the Proponent shall undertake additional si	

	specific geotechnical investigations, permafrost monitoring, mapping and thermal analysis to:
	<ul> <li>a) document permafrost conditions, including seasonal thaw, amount of ground ice;</li> </ul>
	<li>b) inform the detailed design of project infrastructure, including foundations, such as water management structures, mine site and haul roads, waste rock storage facilities, and tailings storage facilities, including dam structures associated with the Doris North Tailings Impoundment Area;</li>
	<ul> <li>c) inform updates/revisions to management plans related to waste rock, ore, and tailings storage facilities, including adaptive management strategies with clear thresholds for implementation to minimize the potential for impacts from these facilities; and</li> </ul>
	<ul> <li>d) ensure the integrity of project infrastructure and components, including tailings cover, is maintained post-closure.</li> </ul>
Reporting Requirements:	Results from these studies and updated/revised plans should be submitted to the Nunavut Impact Review Board prior to the start of construction of applicable project components or facilities, with results or updates submitted annually thereafter as when necessary.

Term and Condition No.	7.
Category:	Erosion Management Plan
Responsible Parties:	The Proponent
Project Phase:	All Phases
Objective:	To ensure management of erosion from land disturbance.
Term or Condition:	The Proponent shall maintain an Erosion Management Plan designed to prevent or minimize erosion and its resulting effects from project-related land disturbance. The Plan shall include the following:  a) identification of specific project activities that require erosion control;  b) description of associated erosion issues; and c) specific measures to prevent or minimize erosion.
Reporting Requirements:	The Plan should be submitted to the Nunavut Impact Review Board (NIRB) prior to the start of construction, with subsequent updates or revisions to the Plan submitted annually thereafter or as may otherwise be required by the NIRB.

Term and Condition No.	8.
Category:	Mine Closure and Reclamation Plan – Progressive Reclamation and Restoration Reflecting Natural Aesthetics and Community Aesthetic Values
Responsible Parties:	The Proponent
Project Phase:	All Phases

Objective:	To ensure that disturbed land parcels no longer required for operations are progressively reclaimed with the natural aesthetics restored to the extent practicable.
Term or Condition:	As part of the Mine Closure and Reclamation Plan (or equivalent), the Proponent shall develop and implement a program to progressively reclaim disturbed areas within the project footprint, with an emphasis on restoring the natural aesthetics of the area through re-contouring to the extent practicable. Acceptability of reclamation efforts should confirmed through the Proponent's public engagement with local communities and discussion of local aesthetic values (e.g. acceptability of the topography and landscape of the project areas following progressive reclamation efforts). Progressive reclamation efforts should also demonstrate consideration for the feasibility of topsoil/organic matter salvage to promote revegetation.
Reporting Requirements:	The Plan should be submitted to the Nunavut Impact Review Board (NIRB) prior to the start of construction, with subsequent updates or revisions to the Plan submitted annually thereafter or as may otherwise be required by the NIRB.

Term and Condition No.	9.
Category:	Talik Distribution and Flow
Responsible Parties:	The Proponent
Project Phase:	All phases
Objective:	To provide information on potential project impacts on talk distribution and flow.
Term or Condition:	The Proponent shall implement a Thermal Monitoring Plan to identify potential changes in talik distribution and flow paths that may result from the development of project infrastructure, including underground workings, tailings storage facilities, and water impoundment areas.
Reporting Requirements:	The Plan should be submitted to the Nunavut Impact Review Board (NIRB) prior to the start of construction, with subsequent updates submitted annually thereafter or as may otherwise be required by the NIRB.

Term and Condition No.	10.
	Surface Water Hydrology, Surface Water Quality, Sediment Quality and
Category:	Freshwater Aquatic Environment – Aquatic Effects Monitoring Plan, and
	Water Management Plan
Responsible Parties:	The Proponent
Project Phase:	All Phases
Objective:	To mitigate potential impacts to surface waters.
	Subject to potential receipt of more detailed direction from the Nunavut
Term or Condition:	Water Board, the Proponent shall:
	a) monitor the effects of project activities and infrastructure on

		surface water quality conditions;
	b)	ensure the monitoring data is sufficient to compare the impact predictions made for the Project with actual monitoring results;
	c)	ensure that the sampling locations and frequency of monitoring is consistent with and reflects the requirements of the Aquatic Effects Monitoring Plan, and Water Management Plan; and
	d)	on an annual basis, compare monitoring results with the impact assessment predictions in the FEIS and will identify any significant discrepancies between impact predictions and monitoring results.
Reporting Requirements:	prior to	in should be submitted to the Nunavut Impact Review Board (NIRB) the start of construction, with subsequent updates or revisions to in submitted annually thereafter or as may otherwise be required NIRB.

Term and Condition No.	11.
Category:	Groundwater and Surface Water Quality, Sediment Quality and Freshwater Aquatic Environment – Aquatic Effects Monitoring Plan
Responsible Parties:	The Proponent, Nunavut Water Board, Environment and Climate Change Canada, and Fisheries and Oceans Canada
Project Phase:	All Phases
Objective:	To mitigate potential impacts to groundwater, surface waters and freshwater aquatic environment.
	The Proponent shall, reflecting any direction from responsible authorities, maintain an Aquatic Effects Monitoring Program (AEMP) designed to appropriately characterize the receiving environment and ensure that adequate data is available to assess impact predictions made for the Project and prevent adverse impacts from occurring. The AEMP should include measures to:  a) determine the short and long-term effects in the aquatic
Term or Condition:	environment resulting from the Project; b) evaluate the accuracy of Project effect predictions; c) assess the effectiveness of mitigation and management measures on Project effects;
	d) identify additional mitigation measures to avert or reduce environmental effects due to Project activities;
	e) comply with <i>Metal Mining Effluent Regulations</i> requirements, should an Environmental Effects Monitoring program be triggered;
	f) reflect site-specific water quality conditions;
	g) include details comparing the watershed features from the Aimaokatalok, Windy, and Doris watersheds to the reference watersheds (Reference A, Reference B, Reference C and Reference D lakes and streams); and

	h) evaluate the mixing and non-mixing portion of the pit.
Reporting Requirements:	The Plan should be submitted to the Nunavut Impact Review Board (NIRB) prior to the start of construction, with subsequent updates or revisions to the Plan submitted annually thereafter or as may otherwise be required by the NIRB.

Term and Condition No.	12.
Category:	Freshwater Aquatic Environment – Setbacks
Responsible Parties:	The Proponent
Project Phase:	All Phases
Objective:	To mitigate impacts of runoff/sedimentation from project quarries and borrow pits into freshwater aquatic habitat.
Term or Condition:	Unless otherwise authorized, the Proponent shall maintain an appropriate setback distance between project quarries and borrow pits from fish-bearing or permanent waterbodies as required to prevent acid rock drainage or metal leaching into such waterbodies and to mitigate the potential for impacts from runoff/sedimentation associated with project quarries and borrow pits.
Reporting Requirements:	The Proponent shall provide information regarding quarry setback distances maintained and/or mitigation measures implemented in fulfillment of this Term and Condition in the Proponent's annual report to the Nunavut Impact Review Board.

Term and Condition No.	13.
Category:	Freshwater Aquatic Environment – Watercourses
Responsible Parties:	The Proponent, Fisheries and Oceans Canada
Project Phase:	All Phases
Objective:	To prevent blockages or restrictions to fish passages.
Term or Condition:	The Proponent shall ensure that all project infrastructure in watercourses are designed and constructed in such a manner that they do not unduly prevent or limit the movement of water or fish species in fish bearing streams and rivers, unless otherwise authorized by Fisheries and Oceans Canada.
Reporting Requirements:	The Proponent shall report on how it has maintained and/or implemented mitigation measures in fulfillment of this Term and Condition in the Proponent's annual report to the Nunavut Impact Review Board.

Term and Condition No.	14.
Category:	Freshwater Aquatic Environment – Blasting
Responsible Parties:	The Proponent, Fisheries and Oceans Canada
Project Phase:	All Phases
Objective:	To mitigate impacts of explosives use on fish and fish habitat.
Term or Condition:	The Proponent shall engage with Fisheries and Oceans Canada to develop

	project specific thresholds, mitigation and monitoring for any blasting activities that would exceed the requirements of Fisheries and Oceans Canada's Guidelines for the Use of Explosives In or Near Canadian Fisheries Waters.
Reporting Requirements:	If project-specific thresholds, mitigation and monitoring requirements are developed, the Proponent shall identify these requirements in the annual report provided to the Nunavut Impact Review Board.

Term and Condition No.	15.
Category:	Freshwater Aquatic Environment – Winter Ice Road
Responsible Parties:	The Proponent
Project Phase:	All Phases
Objective:	To mitigate impacts to fish and fish habitat.
Term or Condition:	The Proponent shall implement all applicable Fisheries and Oceans Canada best management practices to avoid and mitigate serious harm to fish as a result of the construction, operations, and decommissioning of winter ice roads, and from under ice water withdrawals. This includes adequately screening the water intake pipes to prevent impingement and entrainment of fish.
Reporting Requirements:	Information regarding best management practices and/or mitigation measures implemented by the Proponent in fulfillment of this Term and Condition shall be provided in the Proponent's annual report to the Nunavut Impact Review Board.

Term and Condition No.	16.
Category:	Freshwater Aquatic Environment – Water Crossings
Responsible Parties:	The Proponent
Project Phase:	All Phases
Objective:	To mitigate impacts to fish and fish habitat.
Term or Condition:	The Proponent shall implement all applicable Fisheries and Oceans Canada best management practices to avoid and mitigate serious harm to fish as a result of water crossing construction, operations, and decommissioning for all fish-bearing water crossings.
Reporting Requirements:	Information regarding best management practices and/or mitigation measures implemented by the Proponent in fulfillment of this Term and Condition shall be provided in the Proponent's annual report to the Nunavut Impact Review Board.

Term and Condition No.	17.
Category:	Vegetation – invasive and rare plant species
Responsible Parties:	The Proponent, Government of Nunavut
Project Phase:	All Phases
Objective:	To prevent the introduction of invasive plant species and protect rare plant
	species.

Term or Condition:	The Proponent shall maintain a section in the Wildlife Mitigation and Monitoring Plan (WMMP) on invasive plant species and rare plant species with details on the following:
	<ul> <li>a) mitigation to prevent the introduction of invasive plant species, for example, via inspection of vehicles and equipment brought to site;</li> </ul>
	<ul> <li>b) protocols for monitoring for invasive plant species, with reference to geographic scope and frequency, and commitment to monitor through post-closure;</li> </ul>
	<ul> <li>c) measures to ensure that any introductions of non-indigenous plant species are promptly reported to the Government of Nunavut – Department of Environment;</li> </ul>
	<ul> <li>d) mitigation to prevent the successful establishment of invasive species that may be introduced to the project area as a result of project activities.</li> </ul>
	e) summary of loss of potential rare plan habitat when construction occurs in new areas
Reporting Requirements:	A description of monitoring and mitigation undertaken and a summary of related results related to introduction of invasive plan and protection of
	rare plants shall be provided in the Proponent's annual report to the Nunavut Impact Review Board.

Term and Condition No.	18.
Category:	Vegetation - revegetation
Responsible Parties:	The Proponent
Project Phase:	All Phases
Objective:	To encourage re-establishment of native plant species in disturbed areas.
Term or Condition:	The Proponent shall ensure that the progressive reclamation efforts outlined in its Mine Closure and Reclamation Plan or equivalent encourage recolonization by native plant species. These efforts are expected to be informed by revegetation trials in the Project area, and must include monitoring protocols over sufficient timeframes to measure success and ensure invasive plant species have not established.
Reporting Requirements:	The extent of progressive reclamation activities undertaken and measures of their success shall be summarized within the Proponent's annual reports submitted to the NIRB.

Term and Condition No.	19.
Category:	Wildlife and Wildlife Habitat – Wildlife Mitigation and Monitoring Plan
Responsible Parties:	The Proponent
Project Phase:	All Phases
Objective:	To ensure a holistic and comprehensive approach to mitigate, monitor, and adaptively manage potential impacts to wildlife.

Term or Condition:	The Proponent shall maintain either a Project-specific Wildlife Mitigation and Monitoring Plan (WMMP) or include the Project-specific details in a belt-wide plan (integrated with the similar plans required in Project Certificate No. 003 for the Doris North Gold Mine Project). The WMMP must include detailed monitoring, mitigation, and adaptive management measures for wildlife (including identification of any enhanced mitigation associated with Species At Risk), with consideration for each Project activity predicted to affect wildlife, with specific triggers for mitigation and adaptive management intervention. Other wildlife-specific management plans required by the Project Certificate may also be incorporated into the WMMP as appropriate, provided they are clearly identified within the document. The WMMP should highlight the Proponent's efforts to align its Project-specific wildlife monitoring with broader regional initiatives for wildlife monitoring and addressing cumulative effects.  The Proponent is expected to develop an audit process with relevant parties to identify updates to the WMMP that may be required, particularly to address significant changes in Project development plans, monitoring results indicating biologically-meaningful changes, significant updates to the understanding of best management practices, Inuit Qaujimaningit or Traditional Knowledge which is shared with the
	Proponent, changes in climatic conditions that might subject wildlife to unexpected impacts, or as otherwise necessary.
Reporting Requirement	The Proponent shall submit a revised Plan to the Nunavut Impact Review Board (NIRB) within one (1) year of issuance of the Project Certificate. The Proponent shall provide summaries of its implementation in respect to the requirements of the Plan within its annual reporting to the NIRB, with required updates identified through its audit process highlighted.

Term and Condition No.	20.
Category:	Wildlife and Wildlife Habitat – Road Traffic Management
Responsible Parties:	The Proponent
Project Phase:	All Phases
Objective:	To minimize impacts to terrestrial wildlife from road traffic.
	The Proponent shall maintain a Road Management Plan which includes:
Term or Condition:	<ul> <li>a) maintenance of traffic logs and traffic counters along the all- weather road between the Doris-Madrid mine sites and Madrid- Boston mine sites. Where traffic levels exceed levels predicted for the Project, the Proponent shall develop and implement appropriate enhancements to its wildlife protection measures;</li> </ul>
	<ul> <li>b) information regarding the road design, safety barriers, berms and features designed to ensure safe wildlife movement;</li> </ul>
	<ul> <li>c) description of safety protocols and enforcement by the Proponent, including restrictions imposed during periods of low visibility, and training provided to road users; and</li> </ul>

	d) program to monitor snow bank heights along Project roads to ensure they do not pose a barrier to movement of wildlife or other land users.
Reporting Requirements:	The Plan shall be provided to the Nunavut Impact Review Board (NIRB) prior to the commencement of construction. An annual summary of the monthly maximum, minimum, and average traffic levels shall be provided to the NIRB in the Proponent's annual report, with an analysis of the effectiveness of mitigation for adverse impacts to wildlife from road operations.

Term and Condition No.	21.
Category:	Wildlife and Wildlife Habitat – Wildlife Mitigation Measures
Responsible Parties:	The Proponent, the Government of Nunavut
Project Phase:	All Phases
Objective:	To ensure that specific criteria and procedures are developed should wildlife be deemed project-tolerant.
Term or Condition:	In consultation with the Government of Nunavut and other relevant authorities, the Proponent shall include criteria and procedures within its Wildlife Mitigation and Monitoring Plan (WMMP) governing the deterrence of wildlife from blast zones and the relaxation of mitigation measures for animals deemed Project-tolerant.
Reporting Requirements:	The Proponent shall provide a summary discussion of its implementation of this Term and Condition to the Nunavut Impact Review Board (NIRB) through the Proponent's annual monitoring report.

Term and Condition No.	22.
Category:	Wildlife and Wildlife Habitat – Caribou and Muskox Mitigation Measures
Responsible Parties:	The Proponent, the Government of Nunavut
Project Phase:	All Phases
Ohioativa	To mitigate potential impacts to caribou and muskox from project
Objective:	activities.
	In collaboration with the Government of Nunavut, the Proponent shall
Term or Condition:	specify within its Wildlife Mitigation and Monitoring Plan specific
	mitigation measures, trigger distances, and group size thresholds for the
	protection of caribou and muskox in proximity to project activities (e.g.,
	blasting, heavy truck traffic, and aircraft).
Reporting Requirements:	The Proponent shall provide a summary discussion of its implementation
	of this Term and Condition to the Nunavut Impact Review Board (NIRB)
	through the Proponent's annual monitoring report.

Term and Condition No.	23.
Category:	Wildlife and Wildlife Habitat – Wildlife Monitoring and Adaptive Management Measures
Responsible Parties:	The Proponent

Project Phase:	All Phases
Objective:	To ensure that all direct wildlife mortalities are reported and considered
	in the development of adaptive management protocols.
Term or Condition:	The Proponent shall file an incident report with the local wildlife
	conservation office for all direct wildlife mortalities that occur in
	association with the Project. Incident reports should include sufficient
	detail to demonstrate how monitoring and mitigation measures failed to
	prevent the mortality, as well as information pertaining to what measures
	would be put in place to prevent the incident from reoccurring.
Reporting Requirements:	A summary regarding incidents reported in fulfillment of this Term and
	Condition shall be included in the Proponent's annual report to the
	Nunavut Impact Review Board.

Term and Condition No.	24.
Catogory	Wildlife and Wildlife Habitat – Wildlife Mitigation and Monitoring
Category:	Measures
Responsible Parties:	The Proponent
Project Phase:	All Phases
Objective	To mitigate potential impacts to wildlife through interaction with water
Objective:	attenuation ponds and/or tailings storage areas.
	The Proponent shall implement measures to prevent the use of water
Term or Condition:	attenuation ponds and tailings storage areas by wildlife, including
	waterfowl, other migratory birds, and caribou, with sufficient monitoring
	to assess whether these measures are effective or whether further
	deterrents may be required.
Reporting Requirements:	The Proponent shall provide a summary discussion of its implementation
	of this Term and Condition to the Nunavut Impact Review Board (NIRB)
	through the Proponent's annual monitoring report.

Term and Condition No.	25.
Category:	Wildlife and Wildlife Habitat – Transmission Lines
Responsible Parties:	The Proponent
Project Phase:	Pre-construction
Objective:	To ensure wildlife movement and use of project areas is not adversely
Objective.	affected by transmission lines.
Term or Condition:	The Proponent shall conduct an assessment of the potential for its planned transmission lines to impact the movement and use of project areas by caribou, birds and other wildlife species, as well as other land users. The Proponent will demonstrate how its assessment has informed the selection of a final design for this infrastructure, its siting, operation and decommissioning, and any associated updates to its Wildlife Mitigation and Monitoring Plan to evaluate the effectiveness of planned mitigation.
Reporting Requirements:	The Proponent shall provide the Nunavut Impact Review Board with the outcomes of its assessment and associated updates to its Plan in support

of the implementation of this Term and Condition at least 90 days prior to
construction of transmission lines for the Project.

Term and Condition No.	26.
Category:	Birds and Bird Habitat – Tailings Impoundment Area
Responsible Parties:	The Proponent, Environment and Climate Change Canada, Inuit Environmental Advisory Committee
Project Phase:	All Phases
Objective:	To mitigate potential impacts to birds from the Tailings Impoundment Area and contact water ponds.
Term or Condition:	The Proponent shall monitor usage of contact water ponds by water birds and shorebirds, and shall conduct a baseline survey for water birds and shorebirds at the Tailings Impoundment Area (TIA) to characterize the bird community and use of the TIA. Survey methodology shall be determined in consultation with Environment and Climate Change Canada (ECCC). If surveys indicate that birds are using the TIA or other contact water ponds, the Proponent shall conduct a toxicological risk assessment in consultation with ECCC; and if that risk assessment indicates that there is a reasonable risk to birds from the TIA, the Proponent shall monitor for ongoing bird usage of the TIA and shall engage with the Inuit Environmental Advisory Committee and ECCC to establish appropriate methods for deterrence of water birds.
Reporting Requirements:	A summary of the results of baseline surveys, risk assessment, engagement with the Inuit Environmental Advisory Committee (IEAC) and Environment and Climate Change Canada (ECCC), and follow-up monitoring shall be provided in the Proponent's annual report submitted to the NIRB (or more frequently for monitoring results that may already be required under Project Certificate No. 003, such as Term and Condition #26).

Term and Condition No.	27.
Category:	Birds and Bird Habitat – Raptor Mitigation Measures
Responsible Parties:	The Proponent
Project Phase:	Construction
Objective:	To mitigate potential impacts to raptors from project construction.
Term or Condition:	Should it be necessary to undertake Project-related construction within the raptor-breeding period, the Proponent shall conduct a preconstruction survey of potential cliff-nesting habitat within two (2) kilometres (km) of the construction area to ensure all nesting sites have been accounted for in advance of construction commencing. If an active cliff nest is located within one (1) km of the planned construction areas, construction activities shall not commence until a nest-site protection plan has been developed in consultation with the Government of Nunavut – Department of Environment (GN-DoE) to address:

	<ul> <li>a) inclusion of appropriate setbacks and buffers, with exceptions potentially requiring formal authorization from the Government of Nunavut;</li> </ul>
	<li>b) measures for instances where raptors build a nest on project infrastructure such as a service building and cessation of construction activities would not apply; and</li>
	<ul> <li>monitoring and mitigation measures for all potential nest sites within one (1) km of project activities.</li> </ul>
Reporting Requirements:	The Proponent shall report on its implementation of this Term and Condition and provide a summary of the results of pre-construction raptor nest surveys undertaken and nest-specific management plans developed within the Proponent's annual report submitted to the Nunavut Impact Review Board.

Term and Condition No.	28.
Category:	Birds and Bird Habitat – Site-wide and wind-turbine monitoring
Responsible Parties:	The Proponent
Project Phase:	Operations
Objective:	To prevent adverse impacts to birds from project activities and infrastructure including wind turbines.
Term or Condition:	The Proponent shall maintain in either a separate Migratory Birds Protection Plan or with these contents clearly identified, as an addition to the Wildlife Mitigation and Monitoring Plan, a plan which:  a) specifies measures designed for the protection of birds from operation of wind turbines, with additional preventative measures to be implemented during periods of poor visibility within peak bird migration periods;  b) includes protocols for bird mortality monitoring within the general area of the wind turbines, and for contribution of data to regional bird research / monitoring programs; and  c) includes adaptive management measures - including those that
	may be in place at other sites in northern Canada - that may be implemented should mortalities be greater than expected.
Reporting Requirements:	The Plan described above shall be provided to the Nunavut Impact Review Board (NIRB) prior to installation of wind turbines for the Project, with a summary of monitoring results included in the Proponent's annual report to the NIRB.

Term and Condition No.	29.
Category:	Marine Environment - Shipping Management Plan
Responsible Parties:	Proponent
Project Phase:	All Phases

Objective:	To ensure that the general public can access information on how potential impacts from project-related shipping activities will be mitigated.
Term or Condition:	The Proponent shall maintain a standalone Shipping Management Plan which provides an overview of:
	<ul> <li>a) applicable legislation, regulations, guidelines, and commitments designed to address potential adverse ecosystemic effects of shipping activities to the marine environment;</li> </ul>
	<ul> <li>b) non-confidential contracting provisions imposed by the Proponent on contractors used for project-related marine shipping that are designed to address potential adverse ecosystemic effects of shipping activities to the marine environment;</li> </ul>
	c) procedures for providing advance notice of Project-related shipping activities to potentially-affected communities; and
	<ul> <li>d) updates to Project shipping activities implemented to address concerns identified through the Proponent's public engagement efforts.</li> </ul>
Reporting Requirements:	The Plan should be submitted to the Nunavut Impact Review Board prior to the start of shipping activities, with subsequent updates or revisions to the Plan submitted annually thereafter.

Term and Condition No.	30.
Category:	Marine Environment - Shipping Contractors
Responsible Parties:	The Proponent
Project Phase:	All Phases
Objective:	To ensure that marine shipping contractors meet all applicable regulatory
Objective.	requirements.
Term or Condition:	The Proponent shall contract only Transport Canada certified vessels to carry cargo or fuel for the Project and shall ensure shippers are informed of the Proponent's applicable management plans and commitments designed to address potential adverse ecosystemic effects of shipping activities to the marine environment.
Reporting Requirements:	The Proponent shall demonstrate its compliance with this Term and Condition within its Plan and associated annual reporting to the Nunavut Impact Review Board.

Term and Condition No.	31.
Category:	Marine Environment – Marine Wildlife Mitigation
Responsible Parties:	Proponent, Fisheries and Oceans Canada
Project Phase:	All Phases
Objective:	To ensure that marine shipping activities avoid adversely impacting seabirds and marine mammals.

Term or Condition:	The Proponent shall provide its contracted vessel operators with maps and descriptions of key marine bird habitats as well as information on sensitive marine mammal habitats in the Northwest Passage, updated annually to include newly published information as it becomes available. The guidance package shall specify that, subject to vessel safety requirements, key wildlife habitats shall be avoided by a distance of at least 500 metres, and wildlife are to be given the right of way. The Proponent shall work with Fisheries and Oceans Canada to ensure that marine mammal mitigation measures common for all vessels in the Canadian Arctic are applied to project-contracted vessels as appropriate.
Reporting Requirements:	The Proponent shall demonstrate its compliance with this Term and Condition within its Plan and shall comment on the effectiveness of these measures within its associated annual reporting to the Nunavut Impact Review Board.

Term and Condition No.	32.
Category:	Marine Shipping – Vessel strikes
Responsible Parties:	Proponent
Project Phase:	All Phases
Objective:	To ensure that marine shipping activities avoid seabirds and marine mammals.
Term or Condition:	The Proponent shall ensure that shippers retained for project related shipping immediately report any accidental contact by project vessels with marine mammals or seabird colonies to Fisheries and Oceans Canada and Environment and Climate Change Canada respectively. The Proponent shall also ensure that the circumstances of the incident are investigated to determine if additional mitigative measures are required.
Reporting Requirements:	A summary of any vessel strikes, and any adaptive management steps undertaken, shall be included in the Proponent's annual report to the Nunavut Impact Review Board.

Term and Condition No.	33.
Category:	Marine Environment - Noise Monitoring
Responsible Parties:	The Proponent
Project Phase:	All Phases
Objective:	To ensure that project activities and project-related marine shipping do not cause unacceptable noise exposure to marine wildlife.
Term or Condition:	The Proponent shall develop a monitoring protocol for assessing disturbance to marine wildlife resulting from project-related underwater noise in Roberts Bay, and to facilitate assessment of the potential short term, long term, and cumulative effects of project-related noise (including vessel noise in Roberts Bay) on marine wildlife. The Proponent is expected to work with Fisheries and Oceans Canada to determine appropriate indicators and thresholds that can be used to determine if negative

	impacts on marine wildlife are occurring, and adaptive management
	measures to mitigate adverse impacts of project-related noise.
Reporting Requirements:	The monitoring protocol should be incorproated into an appropriate
	management plan and shall be provided to the Nunavut Impact Review
	Board (NIRB) prior to commencement of construction and project-related
	shipping, with summary discussion of associated implementation included
	within annual reporting to the NIRB.

## **Socio-Economic Terms and Conditions**

Term and Condition No.	34.
Category:	Economic Development and Opportunities – Socio-Economic Monitoring
Responsible Parties:	The Proponent, the Kitikmeot Inuit Association, Government of Nunavut,
	Indigenous and Northern Affairs Canada, and Kitikmeot communities
Project Phase:	All Phases
Objective:	To assess the socio-economic impact of the Project on affected
	communities of Nunavut.
	The Proponent shall continue to be an active member in the Hope Bay
	Socio-Economic Working Group. Invited members of this Working Group
	shall include the Proponent, the Government of Nunavut, Indigenous and
	Northern Affairs Canada, and the Kitikmeot Inuit Association. Working
	Group members may invite new participants on an as needed basis.
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	The central focus of the Hope Bay Socio-Economic Working Group shall be
Term or Condition:	on collaborating to ensure that the Hope Bay Socio-Economic Monitoring
	Plan provides for appropriate Project-specific socio-economic effects
	monitoring as required throughout the life of the Project. The Hope Bay
	Socio-Economic Monitoring Plan shall apply to the Project as described in the Final Environmental Impact Statement (FEIS) for the Project.
	the final Environmental impact statement (i Lis) for the Project.
	The Proponent shall submit an updated Hope Bay Socio-Economic
	Monitoring Plan to the Hope Bay Socio-Economic Working Group for
	review within one (1) year of the issuance of a Project Certificate.
	The Proponent shall, reflecting the input of the Hope Bay Socio-Economic
	Working Group, report annually to the Nunavut Impact Review Board
	(NIRB) on implementation of the Hope Bay Socio-Economic Monitoring
Reporting Requirements:	Plan. The NIRB strongly suggests the use of a standardized reporting
	template to ensure consistent data collection and tracking of data trends
	in a comparable form to be shared upon request at the regional level and
	to minimize the duplication of efforts.
Related Terms and	
Conditions in PC No. 003	Terms and Conditions No. 28 and 40
(as amended)	

Term and Condition No.	35.
Category:	Economic Development and Opportunities – Temporary or Final Closure

Responsible Parties:	The Proponent, Hope Bay Socio-Economic Working Group, and the Kitikmeot Socio-Economic Monitoring Committee
Project Phase:	Temporary Closure/Care and Maintenance, Closure and Post-Closure
Objective:	To prepare for, monitor and mitigate the potential socio-economic effects of temporary or permanent mine closure on the affected communities of Nunavut.
Term or Condition:	Within six (6) months following an unanticipated temporary or final closure, and at least two (2) years prior to the planned Final Closure of the Project, the Proponent shall, in collaboration with the Hope Bay Socio-Economic Working Group submit an updated Hope Bay Socio-Economic Monitoring Plan to the Kitikmeot Socio-Economic Monitoring Committee that will also include detail regarding specific measures that may mitigate the potential for negative effects as a result of the Project's temporary or permanent closure.
Reporting Requirements:	The Proponent shall submit the updated Hope Bay Socio-Economic Monitoring Plan to the Nunavut Impact Review Board (NIRB) at the same time as to the Kitikmeot Socio-Economic Monitoring Committee.
Related Terms and Conditions in PC No. 003 (as amended)	Terms and Conditions No. 41 and 42

Term and Condition No.	36.
Category:	Economic Development and Opportunities – Temporary or Final Closure
Responsible Parties:	The Proponent, Hope Bay Socio-Economic Working Group, and the
Responsible Farties.	Kitikmeot Socio-Economic Monitoring Committee
Project Phase:	Temporary Closure/Care and Maintenance, Closure and Post-Closure
	To prepare for, monitor and mitigate the potential socio-economic effects
Objective:	of temporary or permanent mine closure on the affected communities of
	Nunavut.
	Within six (6) months following an unanticipated temporary or final
	closure, and at least two (2) years prior to the planned Final Closure of the
	Project (regardless of whether the Project has, at that time, already
	ceased operations, is being maintained in a temporarily closed phase or
Term or Condition:	has already entered the final closure phase), the Proponent shall, submit
	an updated Human Resources Plan and Wellness Strategy for the Project
	that includes a Workforce Transition Strategy designed to mitigate the
	potential negative effects of Project closure on the affected communities
	of Nunavut.
Reporting Requirements:	The Proponent shall submit the updated plans to the Nunavut Impact
	Review Board (NIRB) in accordance with the timelines prescribed.
Related Terms and	
Conditions in PC No. 003	Terms and Conditions No. 43 and 44
(as amended)	

Term and Condition No.	37.

Category:	Economic Development and Business Opportunities – Impacts on Existing Customers
Responsible Parties:	The Proponent
Project Phase:	All Phases
Objective:	To monitor the extent to which businesses shift their businesses to become dependent on exclusively providing goods and services to the Proponent, resulting in existing customers losing access to necessary goods and services.
Term or Condition:	The Proponent shall track and report on project procurement of local and regional businesses and competition for access to local and regional businesses by existing customers. Specific indicator(s) to assess the potential for these effects shall be chosen and developed as agreed to by the Hope Bay Socio-Economic Working Group (SEWG)Activities related to monitoring and development of mitigation, including use and disclosure of information and data, will adhere to the SEWG Terms of Reference.
Reporting Requirements:	Summaries of Socio-Economic Working Group activities, list of indicators, and results of indicator monitoring shall be provided in the Proponent's Socio-Economic Monitoring Program reports as part of the Proponent's annual reports to the Nunavut Impact Review Board.

Term and Condition No.	38.
Category:	Employment – Staff Schedule
Responsible Parties:	The Proponent
Project Phase:	All Phases
Objective:	To produce accurate labour market information regarding available Project employment and skill requirements for the Project to support economic and employment forecasting.
Term or Condition:	<ul> <li>The Proponent is strongly encouraged to submit staff schedule forecasts that, at a minimum, include the following:</li> <li>a) Title of positions required by department and division;</li> <li>b) Quantity of positions available by project phase and year;</li> <li>c) Transferable skills, both certified and uncertified which may be required for, or gained during, employment within each position;</li> <li>d) The National Occupational Classification code for each individual position.</li> </ul>
Reporting Requirements:	The staff schedule forecasts should be provided on an annual basis to the Kitikmeot Socio-Economic Monitoring Committee, with a summary of forecasting provided in the annual reports to the Nunavut Impact Review Board.

Term and Condition No.	39.
Category:	Socio-Economic Impacts - Employment
Responsible Parties:	The Proponent, Hope Bay Socio-Economic Working Group
Project Phase:	All phases

Objective:	To monitor the socio-economic effects of the Project, including employment, on affected communities of Nunavut and compare these
	effects to the impact predictions made for the Project.
Term or Condition:	The Proponent reflecting input from should collaborate with the Hope Bay Socio-Economic Working Group and the Kitikmeot Socio-Economic Monitoring Committee, should included in its annual Hope Bay Socio-Economic Monitoring Plan report levels of Inuit employment at the Project as well as barriers and opportunities to achieving the high levels of employment described on page 3-137 of the Madrid Boston Project Final Environmental Impact Statement. Inuit Impact Benefit Agreement Implementation Committee to monitor efforts, by stakeholders, including the Proponent, to meet mutually agreed annual Inuit employment targets
	for the Project.
Reporting Requirements:	Summary information addressing the Proponent's fulfillment of this Term and Condition shall be included in the Proponent's annual report to the
	Nunavut Impact Review Board.
Related Terms and	
Conditions in PC No. 003 (as amended)	Terms and Conditions No. 28 and 40

Commentary: To reflect the concerns of the Kitikmeot Inuit Association, the Responsible Ministers have varied the wording in NIRB's recommended Term and Condition #39.

Term and Condition No.	40.
Category:	Education and Training—Registration of Trades Workers
Responsible Parties:	The Proponent, Government of Nunavut
Project Phase:	All Phases
	To ensure that the Government of Nunavut has accurate information to
Objective:	assist in its role as overseer of the apprenticeship program in Nunavut and
	in providing access to training initiatives and programs.
Term or Condition:	The Proponent is encouraged to identify and register all trades
	occupations, journeypersons, and apprentices working with the Project
	and make this information available to the Government of Nunavut to
	assist in delivery of training initiatives and programs.
Reporting Requirements:	Summary information addressing the Proponent's fulfillment of this Term
	and Condition shall be included in the Proponent's annual report to the
	Nunavut Impact Review Board.

Term and Condition No.	41.
Category:	Education and Training—Training Opportunities and Transferrable Skills
Responsible Parties:	The Proponent, Government of Nunavut, Training Organizations
Project Phase:	All Phases
Objective:	To ensure that the local, regional, and territorial training opportunities associated with the Project maximize opportunities for the regional workforce to obtain transferable skills and certifications.

Term or Condition:	The Proponent is encouraged to work with training organizations and/or government departments offering mine-related or other training to ensure that Project-specific training programs can yield additional opportunities for residents and employees to gain meaningful and transferable skills and certifications. The Proponent shall maintain an easily referenced listing of formal certificates and licences that may be acquired via on-site training or training during project employment. The listing should indicate which of these certifications and licences would be transferable to a similar job site within Nunavut.
Reporting Requirements:	The Proponent should summarize the results of these efforts in the annual Hope Bay socio-economic monitoring reports submitted to the Nunavut Impact Review Board and shared with the wider Kitikmeot Socio-Economic Monitoring Committee throughout the life of the Project.

Term and Condition No.	42.
Category:	Population Demographics – Monitoring Demographic Changes
Responsible Parties:	The Proponent and the Kitikmeot Socio-Economic Monitoring Committee
Project Phase:	Pre-Construction, Construction, Operation, Temporary Closure/Care and Maintenance, Closure, and Post-Closure Monitoring
Objective:	Monitoring demographic changes affecting the Kitikmeot communities and the territory as a whole is important to understand and evaluate the Proponent's predictions with regards to population demographics and whether any trends are identified which may be correlated with the Project.
Term or Condition:	Provided the collection and sharing of such information is consistent with and not limited by any Inuit Impact and Benefit Agreement with the Kitikmeot Inuit Association and that employees are willing to voluntarily provide this information, the Proponent should collect and provide project-specific data concerning employee community of residence and number of employees that relocated from the year prior (where available, to and from, for Cambridge Bay, Kugluktuk, Gjoa Haven, Taloyoak, Kugaaruk). The details of this process will be captured in the terms of reference for the project specific Phase 2 Hope Bay Belt Socio-Economic Monitoring Committee.
Reporting Requirements:	Summaries of this information should be included in the annual Phase 2 Hope Bay Belt socio-economic monitoring reports submitted to the Nunavut Impact Review Board and shared with the wider Kitikmeot Socio-Economic Monitoring Committee throughout the life of the Project.

## **Traditional Activity and Knowledge**

Term and Condition No.	43.
Category:	Traditional Activity and Knowledge
Responsible Parties:	The Proponent
Project Phase:	All Phases

Objective:	To demonstrate the incorporation of Inuit Qaujimaningit through monitoring plans developed for the Project.
Term or Condition:	The Proponent should ensure that the development of all project monitoring plans, associated reporting and updates are undertaken with active engagement of Kitikmeot communities, land users, and harvesters. The Proponent should work with the Kitikmeot Inuit Association, the local Hunters and Trappers Organizations and the Kitikmeot Socio-Economic Monitoring Committee to report on the collection and integration of Inuit Qaujimaningit through its monitoring programs for the Project.
Reporting Requirements:	To the extent that the sharing of such information is consistent with, and not limited by, confidentiality or other agreements, summaries addressing the Proponent's fulfillment of this Term and Condition should be included in the Proponent's annual report to the Nunavut Impact Review Board.

Term and Condition No.	44.
Category:	Non-Traditional Activity and Resource Use
Responsible Parties:	The Proponent
Project Phase:	All Phases
Objective:	To assess and monitor potential project effects on non-traditional activity
	and knowledge.
	The Proponent is strongly encouraged to consult with outfitting and
Term or Condition:	guiding businesses that operate in or travel through the regional study
	area regarding whether project infrastructure or activities is adversely
	affecting their use and experience of the surrounding environment.
	Summaries of consultation and monitoring undertaken by the Proponent
Reporting Requirements:	in fulfillment of this Term and Condition should be provided within the
	Proponent's annual report to the Nunavut Impact Review Board.

Term and Condition No.	45.
Category:	Heritage Resources – Archaeological and Palaeontological Resources
Category.	Surveys
Responsible Parties:	The Proponent
Project Phase:	Pre-construction, Construction, Operations
	To prevent adverse impacts to heritage resources and provide parties with
Objective:	updated information on the status of heritage resources in the project
	footprint.
	The Proponent shall conduct archaeological and palaeontological surveys
Term or Condition:	prior to land disturbance related to the Project and report survey results
Term or Condition:	to applicable parties, including the Government of Nunavut – Department
	of Culture and Heritage.
	Evidence of meeting the requirements of this Term and Condition shall be
Reporting Requirements:	submitted as part of the Proponent's annual reporting to the Nunavut
	Impact Review Board.

Term and Condition No.	46.	

Category:	Heritage Resources – Archaeological and Palaeontological Discoveries	
Responsible Parties:	The Proponent	
Project Phase:	All Phases	
Objective:	To ensure that any heritage resources encountered are reported to appropriate regulatory authorities.	
Term or Condition:	The Proponent shall report any archaeological or palaeontological sites discovered during the construction, operation, and closure phases to the Government of Nunavut – Department of Culture and Heritage and the Kitikmeot Inuit Association. Upon discovering a heritage resources site, the Proponent shall:  a) Take all reasonable precautions necessary to protect the site until further direction is received from the Government of Nunavut – Department of Culture and Heritage; and b) If it becomes necessary to disturb a heritage resources site, the Proponent shall consult with the Government of Nunavut – Department of Culture and Heritage, the Kitikmeot Inuit Association, and potential impacted communities to establish a site-specific mitigation plan, and obtain all necessary authorizations.	
Reporting Requirements:	Evidence of meeting the requirements of this Term and Condition shall be submitted as part of the Proponent's annual reporting to the Nunavut Impact Review Board.	

Term and Condition No.	47.	
Category:	Individual and Community Wellness – Health and Wellness	
Responsible Parties:	The Proponent, the Government of Nunavut	
Project Phase:	Operations	
Objective:	To promote employee health and well-being.	
Term or Condition:	The Proponent shall  a) provide workers access to sexual health information throughout the life of the Project;  b) inform workers of the range of health and wellness services available on site throughout the life of the Project; and  c) participate in discussions and dialogue with the Government of Nunavut Department of Health in connection with project activities, policies, or project-induced health issues that may affect health and social services facilities, programs and services.	
Reporting Requirements:	Evidence of meeting the requirements of this Term and Condition, including outcomes from the Proponent's engagement with the Government of Nunavut regarding public health and social services issues of relevance to the Project and communities of the Kitikmeot Region shall be submitted as part of the Proponent's annual reporting to the Nunavut Impact Review Board.	

Term and Condition No.	48.

Category:	Individual and Community Wellness – Cross-cultural awareness	
Responsible Parties:	The Proponent	
Project Phase:	Operations	
	To support the elimination of cultural barriers and promote recognition	
Objective:	for Inuit Qaujimaningit to establish a healthy workplace for all Project	
	employees	
	The Proponent is encouraged to promote consideration for Inuit culture	
	and Inuit Qaujimaningit through the establishment of cross-cultural	
Term or Condition:	training initiatives, for all Project employees and on-site sub-contractors.	
	The Proponent should actively monitor the implementation of these	
	initiatives throughout the life of the Project.	
	Evidence of meeting the requirements of this Term and Condition shall be	
Reporting Requirements:	submitted as part of the Proponent's annual reporting to the Nunavut	
	Impact Review Board.	

Term and Condition No.	49.	
Category:	Community Involvement Plan	
Responsible Parties:	The Proponent	
Project Phase:	All Phases	
Objective:	To ensure appropriate stakeholders are included in ongoing consultation and engagement.	
Term or Condition:	The Proponent shall maintain a current Community Involvement Plan which reflects relevant stakeholders with respect to the Project.  a) Records of communication and engagement undertaken by the Proponent with stakeholders, including potentially impacted communities, are to be maintained throughout the life of the Project with outcomes reflected in this Plan.	
Reporting Requirements:	The Proponent shall provide summaries of any significant community engagement undertaken and resultant updates to the Community Involvement Plan within its annual reports to the Nunavut Impact Review Board.	

Term and Condition No.	50.	
Catagory	Human Health and Ecological Risk Assessment – Assessment of Risks	
Category:	from Consumption of Berries near Project Area	
Responsible Parties:	The Proponent	
Project Phase:	Construction and Operation	
Objective:	To minimize the potential risks from consumption of berries containing	
	potential toxic metals.	
Term or Condition:	The Proponent shall conduct soil sampling to determine metal levels of	
	soils in areas with berry-producing plants near any of the potential	
	development areas, prior to commencing operations.	
Reporting Requirements:	A summary of the results of these additional studies shall be included in	
	the Proponent's annual report to the Nunavut Impact Review Board.	

Term and Condition No.	51.
Category:	Human Health and Ecological Risk Assessment – Assessment of Risks from
	Consumption of Fish from Marine/Freshwater Aquatic Environment
Responsible Parties:	The Proponent
Project Phase:	All Phases
Objective:	To minimize the potential risks from consumption of fish containing toxic
	metals including metalloids
Term or Condition:	The Proponent shall conduct additional studies prior to and during operations as part of its freshwater and marine aquatic effects analyses to ensure that toxic trace elements concentrations anticipated to increase in the aquatic and marine environments during operation (and potentially accumulating in fish tissue) do not exceed regulatory requirements. The results of these studies should inform the Proponent's assessment of potential risks from consumption of fish, using Health Canada's hazard quotients as a descriptive tool.
Reporting Requirements:	A summary of the results of these studies and associated assessment of potential risks to human health shall be included in the Proponent's annual reports to the Nunavut Impact Review Board.

Term and Condition No.	52.
Category:	Accidents and Malfunctions – Spills Response and Emergency Preparedness
Responsible Parties:	The Proponent, Transport Canada
Project Phase:	All Phases
Objective:	To ensure adequate spill response and emergency preparedness is in place to prevent fuel and chemical spills to the terrestrial and marine environment.
Term or Condition:	The Proponent shall ensure that areas used to store fuel or hazardous materials include sufficient secondary containment and that all oil handling facilities have the required Oil Pollution Emergency Plan (OPEP) in place. The OPEP or other emergency response plans applicable to fuel or hazardous material storage areas are expected to include, as a minimum, the following:  a) information on the placement of spill prevention and response equipment as necessary to initiate rapid response during an emergency;  b) an up to date listing of critical TMAC and government spill response contacts, and a list of authorised emergency response personnel;  c) an up to date listing of emergency response training conducted by TMAC's emergency response personnel;  d) easily accessible and up to date spill report forms; and

	e) a listing of community organizations that would be contacted to
	inform traditional land users of any spills or response actions
	implemented to ensure continued public safety.
	The Proponent shall also demonstrate that the provisions of the OPEP or
	other applicable emergency response plans associated with the fuel tank
	farm at Roberts Bay are coordinated with the individual shipboard OPEPs
	required for vessels servicing the Project, and that the Shipping
	Management Plan addresses how response procedures between ship and
	shore will be coordinated.
	The Oil Pollution Emergency Response Plan (OPEP) and any other
	applicable emergency response plans should be provided to the Nunavut
Reporting Requirements:	Impact Review Board (NIRB) prior to construction of the Project. Within
Reporting Requirements.	its annual reporting to the NIRB, the Proponent shall include a discussion
	of any pollution incidents associated with the Project and identify any
	required plan updates.
Related Terms and	
Conditions in PC No. 003	Terms and Conditions No. 20 and 33
(as amended)	

Term and Condition No.	53.
Category:	Tailings Pipeline Monitoring – land-based infrastructure
Responsible Parties:	The Proponent
Project Phase:	All phases
Objective:	To prevent potential impacts to permafrost and sensitive land features, including the freshwater environment, by maintaining the integrity of the tailings pipeline infrastructure.
Term or Condition:	<ul> <li>The Proponent shall implement a monitoring and mitigation program for the tailings pipelines that includes the following:</li> <li>a) regular inspections to assess the stability of the tailings pipeline and land within the footprint of this infrastructure;</li> <li>b) early warning system(s) to identify a pipeline breach;</li> <li>c) measures to respond to and mitigate any accidental spills of tailings from the pipeline; and</li> <li>d) adaptive management to address unanticipated changes to land within the footprint of the tailings pipeline to ensure that the integrity of this infrastructure is maintained for the life of the Project.</li> </ul>
Reporting Requirements:	Details regarding the monitoring and mitigation program shall be submitted to the Nunavut Impact Review Board (NIRB) prior to the installation of tailings pipeline infrastructure, with subsequent updates on the implementation of the Program submitted annually thereafter or as may otherwise be required by the NIRB for the life of the Project.

Term and Condition No.	54.
Category:	Cumulative effects – activities in the Hope Bay Belt Property
Responsible Parties:	The Proponent
Project Phase:	All Phases
Objective:	To ensure all potential cumulative effects associated with ongoing exploration and possible future phases of development are adequately and fully assessed.
Term or Condition:	The Proponent shall provide detailed updates to the Board on the status of ongoing exploration programs and other related physical activities associated with the Hope Bay Belt Property.
Reporting Requirements:	Evidence of meeting the requirements of this Term and Condition should be submitted as part of the Proponent's annual reporting to the Nunavut Impact Review Board.



## **Appendix A: Project Specific Monitoring Framework**

[To be developed]



## **Appendix B: Table of Commitments from the Final Hearing**

The following table provides a listing of commitments confirmed by the parties at the Phase 2 Hope Bay Belt Project Final Hearing. Although some of these commitments have provided the basis for the Board's recommended terms and conditions, others, due to various reasons, such as limits on the Board's jurisdiction, are not expressly included as terms and conditions or recommendations to the parties. However, even for those commitments that have not become recommendations or recommended terms and conditions, it is the Board's expectation that all parties will make best efforts to fulfill all commitments included in the attached Table of Commitments. The Board notes the reliance of the parties and the Board on the commitments provided to come to resolution of outstanding issues during the technical review of the Phase 2 Hope Bay Belt Project and at the Final Hearing. Consequently, the Board recognizes the importance of honouring commitments to the credibility of the Board's assessment process and expects that these commitments will be fulfilled by the Proponent.

No.	Subject	Commitment	Issue Raised by	<b>Project Phase/Timing</b>
			(Date of Commitment)	
Terrestri	al Environment Com	nmitments		
1	Vegetation	TMAC will speak with the KIA prior to the hearings to come to	Kitikmeot Inuit	<ul><li>Prior to</li></ul>
	sampling for food	agreement as to where sedge samples can be collected for baseline	Association	Construction.
	chain model	purposes. Based on a meeting on April 30, 2018 it was agreed to	(May 12, 2018)	
		collect a baseline of 30 samples at Boston and 30 samples at the		
		Tailings Impoundment Area and additional samples at reference		
		sites. TMAC will produce a sampling plan for review by the KIA		
		prior to construction.		
2	Noise Effects		Kitikmeot Inuit	<ul><li>All phases</li></ul>
	Significance	and provide our workers with a safe work environment, including	Association	
		work camp accommodation areas.	(May 12, 2018)	
3	Effects of road	TMAC commits to conduct vegetation monitoring if the results of	Kitikmeot Inuit	<ul><li>All phases</li></ul>
	dust on	dust fall monitoring indicate that there is the potential for effects on	Association	
	vegetation	tundra vegetation beyond that predicted in the PDA.	(May 12, 2018)	
	communities			
4	Invasive Plant	TMAC commits to including a section in the Wildlife Mitigation	Kitikmeot Inuit	<ul><li>Prior to Project</li></ul>
	Management	and Monitoring Plan (WMMP) on invasive plant species detection	Association	Commencement
		and management, and report in the annual compliance report.	(May 12, 2018)	<ul><li>Annually thereafter</li></ul>

No.	Subject	Commitment	Issue Raised by (Date of Commitment)	Project Phase/Timing
5	Road effects and traffic management for wildlife VECs	TMAC will quantify road traffic as a number of vehicle passes per day throughout a year on the two main segments of the road (Doris to Madrid and Madrid to Boston) and report annually in the WMMP compliance report.	Kitikmeot Inuit Association (May 12, 2018)	<ul><li>All phases</li><li>Year-round</li></ul>
6	Road effects and traffic management for wildlife VECs	TMAC will consider the traffic levels, observed effects to large mammals, and reflect on adaptive management options in consultation with the IEAC.	Kitikmeot Inuit Association (May 12, 2018)	<ul><li>All phases</li><li>Year-round</li></ul>
7	Migratory stand watch methods and results	TMAC commits to conducting additional migration surveys at the proposed wind turbine pad locations prior to construction (for baseline purposes), and during the appropriate survey time period to meet ECCC (2017) guidance and to capture peak migratory activity for raptors, waterbirds, and upland birds.	Kitikmeot Inuit Association (May 12, 2018)	■ Prior to Construction
8	Migratory stand watch methods and results	TMAC commits to designing the transmission line to meet the Edison Institute guidelines for reducing bird mortalities and line strikes.	Kitikmeot Inuit Association (May 12, 2018)	Prior to Construction
9	Habitat suitability mapping for furbearers (wolverine)	TMAC commits to using the habitat maps that use Terrestrial Ecosystem Mapping for wildlife management purposes and when reporting habitat loss in the annual WMMP report.	Kitikmeot Inuit Association (May 12, 2018)	<ul><li>All phases</li><li>Annually</li></ul>
10	Fisheries Offsetting	TMAC will work with DFO, the KIA, and Inuit Environmental Advisory Committee to identify candidate offsetting options with a preference for developing a community-based offsetting program located near Cambridge Bay.	Kitikmeot Inuit Association (May 12, 2018)	Prior to Construction
11	Fisheries Offsetting	TMAC will undertake field surveys in summer 2018 to ground-truth preliminary offsetting site options, and refine objectives, constraints, and opportunities associated with each site. These activities will contribute to preliminary gain calculations in support of the development of a Fisheries Offsetting Plan	Kitikmeot Inuit Association (May 12, 2018)	■ Prior to Construction

No.	Subject	Commitment	Issue Raised by (Date of	<b>Project Phase/Timing</b>
			Commitment)	
12	Water withdrawal PAD calculations	TMAC will apply adaptive management processes during monitoring. Should a high groundwater sensitivity case result in habitat losses that exceed those predicted for the base case, TMAC would apply an offsetting plan (as required by DFO) that is commensurate with these losses.	Kitikmeot Inuit Association (May 12, 2018)	■ All phases
13	Arsenic Site- Specific Water Quality Objective (SSWQO)	TMAC has reconsidered applying an SSWQO for arsenic at this early juncture of the Phase 2 Hope Bay Belt Project. Instead, it will monitor potential changes to arsenic in the Project lakes through the AEMP.	Kitikmeot Inuit Association (May 12, 2018)	<ul> <li>All phases</li> </ul>
14	AEMP Parameter Suite	TMAC agrees to add free cyanide which has a CCME water quality guideline of 0.005 mg/L and total cyanide to the AEMP parameter suite for Aimaokatalok Lake and Reference Lake B.	Kitikmeot Inuit Association (May 12, 2018)	<ul> <li>All phases</li> </ul>
15	Water Crossings	TMAC will develop and provide watercourse and site-specific engineering plans to Fisheries and Oceans Canada (DFO), supported by measured or modelled stream flow date prior to construction.	Fisheries and Oceans Canada (May 12, 2018)	<ul><li>Prior to Construction</li></ul>
16	Water Crossings	TMAC will work with DFO, the KIA, and the Inuit Environmental Advisory Committee during the regulatory phase to develop a construction plan for watercourse crossings that will include mitigation measures to reduce impacts to fish and fish habitat during construction.	Fisheries and Oceans Canada (May 12, 2018)	<ul><li>Prior to Construction</li></ul>
17	Water Crossings	TMAC will work with DFO and abide by any monitoring and reporting requirements for the authorization if and when granted.	Fisheries and Oceans Canada (May 12, 2018)	<ul><li>All phases</li></ul>
18	Water and Load Balance and predicted fish productivity loss	TMAC will monitor water levels and flows in fish bearing lakes and streams that are predicted to be potentially impacted by the Project during mining.	Fisheries and Oceans Canada (May 12, 2018)	<ul> <li>All phases</li> </ul>
19	Water Intake and Discharge Pipes	TMAC will work with DFO, the KIA, and the Inuit Environmental Advisory Committee during the regulatory phase to gain consensus on acceptable construction monitoring and reporting for freshwater	Fisheries and Oceans Canada (May 12, 2018)	<ul><li>Prior to Construction</li></ul>

No.	Subject	Commitment	Issue Raised by (Date of Commitment)	Project Phase/Timing
		pipeline infrastructure that will include the mitigation measures to be implemented to reduce impacts to fish and fish habitat during construction. TMAC anticipates that these requirements would be included in an authorization from DFO issued prior to construction.		
20	Conceptual Marine Fisheries Offsetting Approach	Should the Phase 2 Hope Bay Belt Project be approved, during the regulatory phase TMAC will work with DFO-FPP, KIA, and IEAC to develop and finalize a marine offsetting plan which is acceptable to all parties, and complies with the Fisheries Protection Policy Statement (2013) and the Fisheries Productivity Policy: A Proponent's Guide to Offsetting (November 2013). Representative fish species of each trophic level and their habitat utilization will be analyzed to ensure that all potential residual serious harm to fish and fish habitat that are part of or support commercial, recreational or Aboriginal fisheries as a result of the project are accounted for and adequately offset.	Fisheries and Oceans Canada (May 12, 2018)	■ Prior to Construction
21	Potential Impacts to Marine Mammals	As part of the WMMP, TMAC will be preparing maps and descriptions of key bird habitats such as large marine bird colonies and Prince Leopold Island for supply vessel operators. TMAC commits to updating the guidance package for vessel operators to include information on sensitive marine mammal habitats in the Northwest Passage, as described in FEIS Figures 11.2.1 and 11.2.2, and Table 11.2.1. This information will be updated to include data published since the FEIS or provided by DFO.	Fisheries and Oceans Canada (May 12, 2018)	Prior to Project Commencement
22	Potential Impacts to Marine Mammals	TMAC also commits to discussing mitigation measures for marine mammals in the Northwest Passage that are common to all vessels in Arctic waters, or as provided in a DFO guidance document for Arctic waters. All mitigation is contingent on vessel safety.	Fisheries and Oceans Canada (May 12, 2018)	Prior to Project Commencement
23	Incinerator Stack Testing	TMAC commits that new incinerators will be tested within 6 months of installation. A representative stack test on existing incinerators will be conducted after a significant change to site activities with the potential to change the waste stream or every 3 years, whatever is more frequent.	Environment and Climate Change Canada (May 12, 2018)	Within 6 (six) months of Operations

No.	Subject	Commitment	Issue Raised by (Date of Commitment)	Project Phase/Timing
				• Every 3 (three) years or less thereafter
24	Incinerator Stack Testing	In the event TMAC has emission exceedances related to incineration, TMAC will investigate to determine the possible source(s) and potential impacts of the exceedances and adaptive management options will be assessed and applied based on the identified contributing factors.	Environment and Climate Change Canada (May 12, 2018)	<ul> <li>All phases</li> </ul>
25	Nitrogen Dioxide Monitoring Passive Sampling vs Continuous Monitoring	TMAC commits to implementing continuous NO <sub>2</sub> monitoring during peak construction and during a time in operations that designates lead up to and during peak operations. Monitoring results will be compared to the Canadian Ambient Air Quality Standards (CAAQS). The results of the monitoring program will be included in the air quality portion of the Nunavut Impact Review Board Annual Report. The monitoring plan will be adjusted based on the results and effectiveness of adaptive management with consideration given to the CAAQS. In the event that emissions increase due to a change in operations, TMAC commits to additional NO <sub>2</sub> monitoring.	Environment and Climate Change Canada (May 12, 2018)	Construction and Operations
26	Dust Suppression	TMAC commits to update the Air Quality Management plans to provide description of process undertaken to achieve 75% dust management efficiency.	Environment and Climate Change Canada (May 12, 2018)	Prior to Project Commencement
27	Species at Risk	TMAC agrees to include a section in the 2018 WMMP listing the species at risk, and relevant mitigation.	Environment and Climate Change Canada (May 12, 2018)	<ul> <li>Prior to Project Commencement</li> </ul>
28	Wind Turbines – Potential Impacts to Migratory Birds	TMAC agrees to add the post-construction monitoring for the proposed wind turbine to the existing discussions with ECCC and interested parties on site-wide bird monitoring.	Environment and Climate Change Canada (May 12, 2018)	<ul><li>Prior to Project Commencement</li></ul>

No.	Subject	Commitment	Issue Raised by (Date of Commitment)	Project Phase/Timing
29	Wind Turbines – Potential Impacts to Migratory Birds	TMAC agrees to investigate and discuss preventative operational mitigation measures for wind turbines during periods of poor visibility at peak bird migration periods.	Environment and Climate Change Canada (May 12, 2018)	<ul><li>Operations</li></ul>
30	Wind Turbines – Potential Impacts to Migratory Birds	TMAC agrees to submit data sets to the centralized bird/bat monitoring database known as the "Wind Energy, Bird and Bat Monitoring Database".	Environment and Climate Change Canada (May 12, 2018)	<ul><li>Operations</li></ul>
31	Wildlife Use of Tailings Impoundment Area and Water Storage	<ul> <li>TMAC commits to updating the WMMP to include more detail on the existing monitoring and mitigation for waterbirds in the TIA, including: <ol> <li>TMAC will conduct a baseline survey for waterbirds and shorebirds at the TIA, in consultation with ECCC, to characterize the bird community and use of the TIA.</li> <li>TMAC will monitor water quality in the TIA on a regular basis during operations of the Project as per our existing water licence requirements.</li> <li>If the baseline survey indicates that birds are using the TIA, TMAC will conduct a toxicological risk assessment in consultation with ECCC.</li> <li>If that risk assessment indicates that there is a reasonable risk to birds due to living in the TIA above baseline conditions then TMAC will monitor for ongoing usage of the TIA by birds and will engage with the IEAC and ECCC on methods for deterrence of waterbirds.</li> </ol> </li> </ul>	Environment and Climate Change Canada (May 12, 2018)	• All phases
32	Cumulative Impacts of shipping in Bathurst/Elu Inlet Key Habitat Site on Migratory Birds	TMAC is open to having dialogue with ECCC on collaboration for common eiders in the Bathurst ad Elu Inlets Key Marine Habitat Sites.	Environment and Climate Change Canada (May 12, 2018)	<ul> <li>All phases</li> </ul>

No.	Subject	Commitment	Issue Raised by (Date of	Project Phase/Timing
			Commitment)	
33	Necessity of the Site Specific Water Quality Objective for Copper	TMAC has re-considered its position of adopting a copper SSWQO for the Phase 2 Hope Bay Belt Project, and will instead monitor potential changes to copper in the Project lakes through the AEMP.	Environment and Climate Change Canada (May 12, 2018)	<ul> <li>All phases</li> </ul>
34	Arsenic Site Specific Water Quality Objective	TMAC has re-considered applying an SSWQO for arsenic at this early juncture of the Phase 2 Hope Bay Belt Project. Instead, it will monitor potential changes to arsenic in the Project lakes through the AEMP.	Environment and Climate Change Canada (May 12, 2018)	<ul> <li>All phases</li> </ul>
35	Aquatic Effects Monitoring Plan Development	TMAC will update the Phase 2 Hope Bay Belt Project AEMP with an Aquatic Response Framework similar to the approach taken for the Doris AEMP. The updated AEMP will be provided to the interested parties prior to the May Final Hearing in Cambridge Bay.	Environment and Climate Change Canada (May 12, 2018)	<ul><li>Prior to commencement of Project activities</li></ul>
36	Aquatic Effects Monitoring Plan Development	TMAC will improve the harmonization between the AEMP and MMER programs in the updated Phase 2 Hope Bay Belt AEMP.	Environment and Climate Change Canada (May 12, 2018)	Prior to commencement of Project activities
37	Aquatic Effects Monitoring Plan Development	TMAC will update the Phase 2 Hope Bay Belt AEMP with an Aquatic Response Framework with environmental thresholds that trigger further mitigation/information collecting similar to the approach taken for the Doris AEMP.	Environment and Climate Change Canada (May 12, 2018)	<ul> <li>Prior to commencement of Project activities</li> </ul>
38	In-Water Works  – Cargo Dock Construction	TMAC will develop an Environmental Management Plan (EMP) prior to the initiation of cargo dock construction activities. The EMP will include, though not exclusively, mitigation measures for managing total suspended solids and turbidity, monitoring procedures, detailing sampling locations and frequency, as well as proposed limits and trigger values, in order to satisfy all applicable requirements during construction activities.	Environment and Climate Change Canada (May 12, 2018)	■ Prior to Construction
39	Post-Audit of Water Quality Modelling	TMAC maintains that the updating of predictive models will be used as adaptive management to refine closure requirements or substantial changes to the Project design. TMAC will update near-field mixing modelling and water quality predictions in the	Environment and Climate Change Canada (May 12, 2018)	<ul><li>Prior to Project Commencement</li></ul>

No.	Subject	Commitment	Issue Raised by (Date of Commitment)	Project Phase/Timing
		receiving environment of Roberts Bay if substantial changes are predicted to the effluent water quality following the re-calibration of the broader Project predictive models. The specific details for the site-wide predictive model re-calibration frequency will be determined in the water licencing phase.		
40	Ambient Air Quality	TMAC has already compared updated modelling results against the CCME CAAQS. The GN suggested commitment is note required. If GN accepts the NO <sub>2</sub> CAAQS, TMAC will implement a program of continuous NO <sub>2</sub> monitoring to ensure adequate follow up of the proposed mitigation to meet the hourly average CAAQS for NO <sub>2</sub> .	Government of Nunavut (May 12, 2018)	All phases
41	Noise	<ul> <li>a) TMAC will conduct noise measurements during quarry blasts at 2.8 and 4 km to confirm predictions.</li> <li>b) TMAC will confirm that the overpressure value of 96 Lpeak dBZ will not exceed at 2,800 m from the location of the blast.</li> <li>c) TMAC will conduct a behaviour monitoring program during blasts if caribou are observed beyond 2.8 km to evaluate how caribou respond to blasts.</li> <li>d) TMAC will include methods in WMMP to determine potential calving ground overlap with the Project.</li> </ul>	Government of Nunavut (May 12, 2018)	<ul> <li>All phases</li> </ul>
42	Waste Management	TMAC commits to update the Non-hazardous Waste Management Plan to include appropriate layout drawings of landfill facilities once issue for Construction designs have been prepared, and 60 days prior to operation of the proposed landfill.	Government of Nunavut (May 12, 2018)	• 60 days prior to Operations
43	Waste Management	<ul> <li>TMAC commits to update the Hazardous Waste Management Plan to:         <ul> <li>Remove reference to disposal of hazardous waste within the Doris Tailings Impoundment Area; and</li> <li>Remove reference to disposal of bottom ash generated from open burning and incineration in the underground mines.</li> </ul> </li> </ul>	Government of Nunavut (May 12, 2018)	<ul> <li>All phases</li> </ul>

No.	Subject		Commitment	Issue Raised by	<b>Project Phase/Timing</b>
				(Date of	
			TMAC also clarifies that the disposal of hydrocarbon contaminated	Commitment)	
			material and plastic bags from prepackaged explosives containers		
			within the underground mines is currently an approved practice		
			under the existing Doris License and TMAC does not intend to		
			change this. This disposal strategy will therefore remain in the		
			Hazardous Waste Management Plan.		
44	Vegetation	_	The Wildlife Mitigation and Monitoring Plan (WMMP) will be	Government of	<ul> <li>All phases</li> </ul>
	Rare Plants		revised to include rare plant mitigation and an annual summary of	Nunavut (May	
			potential habitat loss when construction occurs in hew areas.	12, 2018)	
45	Disruption	of		Government of	<ul><li>All phases</li></ul>
	caribou		zone-of-influence of the Project components on caribou and Project	Nunavut (May	
	movements		effects on caribou movement during the operating phase of the	12, 2018)	
			Project. The study area of these analyses shall encompass the		
			existing Doris North mining operation, Madrid North and South		
			sites, Boston site, and all connecting roads. The Proponent shall		
			collect such additional caribou collar data, over and above those		
			made available to the Proponent by the Government of Nunavut, as are necessary to operationalize this term and condition with		
			reasonable statistical power. This may be achieved through		
			collaboration with the GN or other parties.		
46	Disruption	of	The Wildlife Mitigation and Monitoring Plan (WMMP) will be	Government of	<ul><li>All phases</li></ul>
10	caribou		revised to include the following:	Nunavut (May	7 III pilases
	movements		To visco to include the following.	12, 2018)	
			■ The Project's effects on caribou movements will be		
			monitored at a local scale using behavioral observations		
			from height-of-land surveys and snow track study.		
			<ul> <li>The design of these monitoring programs will be developed</li> </ul>		
			in consultation with the Government of Nunavut and the		
			Inuit Environmental Advisory Committee, will use methods		
			supported by peer reviewed literature and will consider		
			statistical power.		

No.	Subject	Commitment	Issue Raised by (Date of	<b>Project Phase/Timing</b>
			(Date of Commitment)	
		<ul> <li>The snow track study will be designed to estimate the index</li> </ul>		
		of permeability of Project roads to caribou. These programs		
		may be discontinued after definitive results are obtained or		
		if statistical power cannot be achieved by means of		
		reasonable sampling design and effort, as determined by NIRB.		
47	Road Design -	Following construction, the Proponent shall undertake a survey to	Government of	<ul><li>Prior to Operations</li></ul>
	permeability of		Nunavut (May	
	caribou	height and slope, of the Project's roads along the length of each road	12, 2018)	
		segment. The data from this survey should be used to generate maps showing road heights and shoulder slopes for inclusion in the		
		annual report. This model should also be made available for all		
		intervenors for further assessment of potential road effects and for		
		wildlife effects monitoring.		
48	Road Design -	The Wildlife Mitigation and Monitoring Plan (WMMP) will be	Government of	<ul><li>All phases</li></ul>
	permeability of	revised to include the following:	Nunavut (May	
	caribou		12, 2018)	
		Periodically during the Project, analyses of caribou road crossing		
		behaviour will be conducted to examine crossing locations in		
		relation to wildlife crossing structures. These analyses will use		
		available data from collars, snow track surveys, and height-of-land		
49	Road Design -	monitoring. Results will be presented in annual reports.  The Wildlife Mitigation and Monitoring Plan (WMMP) will be	Government of	<ul><li>All phases</li></ul>
47	permeability of	revised to include the following:	Nunavut (May	- All pliases
	caribou	revised to include the following.	12, 2018)	
		TMAC will implement a program to monitor and report snow bank	,,	
		heights along Project roads. This program will allow estimation of		
		mean height and variance at a series of designated monitoring		
		locations that are representative of snow conditions along the roads.		
		This program will continue until operational snow management is		
		characterized.		

No.	Subject	Commitment	Issue Raised by (Date of	Project Phase/Timing
50	Road Design – permeability of	The power transmission line remains an outstanding issue between TMAC and the Government of Nunavut.	Government of Nunavut (May	■ N/A
51	caribou Traffic monitoring and management	The Wildlife Mitigation and Monitoring Plan (WMMP) will be revised to include the following:  A traffic monitoring and reporting program will be implanted to accurately estimate the rates and composition of all traffic using each of the Project's road segments (as identified in FEIS Vol. 3, table 4.5-1) annually and seasonally. This information shall be used for comparison with the traffic rates predicted in the FEIS and to support Project monitoring for wildlife effects.	Government of Nunavut (May 12, 2018)	<ul> <li>Prior to Project Commencement</li> <li>Annually and seasonally</li> </ul>
52	Traffic monitoring and management	The peak traffic rates as presented in table 4.5-1 in FEIS Vol. 3 (or those identified by the Proponent, during the Project's NIRB review) shall be established as Project monitoring thresholds. If the annual or season traffic rates estimated from Project monitoring exceed the established thresholds by greater than 25% in two (2) consecutive monitoring periods, TMAC shall conduct a revised assessment of the potential impacts of this excess traffic on wildlife. The monitoring data, analysis of effects shall be submitted in the annual WMMP compliance report for NIRB consideration.	Government of Nunavut (May 12, 2018)	<ul><li>All phases</li><li>Annually and seasonally</li></ul>
53	Caribou Effects – Zone of Influence monitoring	The Proponent shall conduct analyses of collar data to quantify the zone-of-influence of Project components on caribou and Project effects on caribou movements during the operating phase of the Project. The study area of these analyses shall encompass the existing Doris North mining operation, Madrid North and South sites, Boston site and all connecting roads. The Proponent shall collect such additional caribou collar data, over and above those made available to the Proponent by the Government of Nunavut, as are necessary to operationalize this term and condition with reasonable statistical power. This may be achieved through collaboration with the GN or other parties	Government of Nunavut (May 12, 2018)	■ All phases

No.	Subject	Commitment	Issue Raised by (Date of Commitment)	Project Phase/Timing
54	Caribou Protection Measures	The caribou-protection measure of a 1.5 km setback remains an outstanding issue between TMAC and the Government of Nunavut	Government of Nunavut (May 12, 2018)	■ N/A
55	Mitigation for grizzly bear	<ul> <li>The Wildlife Mitigation and Monitoring Plan (WMMP) will be revised to include the following:</li> <li>Prior to construction activities during denning season, surveys will be conducted to locate active big game dens within 1 (one) km of the Project. Survey design will be informed by maps of high quality denning habitat that were included within the FEIS.</li> <li>If an active big game den is located within 1 (one) km of construction activities, construction activities shall not begin until a den-site protection plan is developed in consultation with a Government of Nunavut Regional Manager of Wildlife. The plan will consider a 1 (one) km no blasting or drilling buffer, 750 m for operation of heavy equipment, and 250 m for light vehicle traffic. Exceptions to these minimums may be implemented as part of a denspecific management plan and may require a permit from the Government of Nunavut under section 74 of the Nunavut Wildlife Act.</li> <li>During construction and operations, regular ground-based observations will be conducted regularly during the denning season to identify active big game den sites within 1 (one) km of the Project that may require mitigation.</li> <li>All active big game dens within 1 (one) km shall have a den-specific management plan, developed in consultation with the GN Department of Environment (FEIS Annex Vol. 8-3, s.2.4, Table 2.4.1).</li> <li>A den-specific management plan for big game may include mitigation measures such as increased monitoring (to assess)</li> </ul>	Government of Nunavut (May 12, 2018)	■ Prior to Project Commencement

No.	Subject	Commitment	Issue Raised by (Date of	Project Phase/Timing
			<b>Commitment</b> )	
		responses to disturbance and den success), speed limit reductions and posting of signs in proximity to the den,		
		driver notifications, and avoidance during denning or den emergence.		
56	Raptor Nests	The Wildlife Mitigation and Monitoring Plan (WMMP) will be	Government of	■ Prior to Project
		revised to include the following:	Nunavut (May 12, 2018)	Commencement
		Should construction of new areas occur in the raptor breeding		
		period, TMAC will conduct a pre-construction survey of potential cliff-nesting habitat within 2 km of the Proposed Phase 2 Hope Bay		
		Belt Project development prior to construction to ensure sites have		
		been accounted for from previous surveys.		
57	Raptor Nests	The Wildlife Mitigation and Monitoring Plan (WMMP) will be	Government of	Prior to Project
		revised to include the following:	Nunavut (May 12, 2018)	Commencement
		a) If an active cliff nest is located within 1 (one) km of	12, 2010)	
		construction activities, construction activities shall not		
		begin until a nest-site protection plan is developed in		
		consultation with the Regional Manager of Wildlife (Government of Nunavut, Department of Environment).		
		The plan will consider a 1 (one) km no blasting or drilling		
		buffer, 750 m for operation of heavy equipment, and 250 m		
		for light vehicle traffic. Exceptions to these minimums may be implemented as part of a nest-specific management plan		
		and may require a permit from the Government of Nunavut		
		under sections 72 and 74 of the Nunavut Wildlife Act.		
		b) Where a raptor builds a nest on project infrastructure such		
		as a service building, the recommended cessation of		
		construction activities within a no-disturbance buffer does		
		not apply but development of a nest-specific management		
		plan is recommended.		

No.	Subject	Commitment	Issue Raised by (Date of Commitment)	Project Phase/Timing
58	Raptor Nests	The Wildlife Mitigation and Monitoring Plan (WMMP) will be revised to include the following:  Throughout the life of the Project, all potential nest sites within 1 (one) km of project activities will have a nest-specific management plan, developed in consultation with the GN Department of Environment.	Government of Nunavut (May 12, 2018)	Prior to Project Commencement
59	Air Traffic	The Wildlife Mitigation and Monitoring Plan (WMMP) will be revised to include the following:  Fixed-wing landings/take-offs at Project airstrips will be recorded. These data will be reported in the annual WMMP compliance report. The reported information will be used to verify EIS predictions regarding flight frequency.	Government of Nunavut (May 12, 2018)	Prior to Project Commencement
60	Air Traffic	The Wildlife Mitigation and Monitoring Plan (WMMP) will be revised to include the following:  Helicopter flight logs will be collected and will be reported in the annual WMMP compliance report. The reported information will be used to (1) verify the accuracy of EIS predictions about the frequency and distribution of helicopter traffic; (2) verify assumptions about helicopter traffic that were made in the noise modeling study; and (3) facilitate other Project effects monitoring programs such as wildlife ZOI and movement studies.	Government of Nunavut (May 12, 2018)	Prior to Project Commencement
61	Air Traffic	The Project's Wildlife Mitigation and Monitoring Plan shall be revised to clarify the following:  That the 600 m horizontal avoidance buffer for operation of helicopters near caribou also applies to helicopters on the ground such that engine starts and takeoffs of helicopters will be suspended	Government of Nunavut (May 12, 2018)	Prior to Project Commencement

No.	Subject	Commitment	Issue Raised by (Date of Commitment)	Project Phase/Timing
		when caribou are observed within the buffer distance, subject to the operational safety discretion of the pilot.		
62	Muskoxen Mitigation	The WMMP will be revised to clarify that driver rules used for caribou (as detailed in the WMMP; Figure 2.2-1 Driver Mitigation for Caribou) will be applied to muskoxen.	Government of Nunavut (May 12, 2018)	<ul> <li>Prior to Project Commencement</li> </ul>
63	Exceedances of Criteria Air Contaminants	NO <sub>2</sub> mitigation: Wind power generation may be pursued, which would be expected to reduce NOx emissions due to reduced power plant operation.	Health Canada (May 12, 2018)	■ No timeline provided
64	Exceedances of Criteria Air Contaminants	NO <sub>2</sub> mitigation: Consideration of taller stacks at the Madrid North and Boston power plants to promote greater dispersion.	Health Canada (May 12, 2018)	No timeline provided
65	Exceedances of Criteria Air Contaminants	NO <sub>2</sub> mitigation: Consideration for additional NOx emissions reductions during detailed Project design. These may include energy efficiency methodologies	Health Canada (May 12, 2018)	■ No timeline provided
66	Aviation Safety	TMAC will comply with the regulations under Subpart 7 (307.01) of the Canadian Aviation Regulations (CAR).	Health Canada (May 12, 2018)	<ul> <li>All phases</li> </ul>
67	Use of Silt Curtains in Construction of Roberts Bay Cargo Dock	TMAC will install and use silt curtains during in-water construction of the cargo dock as stipulated in the FEIS Volume 5, Section 10.5.3.2 unless directed otherwise by DFO during the regulatory phase	Indigenous and Northern Affairs Canada (May 12, 2018)	■ Construction
68	Use of Revegetation as a Reclamation Option	TMAC will, as part of the next formal update to the project closure and reclamation plan, post issuance of the Water Licences, include pertinent information and recommendations from Newmont and KIA's active revegetation trials at Hope Bay. This site specific information will inform how revegetation can be applied, as appropriate, at closure.	Indigenous and Northern Affairs Canada (May 12, 2018)	Post-regulatory phase
	Economic Commitmen			
69	Employee Sexual Health	TMAC will continue to support sexual health awareness and education by providing workers access to sexual health information throughout the life of the Project.	Government of Nunavut (May 12, 2018)	All phases

No.	Subject	Commitment	Issue Raised by (Date of Commitment)	Project Phase/Timing
70	Employee Sexual Health	The Proponent shall ensure that all reportable diseases are reported as per the existing regulations. Further, the Proponent will develop capacity to reduce public health related diseases that are demonstrated to be linked to camp populations when date is presented to the Proponent regarding regional increases in related diseases.	Government of Nunavut (May 12, 2018)	<ul> <li>All phases</li> </ul>
71	Employee Sexual Health	TMAC will continue to inform workers of the range of health services available on-site throughout the life of the Project.	Government of Nunavut (May 12, 2018)	All phases
72	Employee Sexual Health	The Proponent shall, on a regular and on-going basis, participate in discussions and dialogue with the GN Department of Health in connection with Project activities, policies, or Project-induced public health issues which may have effect on health and social services facilities, programs and services.	Government of Nunavut (May 12, 2018)	<ul> <li>All phases</li> </ul>
73	Economic Impact Report Model Summary	The Proponent will communicate to the GN available information on major changes to Project-related tax and in the case that any major change occurs, or as needed. This communication will not preclude either party from contracting the other to request an updated estimate of territorial taxes.	Government of Nunavut (May 12, 2018)	<ul> <li>All phases</li> </ul>
74	Community Involvement Plan	The Proponent will periodically review the Community Involvement Plan (CIP) and, as required, shall update the CIP to ensure that it reflects current and relevant stakeholders, as well as effective communication and engagement methods with stakeholders throughout the life of the Project.	Government of Nunavut (May 12, 2018)	All phases
75	Socio-Economic Monitoring	The Proponent continues to be an active member in the Hope Bay Socio-Economic Working Group. Invited members of this Working Group shall include the Proponent, the Government of Nunavut, Indigenous and Northern Affairs Canada, and the Kitikmeot Inuit Association. Working Group members may invite new participants to participate, on an as-needed basis.	Government of Nunavut (May 12, 2018)	All phases

No.	Subject	Commitment	Issue Raised by (Date of	Project Phase/Timing
76	Socio-Economic Monitoring	The central focus of the Hope Bay Socio-Economic Working Group shall be on collaborating to ensure that the Hope Bay Socio-Economic Monitoring Plan provides for appropriate Project-specific socio-economic effects monitoring as required throughout the life of the Project. The Hope Bay Socio-Economic Monitoring Plan shall apply to the Project as described in the FEIS.  The Proponent, reflecting the input of the Hope Bay Socio-Economic Working Group, shall produce an annual Hope Bay Socio-Economic Monitoring Plan report.  Within one (1) year of the issuance of a Project Certificate, the Proponent shall submit an updated Hope Bay Socio-Economic Monitoring Plan (SEMP) to the Hope Bay Socio-Economic Working Group for review. The SEMP shall identify updates, changes, and any amendments made to the Terms of Reference for the Hope Bay Socio-Economic Working Group. Updates to the SEMP shall reflect the changing circumstances as outlined in the Hope Bay Final Environmental Impact Statement and Final Hearing Report. Any changes as agreed to by the Hope Bay Socio-	Government of Nunavut (May 12, 2018)	• Within 1 (one) year of the issuance of a project certificate
77	Financial	Economic Working Group shall be submitted to the Nunavut Impact Review Board.  The Proponent shall reach out to third parties to deliver financial	Government of	<ul><li>All phases</li></ul>
//	Literacy and Employment- Induced Migration and Relocation	management programs such as financial literacy, financial planning, and personal budgeting. TMAC will approach Nunavut Housing Corporation and GN Department of Family Services (or other GN departments as appropriate) to solicit input and/or participate in the delivery of programming to Project workers.	Nunavut (May 12, 2018)	- An phases
78	Financial Literacy	The Proponent will track statistics regarding the delivery of the financial management programming. The Proponent will share relevant data concerning the implementation and success of training and education programs during the Kitikmeot SEMC annual	Government of Nunavut (May 12, 2018)	<ul> <li>All phases</li> </ul>

No.	Subject		Commitment	Issue Raised by (Date of Commitment)	Project Phase/Timing
			meeting, so long as these data are consistent with and not limited by obligations under the Hope Bay IIBA.	,	
79	Labour Analysis	Force	The Proponent is strongly encouraged to submit staff schedule forecasts to the Nunavut Impact Review Board and to the Government of Nunavut six (6) months prior to each phase of the Project (construction, operations, closure). Staff schedule forecasts should be inclusive of:  Title and number of positions required by department or work area;  Potential start dates;  The level of education required (with reference to the specific positions); and  Whether on-the-job or other forms of training and certification will be required (with reference to specific positions).	Government of Nunavut (May 12, 2018)	All phases
80	Labour Analysis	Force	In order to ensure alignment with necessary skill-sets needed to work at the Project, the Proponent will consult the Government of Nunavut's Career Development Division during the development of staff schedule forecasts. A new schedule shall be submitted following any significant deviation from original predictions.	Government of Nunavut (May 12, 2018)	All phases
81	Labour Analysis	Force		Government of Nunavut (May 12, 2018)	All phases

No.	Subject	Commitment	Issue Raised by (Date of	<b>Project Phase/Timing</b>
			Commitment)	
82	Accredited Project-Related Training for Employees	The Proponent commits to ongoing discussion with eth GN Department of Family Services and other stakeholders regarding training opportunities and requirements to fill the skills-gap of the Kitikmeot workforce.	Government of Nunavut (May 12, 2018)	<ul> <li>All phases</li> </ul>
83	Reporting Mechanisms - Housing	If the Government of Nunavut and the Nunavut Housing Corporation develop an anonymous voluntary housing survey, the Proponent shall make the survey available to Nunavummiut site personnel and the Proponent will return any completed surveys to the Government of Nunavut.	Government of Nunavut (May 12, 2018)	<ul> <li>All phases</li> </ul>
84	Employment-Induced Migration and Relocation	The Proponent will support the communication to Project workers of education, training materials, and programs (i.e. homeownership) developed by the Nunavut Housing Corporations that focuses on enhancing employee understanding and access to housing options in the Project LSA  The Proponent shall reach out to third parties to deliver financial management programs such as financial literacy, financial planning, and personal budgeting. TMAC will approach Nunavut Housing Corporation and GN Department of Family Services (or other GN departments as appropriate) to solicit input and/or participate in the delivery of programming to Project workers.	Government of Nunavut (May 12, 2018)	■ All phases
85	Impact Prediction – Competition for Local Labour	TMAC shall collaborate with the Hope Bay Socio-Economic Working Group (SEWG) to ensure that the Hope Bay Socio-Economic Monitoring Program provides for appropriate Project-specific socio-economic effects monitoring of the potential effect of competition for labour. Specific indictor(s) will be developed as agreed to by the SEWG, and considering the input of the Kitikmeot Socio-economic Monitoring Committee, to track and report on the extent to which the Project-related competition for labour may impact Kitikmeot communities. Activities related to monitoring and development of mitigation, including use and disclosure of information and data, will adhere to the SEWG Terms of Reference.	Indigenous and Northern Affairs Canada (May 12, 2018)	All phases

No.	Subject	Commitment	Issue Raised by	<b>Project Phase/Timing</b>
			(Date of	
			<b>Commitment</b> )	
86	Impact	TMAC shall collaborate with the Hope Bay Socio-Economic	Indigenous and	<ul><li>All phases</li></ul>
	Prediction –	Working Group (SEWG) to ensure that the Hope Bay Socio-	Northern	
	Competition for	Economic Monitoring Program provides for appropriate Project-	Affairs Canada	
	Access to Local	specific socio-economic effects monitoring of Project procurement	(May 12, 2018)	
	and Regional	of local regional businesses and competition for access to local and		
	Businesses	regional businesses by existing customers. Specific indictor(s) will		
		be developed as agreed to by the SEWG, and considering the input		
		of the Kitikmeot Socio-economic Monitoring Committee, to track		
		and report on the extent to which the Project procures from		
		Kitikmeot businesses and the extent to which existing customers are		
		unable to access goods and services, consistent with provisions of		
		the Hope Bay Impact and Benefit Agreement (IIBA). Activities		
		related to monitoring and development of mitigation, including use		
		and disclosure of information and data, will adhere to the SEWG		
		Terms of Reference.		

