

# SCREENING DECISION REPORT NIRB FILE No.: 17EN029

NPC File No.: 148480

#### May 18, 2017

Following the Nunavut Impact Review Board's (NIRB or Board) assessment of all materials provided, the NIRB is recommending that a review of North Country Gold Corp.'s "Gibson-MacQuoid Project" is not required pursuant to paragraph 92(1)(a) of the *Nunavut Planning and Project Assessment Act* (NuPPAA).

Subject to the Proponent's compliance with the terms and conditions as set out in below, the NIRB is of the view that the project proposal is not likely to cause significant public concerns, and it is unlikely to result in significant adverse environmental and social impacts. The NIRB therefore recommends that the responsible Minister(s) accepts this Screening Decision Report.

#### **OUTLINE OF SCREENING DECISION REPORT**

- 1) REGULATORY FRAMEWORK
- 2) Project Referral
- 3) PROJECT OVERVIEW & THE NIRB ASSESSMENT PROCESS
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- 8) OTHER NIRB CONCERNS AND RECOMMENDATIONS
- 9) REGULATORY REQUIREMENTS
- 10) CONCLUSION

#### REGULATORY FRAMEWORK

The primary objectives of the NIRB are set out in Section 12.2.5 of the Agreement between the Inuit of the Nunavut Settlement Area and Her Majesty the Queen in right of Canada (Nunavut Agreement) as follows:

"In carrying out its functions, the primary objectives of NIRB shall be at all times to protect and promote the existing and future well-being of the residents and communities of the Nunavut Settlement Area, and to protect the ecosystemic integrity of the Nunavut Settlement Area. NIRB shall take into account the well-being of the residents of Canada outside the Nunavut Settlement Area."

These objectives are confirmed under section 23 of the NuPPAA.

The purpose of screening is provided for under section 88 of the NuPPAA:

"The purpose of screening a project is to determine whether the project has the potential to result in significant ecosystemic or socio-economic impacts and, accordingly, whether it requires a review by the Board..."

To determine whether a review of a project is required, the NIRB is guided by the considerations as set out under subsection 89(1) of NuPPAA:

- "89. (1) The Board must be guided by the following considerations when it is called on to determine, on the completion of a screening, whether a review of the project is required:
  - (a) a review is required if, in the Board's opinion,
    - i. the project may have significant adverse ecosystemic or socio-economic impacts or significant adverse impacts on wildlife habitat or Inuit harvest activities,
    - ii. the project will cause significant public concern, or
    - iii. the project involves technological innovations, the effects of which are unknown; and
  - (b) a review is not required if, in the Board's opinion,
    - i. the project is unlikely to cause significant public concern, and
    - ii. its adverse ecosystemic and socioeconomic impacts are unlikely to be significant, or are highly predictable and can be adequately mitigated by known technologies."

It is noted that subsection 89(2) provides that the considerations set out in paragraph 89(1)(a) prevail over those set out in paragraph 89(1)(b).

Where the NIRB determines that a project may be carried out without a review, the NIRB has the discretion to recommend specific terms and conditions to be attached to any approval of the project proposal. Specifically, paragraph 92(2)(a) of NuPPAA provides:

- "92. (2) In its report, the Board may also
  - (a) recommend specific terms and conditions to apply in respect of a project that it determines may be carried out without a review."

#### PROJECT REFERRAL

On February 21, 2017 the Nunavut Impact Review Board (NIRB or Board) received a referral to screen North Country Gold Corp.'s (NCGC) "Gibson-MacQuoid Project" proposal from the Nunavut Planning Commission (NPC or Commission) with an accompanying positive conformity determination with the Keewatin Regional Land Use Plan.

Please note that the referral from the NPC was triggered by cumulative effects concerns pursuant to subsection 80(1) of *Nunavut Planning and Project Assessment Act* and are related to:

- a) nearby projects that have been carried out, are being carried out, or have been proposed, including projects associated with expired and active prospecting permits and mineral claims<sup>1</sup>;
- b) the project proposal's potential to induce additional projects;
- c) the project proposal's locations, as they overlap with:
  - i. core caribou calving and post-calving areas<sup>2</sup> for the Qamanirjuaq herd
  - ii. the Kazan Canadian Heritage River<sup>3</sup>
  - iii. the Fall Caribou Crossing National Historic Site
  - iv. Qamanirjuaq Caribou Protection Area and Designated Crossing<sup>4</sup>; and
- d) the area has been identified as having value and priority to local communities<sup>5</sup> for:
  - i. caribou migration, water crossings, and calving
  - ii. fishing
  - iii. muskox
  - iv. wolves and wolverines
  - v. bird nesting
  - vi. drinking water
  - vii. historic sites

Pursuant to Article 12, Sections 12.4.1 and 12.4.4 of the Agreement between the Inuit of the Nunavut Settlement Area and Her Majesty the Queen in Right of Canada (Nunavut Agreement) and section 87 of the Nunavut Planning and Project Assessment Act (NuPPAA), the NIRB commenced screening this project proposal and assigned it file number 17EN029.

#### PROJECT OVERVIEW & THE NIRB ASSESSMENT PROCESS

# 1. Project Scope

The proposed "Gibson-MacQuoid Project" is located within the Kivalliq region, approximately 100 kilometres (km) from the community of Baker Lake. The Proponent intends to conduct an early stage exploration program for gold mineralization in the Gibson-MacQuoid Region. The program is proposed to take place from July to August 2017.

As required under subsection 86(1) of the NuPPAA, the Board accepts the scope of the "Gibson-MacQuoid Project" as set out by NCGC in the project proposal. The scope of the project proposal includes the following undertakings, works, or activities:

- Use of a helicopter to transport 13 personnel and materials to and from the prospecting site(s);
- Conduct staking, prospecting, and soil sampling;

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<sup>&</sup>lt;sup>1</sup> Some nearby projects/project proposals include: Meliadine Gold Mine Project (NIRB Project Certificate No. 006), Peter, Fox, Parker Lakes (NIRB File No.: 15EN049), Parker Lake (NIRB File No.:10EN020), Baker Basin (NIRB File No.: 08EA038), and Pistol Bay (NIRB File No.: 11EN027).

<sup>&</sup>lt;sup>2</sup> Government of Nunavut Submission to the Nunavut Planning Commission for the Draft Nunavut Land Use Plan. May 28, 2014.

<sup>&</sup>lt;sup>3</sup> Kazan Heritage River Management Plan (1990) available online at: <a href="http://nunavutparks.com/wp-content/uploads/2015/08/KazanHR\_ManagementPlan.pdf">http://nunavutparks.com/wp-content/uploads/2015/08/KazanHR\_ManagementPlan.pdf</a>

<sup>&</sup>lt;sup>4</sup> Department of Indian Affairs and Northern Development (DIAND). Caribou Protection Map. March 5, 1992.

<sup>&</sup>lt;sup>5</sup> Nunavut Planning Commission Summary of Community Meetings on the Draft Nunavut Land Use Plan. 2014.

- Use of a drone for aerial photography in support of prospecting activities;
- Transportation, temporary storage and use of up to 4000 litres (L) of aviation fuel at the exploration site(s);
- Use of facilities in Baker Lake for accommodations, water source and waste management.

#### 2. Inclusion or Exclusion to Scoping List

The NIRB has identified no additional works or activities in relation to the project proposal. As a result, the NIRB proceeded with screening the project based on the scope as described above.

# 3. Key Stages of the Screening Process

The following key stages were completed:

Date	Stage
February 21, 2017	Receipt of project proposal and positive conformity determination
	(Keewatin Land Use Plan) from the NPC
February 27, 2017	Information request(s)
March 10, 2017	Proponent responded to information request(s)
March 10, 2017	Scoping pursuant to subsection 86(1) of the NuPPAA
March 15, 2017	Public engagement and comment request
April 5, 2017 <sup>6</sup>	Receipt of public comments
April 11, 2017 <sup>7</sup>	Proponent responded to comments/concerns raised by public
April 24, 2017	Ministerial extension requested from the Minister of Indigenous and
	Northern Affairs, Government of Canada

#### 4. Public Comments and Concerns

Notice regarding the NIRB's screening of this project proposal was distributed on March 15, 2017 to community organizations in Arviat, Whale Cove, Rankin Inlet, Chesterfield Inlet, Baker Lake, and Naujaat, as well as to relevant federal and territorial government agencies, Inuit organizations and other parties. The NIRB requested that interested parties review the proposal and provide the Board with any comments or concerns by April 5, 2017 regarding:

- Whether the project proposal is likely to arouse significant public concern; and if so, why;
- Whether the project proposal is likely to cause significant adverse eco-systemic or socioeconomic effects; and if so, why;
- Whether the project proposal is likely to cause significant adverse impacts on wildlife habitat or Inuit harvest activities; if so, why;
- Whether the project proposal is of a type where the potential adverse effects are highly predictable and mitigable with known technology, (please provide any recommended mitigation measures); and
- Any matter of importance to the Party related to the project proposal, including:

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<sup>&</sup>lt;sup>6</sup>On May 9, 2017 the NIRB received late comments from the Kivalliq Inuit Association.

<sup>&</sup>lt;sup>7</sup> Due to technical issues with the NIRB's online public registry, the Proponent's response to party comments, submitted on April 11, 2017, was received by the Board on April 25, 2017.

O Whether any cumulative ecosystemic and socio-economic impacts could result from the impacts of the proposed project combined with those of any other project that has been carried out, is being carried out or is likely to be carried out inside the designated area, or wholly or partly outside the designated area.

The following is a summary of the comments and concerns received by the NIRB:

# **Environment and Climate Change Canada (ECCC)**

- Noted that the list of Acts, Regulations, Guidelines and Recommendations in Corporate and Social Responsibility Action Plan to be followed by the Proponent in executing the project did not include the Migratory Birds Convention Act.
- Recommended that the Proponent include the following statement to its Corporate and Social Responsibility Action Plan: "eggs, nests and migratory birds are not to be disturbed by any activities", and that the Proponent update the emergency contact list in the Plan.

# **Indigenous and Northern Affairs Canada (INAC)**

• Noted lack of community consultation and recommended that the Proponent conduct community consultation prior to the commencement of the proposed project activities.

# 5. Comments and Concerns with respect to Inuit Qaujimaningit, Traditional, and Community Knowledge

No concerns or comments were received with respect to Inuit Qaujimaningit or traditional and community knowledge in relation to the proposed project.

#### 6. Proponent's Response to Public Comments and Concerns

The following is a summary of the Proponent's response to concerns as received on April 11, 2017:

- In response to a request for the inclusion of the Migratory Birds Convention Act (MBCA) to the list of Acts, Regulations, Guidelines and Recommendations in Corporate Social Responsibility Plan, the Proponent indicated that the Plan has been updated to include MBCA.
- In response to a request for inclusion of a statement in the Corporate Social Responsibility Action Plan regarding the prevention of disturbance to migratory birds, the Proponent noted that the Plan has been amended to include the following statement: "eggs, nests and migratory birds are not to be disturbed by any activities".
- In response to a request for updates to the contact list in the Spill Contingency Plan, the Proponent indicated that the contact list in the Plan has been revised accordingly.
- In response to concerns regarding community consultation for the Project, the Proponent indicated that it plans to conduct community consultation at the end of May, 2017 prior to commencement of the proposed mineral exploration program.

#### FACTORS FOR DETERMINING SIGNIFICANCE OF IMPACTS

In determining whether a review of the project is required, the Board considered whether the project proposal had potential to result in significant ecosystemic or socio-economic impacts.

Accordingly, the assessment of impact significance was based on the analysis of those factors that are set out under section 90 of the NuPPAA. The Board took particular care to take into account Inuit Qaujimaningit, traditional and community knowledge in carrying out its assessment and determination of the significance of impacts.

The following is a summary of the Board's assessment of the factors that are relevant to the determination of significant impacts with respect of this project proposal:

1. The size of the geographic area, including the size of wildlife habitats, likely to be affected by the impacts.

The proposed early-stage exploration activities for gold mineralization will occur in an area approximately 100 kilometres (km) from Baker Lake. The total area of the mineral claims to be explored is approximately 2,200 km². The project footprint also includes helicopter-assisted travel routes from Baker Lake to prospecting areas on the mineral claims. The proposed project activities may take place within habitat for caribou, muskox, wolf, wolverine, Arctic fox, Arctic hare, migratory and non-migratory birds, fish, and Species at Risk such as Polar Bear, as identified by the Proponent, the GN and NPC mapping sources. The project may potentially affect animal migratory patterns.

2. The ecosystemic sensitivity of that area.

The proposed project may occur in an area with ecosystemic sensitivity, including the potential for overlap of portions of the project footprint with habitat for caribou and other wildlife. Specifically, the footprint of the proposed project may overlap areas identified as having value and priority to local communities for:

- i. Abundance of caribou, muskox, wolves, and wolverine;
- ii. Caribou migration routes; and
- iii. Arctic char and lake trout.
- 3. The historical, cultural and archaeological significance of that area.

Neither the Proponent nor any parties that submitted comments for this project identified any known areas of historical, cultural and archaeological significance associated with the project. Should the project be approved to proceed, the Proponent would be required to conduct an archaeological assessment of the project area, and contact the Government of Nunavut-Department of Culture and Heritage if any sites of historical, cultural or archaeological significance are encountered.

4. The size of the human and the animal populations likely to be affected by the impacts.

The proposed project would occur at locations approximately 100 km from Baker Lake, the nearest community; as such, no human populations are likely to be affected by project impacts. However, there is the potential for impacts to community members in the Kivalliq region that may use areas in proximity to the proposed project area for traditional activities such as hunting, fishing and camping activities. As identified by the NPC in its screening referral, the project proposal may overlap core caribou calving and post calving areas for the Qamanirjuaq herd. Further, the project proposal may overlap with seasonal home ranges for caribou herds and other wildlife species. No other specific animal populations have been identified as likely to be affected by potential project impacts.

Although no significant public concerns were raised during the public commenting period, the NIRB notes that the proximity of the proposed activities to the communities of Baker Lake and Rankin Inlet, and areas used by residents of these communities for recreational/traditional pursuits could potentially contribute to public concern developing. During the public comment period, Indigenous and Northern Affairs Canada noted that the application included planned consultation in May 2017; however, INAC recommended that the consultation should be conducted prior to submitting the project proposal as well as at the start of new activities. The NIRB notes that the Proponent committed to conducting consultation at the end of May 2017, however did not indicate which communities would be consulted. As a result, a term and condition has been recommended to direct engagement with the community and interested parties, as well as the posting of public notices to ensure residents are aware of the mineral exploration activities being or to be conducted.

5. The nature, magnitude and complexity of the impacts; the probability of the impacts occurring; the frequency and duration of the impacts; and the reversibility or irreversibility of the impacts.

As the "Gibson-MacQuoid Project" is a proposed early-stage exploration program for gold mineralization involving staking, prospecting, soil sampling, and aerial photography, the nature of potential impacts is considered to be well-known. Potential adverse impacts are likely to be localized, of low magnitude, and restricted to the period of project activities (six weeks). Due to the proximity of portions of the mineral claims to caribou habitat, specific mitigation measures for the protection of critical life stages of caribou herds in the area may be necessary. Based on past evidence of similar scope of activities, potential adverse impacts will be reversible and mitigable with due care.

6. The cumulative impacts that could result from the impacts of the project combined with those of any other project that has been carried out, is being carried out or is likely to be carried out.

The proposed project would take place within a 100 kilometre (km) radius of other projects that have been or are being assessed by the Board as listed in Table 1 below.

However, it is noted that this project is not likely to result in significant residual cumulative impacts. The potential for cumulative impacts to terrestrial wildlife and habitat, fish and fish habitat, water quality, cultural and archaeological resources, ground stability, soil quality, and traditional wildlife harvesting pursuits from the proposed mineral exploration project activities and other projects occurring in the region has been identified and considered in the development of the NIRB's recommendations. Terms and conditions recommended for each of these projects are expected to reduce any residual impacts, and as such would limit or reduce the potential for cumulative effects to occur.

Table 1: Project List

NIRB Project #	Project Title	Project Type			
Active Projects					
15EN049	Parker, Peter, and Fox Lakes and	Mineral Exploration (year round)			
	Cone Hill Exploration	and Winter Road access			
		(seasonal)			
15RN010	Right of Way	Winter Road (seasonal)			
10EA018	Meliadine Bulk Sample	Mineral Exploration (year round)			
10EN006	Meliadine River – Mining	Mineral Exploration (year round)			
	Exploration				
08EN043	Meliadine East Exploration	Advanced Mineral Exploration			
		(year round)			
11MN034 (Project	Meliadine Gold Mine	Gold Mine (year round)			
Certificate No.					
006)					
11EN016	Peter Lake (now referred to as	Mineral Exploration (seasonal)			
	NxGold's Kuulu Project)				
15EN028	Kahuna Diamond Project	Mineral Exploration (seasonal)			

7. Any other factor that the Board considers relevant to the assessment of the significance of impacts.

No other specific factors have been identified as relevant to the assessment of this project proposal.

#### VIEWS OF THE BOARD

In considering the factors as set out above in the screening of the project proposal, the NIRB has identified a number of issues below and respectfully provide the following views regarding whether or not the proposed project has the potential to result in significant impacts. In addition, the NIRB has proposed terms and conditions that would mitigate the potential adverse impacts identified.

#### **Administrative Conditions:**

To encourage compliance with applicable regulatory requirements and assist the Board and responsible authorities with compliance and effects monitoring for project activities, the following project-specific terms and conditions have been recommended: 1-4.

# Ecosystem, wildlife habitat and Inuit harvesting activities:

<u>Issue 1:</u> Potential adverse impacts to caribou from noise generated by the proposed prospecting, helicopter traffic and drone use associated with the exploration program.

Board views: The activities associated with the project involve helicopter-assisted travel, drone flights, and on-land prospecting and related exploration activities. Although some components of proposed project activities may be in proximity to habitat for critical life stages of caribou (calving and post-calving), the potential impacts from noise pollution associated these proposed activities are considered to be short-term (up to 6 weeks). Also, the Proponent has committed to implement its Corporate Social Responsibility Action Plan, which includes specific mitigation measures for potential impacts to caribou such as suspension of project activities until any caribou cows and calves are a minimum of one (1) km away from the project area. The Proponent has also committed to ceasing all field activities that may interfere with caribou migration until the species have left the project area. The Proponent has also committed to not conducting the proposed activities at any time within the core calving and post calving range on Inuit Owned Lands. In addition, the Proponent has committed to consulting the communities of Baker Lake and Rankin Inlet to inform additional mitigation measures to be included in a Wildlife Mitigation and Monitoring Plan prior to commencement of the mineral exploration activities. As a result of the mitigation measures provided by the Proponent and the short duration of the proposed project, the adverse impacts to caribou and caribou habitat are considered to be infrequent and reversible.

The Proponent would also be required to follow the Wildlife Act (Nunavut) and the Canadian Aviation Regulations (see Regulatory Requirements section).

Recommended Mitigation Measures: It is recommended that the potential adverse impacts may be mitigated by measures such as requiring the Proponent to cease activities that may interfere with the migration or calving of caribou until the caribou have left the area. The Board recommends the following terms and conditions to mitigate the potential adverse impacts to caribou and caribou habitat from the proposed exploration activities: 6, 7, 14 through 17, and 21 through 28.

<u>Issue 2:</u> Potential adverse impacts to other terrestrial wildlife including muskox and birds from noise and land disturbance associated with the exploration program.

Board views: There is potential for disturbance of wildlife, such as muskoxen, wolves, wolverines, and migratory and non-migratory birds from helicopter and drone noise, and land disturbance associated with the proposed project. However, the potential adverse impact(s) of the project to terrestrial wildlife and birds is considered to be minimal due to the scale (early-stage mineral prospecting) and duration (up to 6 weeks) of the exploration program. The Proponent has committed implementing its Corporate and Social Responsibility Action Plan, which includes mitigation measures such as establishing 800 metre and 2 km buffers for active dens of wolves and wolverines, respectively. The Proponent has also committed to avoiding low-level helicopter flights

in identified nesting and denning habitat and to not disturbing eggs, nests and migratory birds are not to be disturbed by any activities. The adverse impacts to terrestrial wildlife and migratory birds are considered to be of low magnitude and reversible.

The Proponent would be required to follow the Wildlife Act (Nunavut), the Migratory Birds Convention Act, Transportation of Dangerous Goods Act, the Canadian Environmental Protection Act and the Canadian Aviation Regulations (see Regulatory Requirements section).

- Recommended Mitigation Measures: It is recommended that the potential adverse impacts may be mitigated by measures such as requiring the Proponent to ensure no damage to wildlife habitat and minimize activities during periods when birds are particularly sensitive to disturbance especially during migration, nesting and moulting. The Board recommends the following terms and conditions to mitigate the potential adverse impacts to wildlife and birds: 6, 7, and 14 through 26.
- <u>Issue 3:</u> Potential adverse impacts on fish and fish habitat, and surface water quality from erosion associated with land disturbance activities such soil sampling, and from fuel spill incidents from exploration activities.
- Board Views: The project may adversely impact fish and fish habitat and surface water quality, from fuel spills, erosion and deposition of contaminated soil into or in proximity to the aquatic environment, including fish-bearing water bodies. However, the magnitude of potential adverse impacts to fish and fish habitat, including water quality, from soil erosion is considered to be low due the level of land disturbance (early-stage prospecting and soil sampling). There is also potential for adverse impacts to the aforementioned resources from accidents and malfunctions including spills of fuel; however, the magnitude of potential adverse impacts is considered to be low due to the volume of fuel to be stored on site (4000 litres). The Proponent has committed to implementing a Fuel Management Plan and a Spill Prevention and Response Plan for the project and to establishing temporary berms at fuel caches to prevent the spread of any fuel spill incidents. As a result, the potential adverse impacts to water quality, fish and fish habitat are considered to be of low magnitude, infrequent, and reversible.

The Proponent may require a water licence from the Nunavut Water Board for the water usage activities and fuel storage. In addition, the Proponent would also be required to follow the *Fisheries Act*, the *Transportation of Dangerous Goods Regulations*, *Transportation of Dangerous Goods Act* and the *Canadian Environmental Protection Act* (see Regulatory *Requirements* section).

Recommended Mitigation Measures: It is recommended that the potential adverse impacts to fish and fish habitat, including water quality, resulting from exploration activities, specifically soil sampling and fuel storage, may be mitigated by ensuring such activities occur a minimum of thirty-one (31) metres from the high water mark of water bodies. The Board recommends the following terms and conditions to mitigate potential adverse impacts to fish and fish habitat, including water quality: 5, 8 through 11, 13, and 29.

- <u>Issue 4:</u> Potential adverse impacts to ground stability and soil quality from soil sampling and onsite fuel storage in support exploration activities.
- Board views: The activities proposed for the project, including soil sampling and the establishment of temporary fuel cache(s), may result in soil erosion and degradation of permafrost which would negatively affect ground stability and soil quality. However, the potential for impacts is limited to the footprint of fuel cache(s) and prospecting sites within the mineral claims, which are also temporary in nature (up to 6 weeks). To mitigate potential impacts to soil quality, the Proponent has committed in its Corporate and Social Responsibility Plan to ensuring that land disturbance activities associated with the project do not promote rutting and erosion. The Proponent has also committed to cleaning up and restoring the project site to its original condition, to the greatest extent possible, on completion of exploration activities. As a result, the potential adverse impacts to ground stability and soil quality are considered to be of low magnitude, short-term and reversible.

The Proponent would also be required to follow the *Transportation of Dangerous Goods Regulations*, *Transportation of Dangerous Goods Act* and the *Canadian Environmental Protection Act* (see Regulatory *Requirements* section).

- Recommended Mitigation Measures: It is recommended that potential adverse impacts to soil quality and ground stability be mitigated by measures such as requiring the Proponent implement suitable erosion and sediment suppression measures on all areas before, during and after conducting proposed activities. The following terms and conditions are recommended to mitigate the potential adverse impacts to ground stability and soil quality: 8 through 14, and 29 through 31.
- <u>Issue 5:</u> Potential adverse impacts to public and traditional land use pursuits from noise associated with aircraft use and the use a drone for aerial photography.
- Board Views: The Proponent is proposing to work in an area in proximity to caribou habitat for calving and post-calving events. There is potential for disruption of these critical caribou events as a result of noise generated from activities associated with the project proposal, which may reduce local caribou populations and availability of caribou as country food. The Proponent has committed to consulting community members in Baker Lake and Rankin Inlet prior to commencement of the proposed mineral exploration program. To mitigate the potential for adverse impacts to caribou, the NIRB has included recommendations that the Proponent conduct the operations outside of May 15 to July 15 in project areas in proximity to natural ranges for caribou calving and post-calving. The Proponent has also committed to not conducting the proposed activities at any time within the core calving and post calving range on Inuit Owned Lands.
- <u>Recommended Mitigation Measures</u>: It is recommended that potential adverse impacts to public and traditional land use activities may be mitigated by measures such as requiring the

Proponent to ensure that project activities do not interfere with Inuit wildlife harvesting or traditional land use pursuits. Term and condition 32 is recommended to ensure that the affected communities and organizations are informed about the project proposal, and term and condition 34 has been recommended to ensure that project activities do not interfere with Inuit wildlife harvesting or traditional land use activities in the area. In addition, terms and conditions 14 through 28 have been recommended to minimize interference with the movements of terrestrial wildlife and nesting/breeding birds.

#### **Socio-economic effects on northerners:**

- <u>Issue 6:</u> Potential adverse impacts to historical, cultural and archaeological sites from land disturbance as a result of the early-stage exploration activities.
- <u>Board Views:</u> The Proponent has not identified sites of historical, cultural and archaeological importance in the proposed project area. The probability of impacts to historical, cultural and archaeological sites is considered to be low due to the anticipated minimal land disturbance from the proposed early-stage exploration activities.

The Proponent is required to follow the *Nunavut Act* (as recommended in the Regulatory Requirements section) and would be required to contact the Government of Nunavut-Department of Culture and Heritage if sites of historical, cultural and archaeological importance are encountered.

- Recommended Mitigation Measures: It is recommended that the potential adverse impacts may be mitigated by measures such requiring the Proponent to solicit available Inuit Qaujimaningit from local residents. The Board recommends the following term and condition to mitigate the potential adverse impacts to historical, cultural and archaeological resources: 32.
- <u>Issue 7:</u> Potential positive impacts to the local community from the sourcing of accommodations for personnel within the community, purchasing of local goods and services, and hiring locally in support of exploration activities.
- <u>Board Views:</u> It is noted that the Proponent has committed to consulting communities of Baker Lake and Rankin Inlet about potential local employment and business opportunities in support of the exploration program, which may result in a positive impact to the local economy.
- <u>Recommended Mitigation Measures</u>: Term and condition 33 is recommended by the Board to ensure the Proponent meets its commitments to support the local economy in executing the project by considering hiring locally.

# Significant public concern:

<u>Issue 8:</u> No significant public concern was expressed during the public commenting period for this file.

<u>Board Views:</u> It is noted that there is potential for public concern due to the proximity of the proposed project to areas used for traditional land use activities. Follow up consultation and involvement of local community members, as committed to by the Proponent, is expected to mitigate any potential for public concern resulting from project activities.

<u>Recommended Mitigation Measures</u>: Term and condition 32 is recommended to ensure that the affected community and organizations are informed about the project proposal, and to provide the Proponent with an opportunity to proactively address or mitigate any concerns that may arise from the project activities findings.

#### Technological innovations for which the effects are unknown:

No specific issues have been identified associated with this project proposal.

In considering the above factors and subject to the Proponent's compliance with the terms and conditions necessary to mitigate against the potential adverse environmental and social effects, the Board is of the view that the proposed project is unlikely to cause significant public concern and its adverse ecosystemic and socioeconomic impacts are unlikely to be significant, or are highly predictable and can be adequately mitigated by known technologies.

#### RECOMMENDED PROJECT-SPECIFIC TERMS AND CONDITIONS

The Board is recommending the following specific terms and conditions to apply in respect of the project:

#### General

- 1. North Country Gold Corp. (the Proponent) shall maintain a copy of the Project Terms and Conditions at the site of operation at all times.
- 2. The Proponent shall forward copies of all permits obtained and required for this project to the Nunavut Impact Review Board (NIRB) prior to the commencement of the project.
- 3. The Proponent shall operate in accordance with all commitments stated in correspondence provided to the Nunavut Planning Commission (Application to Determine Conformity, February 21, 2017), and the NIRB (Online Application Form, March 8, 2017; and the Proponent's supplementary application information, April 11, 2017).
- 4. The Proponent shall operate the site in accordance with all applicable Acts, Regulations and Guidelines.

#### Water Use

5. The Proponent shall not extract water from any fish-bearing waterbody unless the water intake hose is equipped with a screen of appropriate mesh size to ensure that there is no entrapment of fish. Small lakes or streams should not be used for water withdrawal unless approved by the Nunavut Water Board.

#### **Waste Disposal**

6. The Proponent shall keep all garbage and debris in bags placed in a covered metal container or equivalent until disposed of at an approved facility. All such wastes shall be kept inaccessible to wildlife at all times.

# **Fuel and Chemical Storage**

- 7. The Proponent shall store all fuel and chemicals in such a manner that they are inaccessible to wildlife.
- 8. Unless otherwise authorized by the Nunavut Water Board, the Proponent shall locate all fuel and other hazardous materials a minimum of thirty-one (31) metres away from the high water mark of any water body and in such a manner as to prevent their release into the environment.
- 9. The Proponent shall ensure that re-fueling of all equipment occurs a minimum of thirty-one (31) metres away from the high water mark of any water body, unless otherwise authorized by the Nunavut Water Board.
- 10. The Proponent shall use adequate secondary containment or a surface liner (e.g., self-supporting insta-berms and fold-a-tanks) when storing barreled fuel and chemicals at all locations.
- 11. The Proponent shall ensure that appropriate spill response equipment and clean-up materials (e.g., shovels, pumps, barrels, drip pans, and absorbents) are readily available during any transfer of fuel or hazardous substances, and at all fuel storage sites.
- 12. The Proponent shall remove and treat hydrocarbon contaminated soils on site or transport them to an approved disposal site for treatment.
- 13. The Proponent shall ensure that all personnel are properly trained in fuel and hazardous waste handling procedures, as well as spill response procedures. All spills of fuel or other deleterious materials of any amount must be reported immediately to the 24 hour Spill Line at (867) 920-8130.

#### Wildlife - General

- 14. The Proponent shall ensure that there is no damage to wildlife habitat in conducting this operation.
- 15. The Proponent shall not harass wildlife. This includes persistently circling, chasing, hovering over pursuing or in any other way harass wildlife, or disturbing large groups of animals.
- 16. The Proponent shall not hunt or fish, unless proper Nunavut authorizations have been acquired.
- 17. The Proponent shall ensure that all project personnel are made aware of the measures to protect wildlife and are provided with training and/or advice on how to implement these measures.

#### **Migratory Birds and Raptors Disturbance**

18. The Proponent shall not disturb or destroy the nests or eggs of any birds. If nests are encountered and/or identified, the Proponent shall take precaution to avoid further interaction

- and or disturbance (e.g., a 100 metres buffer around the nests). If active nests of any birds are discovered (i.e., with eggs or young), the Proponent shall avoid these areas until nesting is complete and the young have left the nest.
- 19. The Proponent shall minimize activities during periods when birds are particularly sensitive to disturbance such as migration, nesting and moulting.
- 20. The Proponent shall ensure its aircraft avoid excessive hovering or circling over areas where bird presence is likely.

# **Aircraft Flight Restrictions**

- 21. The Proponent shall restrict aircraft/helicopter activity related to the project to a minimum altitude of 610 metres above ground level unless there is a specific requirement for low-level flying, which does not disturb wildlife and migratory birds.
- 22. The Proponent shall ensure that aircraft maintain a vertical distance of 1000 metres and a horizontal distance of 1500 metres from any observed groups of wildlife or colonies of migratory birds. Aircraft should avoid critical and sensitive wildlife areas at all times by choosing alternate flight corridors.
- 23. The Proponent shall ensure that aircraft/helicopter do not, unless for emergency, touch-down in areas where wildlife are present.
- 24. The Proponent shall advise all pilots of relevant flight restrictions and enforce their application over the project area, including flight paths to/from the project area.
- 25. The Proponent shall ensure that drone activities do not disturb wildlife and migratory birds.

#### Caribou and Muskoxen Disturbance

- 26. The Proponent shall cease activities that may interfere with the migration or calving of caribou or muskox, until the caribou or muskox have passed or left the area.
- 27. The Proponent shall not block or cause any diversion to caribou migration, and shall cease activities likely to interfere with migration such as airborne geophysics surveys, or movement of equipment or personnel until such time as the caribou have passed.
- 28. During the period of May 15 to July 15, when caribou are observed within one (1) kilometre of project operations, the Proponent shall suspend all operations, including low-level over flights, outside the immediate vicinity of personnel pick up/drop off locations. Following July 15, if caribou cows or calves are observed within one (1) kilometre of project operations, the Proponent shall also suspend all operations in the vicinity, including low-level over flights, until caribou are no longer in the immediate area.

#### **Ground Disturbance**

29. The Proponent shall implement suitable erosion and sediment suppression measures on all areas before, during and after conducting activities in order to prevent sediment from entering any waterbody.

#### **Restoration of Disturbed Areas**

30. The Proponent shall remove all garbage, fuel and equipment upon abandonment.

31. The Proponent shall complete all clean-up and restoration of the lands used prior to the end of each field season and/or upon abandonment of site.

#### Other

- 32. The Proponent should consult with local residents regarding their activities in the area and solicit available Inuit Qaujimaningit and information that can inform project activities.
- 33. The Proponent should, to the extent possible, hire local people.
- 34. The Proponent shall ensure that project activities do not interfere with Inuit wildlife harvesting or traditional land use activities.

# MONITORING AND REPORTING REQUIREMENTS

In addition, the Board is recommending the following:

# **Community Consultation Report**

1. The Proponent shall submit a public consultation report to the Nunavut Impact Review Board, Indigenous and Northern Affairs Canada, and the Kivalliq Inuit Association prior to the commencement of project activities. The report shall include a copy of materials presented to community members, a description of issues and concerns raised, and advice offered to the company as well as any follow-up actions that were required or taken to resolve any concerns expressed about the project proposal.

# Wildlife Mitigation and Monitoring Plan

2. Prior to the start of project activities, the Proponent shall submit a Wildlife Mitigation and Monitoring Plan (WMMP), informed by community consultation, to the Nunavut Impact Review Board, Government of Nunavut, Department of Environment and the Kivalliq Inuit Association. At a minimum, this plan should include proposed template for a wildlife log/record of observations and proposed mitigation measures for caribou, migratory birds, grizzly bear and other sensitive species that may be encountered within the project area. The Proponent is encouraged to consult with the Government of Nunavut's Regional Biologists in developing the WMMP, regarding project schedule and timelines so as to ensure adequate mitigation of potential wildlife impacts.

#### OTHER NIRB CONCERNS AND RECOMMENDATIONS

In addition to the project-specific terms and conditions, the Board is recommending the following:

#### **Change in Project Scope**

1. Responsible authorities or Proponent shall notify the Nunavut Planning Commission (NPC) and the NIRB of any changes in operating plans or conditions, including phase advancement, associated with this project prior to any such change.

# **Bear and Carnivore Safety**

2. The Proponent should review the Government of Nunavut's booklet on Bear Safety, which can be downloaded from this link: <a href="http://gov.nu.ca/sites/default/files/bear safety-reducing bear-people conflicts in nunavut.pdf">http://gov.nu.ca/sites/default/files/bear safety-reducing bear-people conflicts in nunavut.pdf</a>. Further information on bear/carnivore

- detection and deterrent techniques can be found in the "Safety in Grizzly and Black Bear Country" pamphlet, which can be downloaded from this link: <a href="http://www.enr.gov.nt.ca/sites/default/files/web\_pdf\_wd\_bear\_safety\_brochure\_1\_may\_2015">http://www.enr.gov.nt.ca/sites/default/files/web\_pdf\_wd\_bear\_safety\_brochure\_1\_may\_2015</a>.pdf.
- 3. There are polar bear and grizzly bear safety resources available from the Bear Smart Society with videos on polar bear safety available in English, French and Inuktitut at <a href="http://www.bearsmart.com/play/safety-in-polar-bear-country/">http://www.bearsmart.com/play/safety-in-polar-bear-country/</a>. Information can also be obtained from Parks Canada's website on bear safety at the following link: <a href="http://www.pc.gc.ca/eng/pn-np/nu/quttinirpaaq/visit/visit6/d.aspx">http://www.pc.gc.ca/eng/pn-np/nu/quttinirpaaq/visit/visit6/d.aspx</a> or in reviewing the "Safety in Polar Bear Country" pamphlet, which can be downloaded from the following link: <a href="http://www.pc.gc.ca/eng/pn-np/nu/quttinirpaaq/visit/visit6/~/media/pn-np/nu/quyuittuq/pdf/shared/PolarBearSafety\_English.ashx">http://www.pc.gc.ca/eng/pn-np/nu/quttinirpaaq/visit/visit6/~/media/pn-np/nu/quyuittuq/pdf/shared/PolarBearSafety\_English.ashx</a>.
- 4. Any problem wildlife or any interaction with carnivores should be reported immediately to the local Government of Nunavut, Department of Environment Conservation Office (Conservation Officer of Baker Lake, phone: (867) 793-2944).

#### **Species at Risk**

5. The Proponent review Environment and Climate Change Canada's "Environment Assessment Best Practice Guide for Wildlife at Risk in Canada", available at the following link:

http://www.sararegistry.gc.ca/virtual\_sara/files/policies/EA%20Best%20Practices%202004.pdf. The guide provides information to the Proponent on what is required when Wildlife at Risk, including *Species at Risk*, are encountered or affected by the project.

#### **Migratory Birds**

- 6. The Proponent review Canadian Wildlife Services' "Key migratory bird terrestrial habitat sites in the Northwest Territories and Nunavut", available at the following link: <a href="http://publications.gc.ca/site/eng/317630/publication.html">http://publications.gc.ca/site/eng/317630/publication.html</a> and "Key marine habitat sites for migratory birds in Nunavut and the Northwest Territories", available at the following link: <a href="http://publications.gc.ca/site/eng/392824/publication.html">http://publications.gc.ca/site/eng/392824/publication.html</a>. The guide provides information to the Proponent on key terrestrial and marine habitat areas that are essential to the welfare of various migratory bird species in Canada.
- 7. For further information on how to protect migratory birds, their nests and eggs when planning or carrying out project activities, consult Environment and Climate Change Canada's Incidental Take web page and the fact sheet "Planning Ahead to Reduce the Risk of Detrimental Effects to Migratory Birds, and their Nests and Eggs" available at <a href="http://www.ec.gc.ca/paom-itmb/">http://www.ec.gc.ca/paom-itmb/</a>.

# Transport of Waste/Dangerous Goods and Waste Management

- 8. Environment and Climate Change Canada recommends that all hazardous wastes, including waste oil, receive proper treatment and disposal at an approved facility.
- 9. The Proponent shall ensure that a waste manifest or the appropriate transportation of dangerous goods (TDG) documentation accompany all potential hazardous samples and/or materials that are transported off site. Further, the Proponent shall ensure that the shipment of waste is registered with the Government of Nunavut Department of Environment (GN-

- DoE). Contact the Manager of Pollution Control and Air Quality at (867) 975-7748 to obtain a manifest if hazardous waste will be generated during project activities.
- 10. The Proponent shall provide an authorization or letter of conformation of disposal be obtained from the owner/operator of the landfill to be used for disposal of project-related wastes.

#### **Aircraft Identification**

11. The Proponent shall provide the community of Baker Lake the planned helicopter activities, including photo(s) of the helicopter to be used, approximate flight paths, plans and times as available prior to commencement of activities to ensure community members are aware of the planned activities.

# **Unmanned Air Vehicles (UAV)**

- 12. The Proponent should review Transport Canada's site on Drone Safety which can be found at the following link: <a href="https://www.tc.gc.ca/eng/civilaviation/drone-safety.html">https://www.tc.gc.ca/eng/civilaviation/drone-safety.html</a>
- 13. The Proponent should review Transport Canada's "Do I have permission to fly my drone?" which can be downloaded from which can be downloaded from this link: <a href="https://www.tc.gc.ca/media/documents/ca-opssvs/Infographic-Do I need permission to fly my drone.pdf">https://www.tc.gc.ca/media/documents/ca-opssvs/Infographic-Do I need permission to fly my drone.pdf</a>. The document provides information on whether or not a Special Flight Operations Certificate (SFOC) would be required or whether the operator of an unmanned air vehicle qualifies to operate under one of the exemptions to conduct lower risk operation in more remote areas without the need to apply for an SFOC.

#### **Caribou Management**

- 14. Territorial and federal government agencies in Nunavut should work together with Regional Inuit Associations, co-management boards and industry to develop an action plan to identify and mitigate potential cumulative effects of human land use activities, including mineral exploration, on barren-ground caribou. This assessment of cumulative effects should occur at a regional scale (i.e., larger than individual project areas).
- 15. Territorial and federal government agencies update the Caribou Protection Map with updated data and information from the Beverly Qamanirjuaq Caribou Management Board (BQCMB).
- 16. As a result of expressed concerns regarding mineral exploration and the associated potential for cumulative effects on caribou and caribou habitat within the Kivalliq region, the Nunavut Planning Commission, territorial and federal government agencies should work together with Regional Inuit Associations, co-management boards, the public, and industry to develop a plan that identifies appropriate land use in these areas prior to potential mineral exploration. The plan should identify and mitigate potential cumulative effects of human land use activities on barren-ground caribou on both localized and regional scales.
- 17. The Nunavut Planning Commission should be aware of the public concerns regarding a perceived lack of protection for caribou and caribou habitat within the Kivalliq Region of Nunavut. In developing a Nunavut-wide land use plan, the Nunavut Planning Commission may wish to consider formalized protection of important caribou habitat, and seasonal restrictions on potentially disruptive activities in these areas to minimize disturbance to caribou lifecycles and Inuit harvesting activities.

#### **Indigenous and Northern Affairs Canada**

- 18. Indigenous and Northern Affairs Canada (INAC) impose mitigation measures, conditions and monitoring requirements pursuant to the Federal Land Use Permit, which require the Proponent to respect the sensitivities and importance of the area. These mitigation measures, conditions and monitoring requirements should be in regard to the location and area; type, location, capacity and operation of facilities; use, storage, handling and disposal of chemical or toxic material; wildlife and fisheries habitat; and petroleum fuel storage.
- 19. INAC consider the importance of conducting regular Land Use Inspections, pursuant to the authority of the Federal Land Use Permit, while the project is in operation. The Land Use Inspections should be focused on ensuring the Proponent is in compliance with the conditions imposed through the Federal Land Use Permit.

# **Kivalliq Inuit Association**

20. The Kivalliq Inuit Association impose strict mitigation measures and/or conditions upon the Proponent pursuant to the Inuit Owned Lands License in regard to fuel and chemical storage, water conditions, ground disturbance and wildlife on Inuit owned land.

#### **Nunavut Water Board**

21. If a Type "B" Water Licence is required for this project proposal, the Nunavut Water Board should impose mitigation measures, conditions and monitoring requirements pursuant to the Water Licence, which require the Proponent to respect the sensitivities and importance of water in the area. These mitigation measures, conditions and monitoring requirements should be in regard to use of water, snow and ice; waste disposal; spill contingency planning; abandonment and restoration planning; and monitoring programs.

#### Indigenous and Northern Affairs Canada – Water Resources Division

22. INAC – Water Resources Division should consider the importance of conducting regular inspections, pursuant to the authority of the *Nunavut Waters and Nunavut Surface Rights Tribunal Act*, while the project is in operation. Inspectors should focus on ensuring the Proponent is in compliance with the conditions imposed through the Water Licence.

# REGULATORY REQUIREMENTS

The Proponent is also advised that the following legislation may apply to the project:

#### **Acts and Regulations**

- 1. The Fisheries Act (http://laws-lois.justice.gc.ca/eng/acts/F-14/index.html).
- 2. The *Nunavut Waters and Nunavut Surface Rights Tribunal Act* (http://www.canlii.org/ca/sta/n-28.8/whole.html).
- 3. The *Migratory Birds Convention Act* and *Migratory Birds Regulations* (<a href="http://lawslois.justice.gc.ca/eng/acts/M-7.01/">http://lawslois.justice.gc.ca/eng/acts/M-7.01/</a>).
- 4. The *Species at Risk Act* (<a href="http://laws-lois.justice.gc.ca/eng/acts/S-15.3/index.html">http://laws-lois.justice.gc.ca/eng/acts/S-15.3/index.html</a>). Attached in **Appendix A** is a list of Species at Risk in Nunavut.

- 5. The *Wildlife Act* (<a href="http://www.canlii.org/en/nu/laws/stat/snu-2003-c-26/latest/snu-2003-c-26.html">http://www.canlii.org/en/nu/laws/stat/snu-2003-c-26/latest/snu-2003-c-26.html</a>) which contains provisions to protect and conserve wildlife and wildlife habitat, including specific protection measures for wildlife habitat and species at risk.
- 6. The *Nunavut Act* (http://laws-lois.justice.gc.ca/eng/acts/N-28.6/). The Proponent must comply with the proposed terms and conditions listed in the attached **Appendix B**.
- 7. The *Transportation of Dangerous Goods Regulations*, *Transportation of Dangerous Goods Act* (<a href="http://www.tc.gc.ca/eng/tdg/safety-menu.htm">http://www.tc.gc.ca/eng/tdg/safety-menu.htm</a>), and the *Canadian Environmental Protection Act* (<a href="http://laws-lois.justice.gc.ca/eng/acts/C-15.31">http://laws-lois.justice.gc.ca/eng/acts/C-15.31</a>). The Proponent must ensure that proper shipping documents accompany all movements of dangerous goods. The Proponent must register with the Government of Nunavut, Department of Environment Manager of Pollution Control and Air Quality at 867-975-7748.
- 8. The *Aeronautics Act* (http://laws-lois.justice.gc.ca/eng/acts/A-2/).
- 9. The *Canadian Aviation Regulations* (<a href="https://www.tc.gc.ca/eng/acts-regulations/regulations-sor96-433.htm">https://www.tc.gc.ca/eng/acts-regulations/regulations-sor96-433.htm</a>).

#### **CONCLUSION**

The foregoing constitutes the Board's screening decision with respect to North Country Gold Corp.'s "Gibson-MacQuoid Project". The NIRB remains available for consultation with the Minister regarding this report as necessary.

Dated May 18, 2017 at Whale Cove, NU.

Elizabeth Copland, Chairperson

Attachments: Appendix A: Species at Risk in Nunavut

Appendix B: Archaeological and Palaeontological Resources Terms and Conditions for Land Use

Permit Holders

# Appendix A

#### Species at Risk in Nunavut

Due to the requirements of Section 79(2) of the Species At Risk Act (SARA), and the potential for project-specific adverse effects on listed wildlife species and its critical habitat, measures should be taken as appropriate to avoid or lessen those effects, and the effects need to be monitored. Project effects could include species disturbance, attraction to operations and destruction of habitat. This section applies to all species listed on Schedule 1 of SARA, as listed in the table below, or have been assessed by the Committee on the Status of Endangered Wildlife in Canada (COSEWIC), which may be encountered in the project area. This list may not include all species identified as at risk by the Territorial Government. The following points provide clarification on the applicability of the species outlined in the table.

- Schedule 1 is the official legal list of Species at Risk for SARA. SARA applies to all species on Schedule 1. The term "listed" species refers to species on Schedule 1.
- Schedule 2 and 3 of SARA identify species that were designated at risk by the COSEWIC prior to October 1999 and must be reassessed using revised criteria before they can be considered for addition to Schedule 1.
- Some species identified at risk by COSEWIC are "pending" addition to Schedule 1 of SARA. These species are under consideration for addition to Schedule 1, subject to further consultation or assessment.

If species at risk are encountered or affected, the primary mitigation measure should be avoidance. The Proponent should avoid contact with or disturbance to each species, its habitat and/or its residence. All direct, indirect, and cumulative effects should be considered. Refer to species status reports and other information on the species at risk Registry at <a href="http://www.sararegistry.gc.ca">http://www.sararegistry.gc.ca</a> for information on specific species.

Monitoring should be undertaken by the Proponent to determine the effectiveness of mitigation and/or identify where further mitigation is required. As a minimum, this monitoring should include recording the locations and dates of any observations of species at risk, behaviour or actions taken by the animals when project activities were encountered, and any actions taken by the proponent to avoid contact or disturbance to the species, its habitat, and/or its residence. This information should be submitted to the appropriate regulators and organizations with management responsibility for that species, as requested.

For species primarily managed by the Territorial Government, the Territorial Government should be consulted to identify other appropriate mitigation and/or monitoring measures to minimize effects to these species from the project.

Mitigation and monitoring measures must be undertaken in a way that is consistent with applicable recovery strategies and action/management plans.

Schedules of SARA are amended on a regular basis so it is important to check the SARA registry (<a href="www.sararegistry.gc.ca">www.sararegistry.gc.ca</a>) to get the current status of a species.

Updated: October 2016

Species at Risk <sup>1</sup>	COSEWIC Designation	Schedule of SARA	Government Organization with Primary Management Responsibility <sup>2</sup>
	Migrato		
Eskimo Curlew	Endangered	Schedule 1	ECCC
Buff-breasted Sandpiper	Special concern	Pending	ECCC
Ivory Gull	Endangered	Schedule 1	ECCC
Ross's Gull	Threatened	Schedule 1	ECCC
Harlequin Duck (Eastern population)	Special Concern	Schedule 1	ECCC
Rusty Blackbird	Special Concern	Schedule 1	GN
Peregrine Falcon	Special Concern	Schedule 1 - Threatened	GN
	(anatum-tundrius	(anatum)	
	complex <sup>3</sup> )	Schedule 3 – Special	
		Concern (tundrius)	
Short-eared Owl	Special Concern	Schedule 3	GN
Red Knot (rufa subspecies)	Endangered	Schedule 1	ECCC
Red Knot (islandica subspecies)	Special Concern	Schedule 1	ECCC
Horned Grebe (Western population)	Special Concern	Pending	ECCC
Red-necked Phalarope	Special concern	Pending	ECCC
	Vege		
Felt-leaf Willow	Special Concern	Schedule 1	GN
Blanket-leafed Willow	Special Concern	Schedule 1	GN
Porsild's Bryum	Threatened	Schedule 1	GN
	Terrestria		
Peary Caribou	Endangered	Schedule 1	GN
Peary Caribou (High Arctic Population)	Endangered	Schedule 2	GN
Peary Caribou (Low Arctic Population)	Threatened	Schedule 2	GN
Barren-ground Caribou (Dolphin and Union population)	Special Concern	Schedule 1	GN
omon popularion,	Marine	Wildlife	
Polar Bear	Special Concern	Schedule 1	GN/DFO
Grizzly Bear	Special Concern	Pending	GN
Wolverine	Special Concern	Pending	GN
Atlantic Cod, Arctic Lakes	Special Concern	Pending	DFO
Atlantic Walrus	Special Concern	Pending	DFO
Beluga Whale (Cumberland Sound population)	Threatened	Pending	DFO
Beluga Whale (Eastern Hudson Bay population)	Endangered	Pending	DFO
Beluga Whale (Western Hudson Bay	Special Concern	Pending	DFO
population) Beluga Whale (Eastern High Arctic –	Special Concern	Pending	DFO
Baffin Bay population) Bowhead Whale (Eastern Canada – West Greenland population)	Special Concern	Pending	DFO
Bowhead Whale (Eastern Arctic population	Special Concern	Schedule 2	DFO
Killer Whale (Northwest Atlantic / Eastern Arctic populations)	Special Concern	Pending	DFO
Grey Whale (Eastern North Pacific population)	Special Concern	Schedule 1	DFO

Species at Risk <sup>1</sup>	COSEWIC Designation	Schedule of SARA	Government Organization with Primary Management Responsibility <sup>2</sup>	
Humpback Whale (Western North	Special Concern	Schedule 3	DFO	
Atlantic population)				
Narwhal	Special Concern	Pending	DFO	
Fish				
Northern Wolffish	Threatened	Schedule 1	DFO	
Atlantic Wolffish	Special Concern	Schedule 1	DFO	
Bering Wolffish	Special Concern	Schedule 3	DFO	
Fourhorn Sculpin	Special Concern	Schedule 3	DFO	
Roundnose Grenadier	Endangered	Pending	DFO	
Spotted Wolffish	Threatened	Schedule 1	DFO	
Thorny Skate	Special Concern	Pending	DFO	
Atlantic Cod, Arctic Lakes	Special Concern	Pending	DFO	
Blackline Prickleback	Special Concern	Schedule 3	DFO	

Notes: DFO: Fisheries and Oceans Canada; ECCC: Environment and Climate Change Canada; GN: Government of Nunavut <sup>1</sup>The Department of Fisheries and Oceans has responsibility for aquatic species.

<sup>&</sup>lt;sup>2</sup> Environment and Climate Change Canada has a national role to play in the conservation and recovery of Species at Risk in Canada, as well as responsibility for management of birds described in the Migratory Birds Convention Act (MBCA). Day-to-day management of terrestrial species not covered in the MBCA is the responsibility of the Territorial Government. Populations that exist in National Parks are also managed under the authority of the Parks Canada Agency.

<sup>&</sup>lt;sup>3</sup> The *anatum* subspecies of Peregrine Falcon is listed on Schedule 1 of SARA as threatened. The *anatum* and *tundrius* subspecies of Peregrine Falcon were reassessed by COSEWIC in 2007 and combined into one subpopulation complex. This subpopulation complex was assessed by COSEWIC as Special Concern.

# Appendix B Archaeological and Palaeontological Resources Terms and Conditions for Land Use Permit Holders



#### INTRODUCTION

The Department of Culture and Heritage (CH) routinely reviews land use applications sent to the Nunavut Water Board, Nunavut Impact Review Board and the Indigenous and Northern Affairs Canada. These terms and conditions provide general direction to the permittee/proponent regarding the appropriate actions to be taken to ensure the permittee/proponent carries out its role in the protection of Nunavut's archaeological and palaeontological resources.

#### TERMS AND CONDITIONS

1) The permittee/proponent shall have a professional archaeologist and/or palaeontologist perform the following **Functions** associated with the **Types of Development** listed below or similar development activities:

	Types of Development	Function
	(See Guidelines below)	(See Guidelines below)
a)	Large scale prospecting	Archaeological/Palaeontological
	Large scale prospecting	Overview Assessment
	Diamond drilling for exploration or	
b)	geotechnical purpose or planning of	Archaeological/ Palaeontological
	linear disturbances	Inventory
c)	Construction of linear disturbances,	Archaeological/ Palaeontological
	Extractive disturbances, Impounding	Inventory or Assessment or
	disturbances and other land	Mitigation
	disturbance activities	Willigation

Note that the above-mentioned functions require either a Nunavut Archaeologist Permit or a Nunavut Palaeontologist Permit. CH is authorized by way of the *Nunavut and Archaeological and Palaeontological Site Regulations*<sup>8</sup> to issue such permits.

2) The permittee/proponent shall not operate any vehicle over a known or suspected archaeological or palaeontological site.

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<sup>&</sup>lt;sup>8</sup> P.C. 2001-1111 14 June, 2001

- 3) The permittee/proponent shall not remove, disturb, or displace any archaeological artifact or site, or any fossil or palaeontological site.
- 4) The permittee/proponent shall immediately contact CH at (867) 934-2046 or (867) 975-5500 should an archaeological site or specimen, or a palaeontological site or fossil, be encountered or disturbed by any land use activity.
- 5) The permittee/proponent shall immediately cease any activity that disturbs an archaeological or palaeontological site encountered during the course of a land use operation until permitted to proceed with the authorization of CH.
- 6) The permittee/proponent shall follow the direction of CH in restoring disturbed archaeological or palaeontological sites to an acceptable condition. If these conditions are attached to either a Class A or B Permit under the Territorial Lands Act Indigenous and Northern Affairs Canada directions will also be followed.
- 7) The permittee/proponent shall provide all information requested by CH concerning all archaeological sites or artifacts and all palaeontological sites and fossils encountered in the course of any land use activity.
- 8) The permittee/proponent shall make best efforts to ensure that all persons working under its authority are aware of these conditions concerning archaeological sites and artifacts and palaeontological sites and fossils.
- 9) If a list of recorded archaeological and/or palaeontological sites is provided to the permittee/proponent by CH as part of the review of the land use application the permittee/proponent shall avoid the archaeological and/or palaeontological sites listed.
- 10) Should a list of recorded sites be provided to the permittee/proponent, the information is provided solely for the purpose of the proponent's land use activities as described in the land use application, and must otherwise be treated confidentially by the proponent.

#### **Legal Framework**

As stated in Article 33 of the Agreement between the Inuit of the Nunavut Settlement Area and Her Majesty the Queen in right of Canada (Nunavut Agreement):

Where an application is made for a land use permit in the Nunavut Settlement Area, and there are reasonable grounds to believe that there could be sites of archaeological importance on the lands affected, no land use permit shall be issued without written consent of the Designated Agency. Such consent shall not be unreasonably withheld. [33.5.12]

Each land use permit referred to in Section 33.5.12 shall specify the plans and methods of archeological site protection and restoration to be followed by the permit holder, and any other conditions the Designated Agency may deem fit. [33.5.13]

# Palaeontology and Archaeology

Under the *Nunavut Act* $^9$ , the federal government can make regulations for the protection, care and preservation of palaeontological and archaeological sites and specimens in Nunavut. Under

<sup>&</sup>lt;sup>9</sup> s. 51(1)

the *Nunavut Archaeological and Palaeontological Sites Regulations*<sub>10</sub>, it is illegal to alter or disturb any palaeontological or archaeological site in Nunavut unless permission is first granted through the permitting process.

#### **Definitions**

As defined in the *Nunavut Archaeological and Palaeontological Sites Regulations*, the following definitions apply:

"archaeological site" means a place where an archaeological artifact is found.

"archaeological artifact" means any tangible evidence of human activity that is more than 50 years old and in respect of which an unbroken chain of possession or regular pattern of usage cannot be demonstrated, and includes a Denesuline archaeological specimen referred to in section 40.4.9 of the Agreement between the Inuit of the Nunavut Settlement Area and Her Majesty the Queen in right of Canada (Nunavut Agreement).

"palaeontological site" means a site where a fossil is found.

"fossil" includes:

Fossil means the hardened or preserved remains or impression of previously living organisms or vegetation and includes:

- (a) natural casts;
- (b) preserved tracks, coprolites and plant remains; and
- (c) the preserved shells and exoskeletons of invertebrates and the preserved eggs, teeth and bones of vertebrates.

Guidelines for Developers for the Protection of Archaeological Resources in the Nunavut Territory

(**Note:** Partial document only, complete document at: www.ch.gov.nu.ca/en/Archaeology.aspx)

#### Introduction

The following guidelines have been formulated to ensure that the impacts of proposed developments upon heritage resources are assessed and mitigated before ground surface altering activities occur. Heritage resources are defined as, but not limited to, archaeological and historical sites, burial grounds, palaeontological sites, historic buildings and cairns Effective collaboration between the developer, the Department of Culture, and Heritage (CH), and the contract archaeologist(s) will ensure proper preservation of heritage resources in the Nunavut Territory. The roles of each are briefly described.

CH is the Nunavut Government agency which oversees the protection and management of heritage resources in Nunavut, in partnership with land claim authorities, regulatory agencies, and the federal government. Its role in mitigating impacts of developments on heritage resources is as follows: to identify the need for an impact assessment and make recommendations to the appropriate regulatory agency; set the terms of reference for the study depending upon the scope of the development; suggest the names of qualified individuals

<sup>&</sup>lt;sup>10</sup> P.C. 2001-1111 14 June. 2001

prepared to undertake the study to the developer; issue an archaeologist or palaeontologist permit authorizing field work; assess the completeness of the study and its recommendations; and ensure that the developer complies with the recommendations.

The primary regulatory agencies that CH provides information and assistance to are the Nunavut Impact Review Board, for development activities proposed for Inuit Owned Lands (as defined in Section 1.1.1 of the *Agreement between the Inuit of the Nunavut Settlement Area and Her Majesty the Queen in right of Canada* (Nunavut Agreement)), and the Indigenous and Northern Affairs Canada, for development activities proposed for federal Crown Lands.

A developer is the initiator of a land use activity. It is the obligation of the developer to ensure that a qualified archaeologist or palaeontologist is hired to perform the required study and that provisions of the contract with the archaeologist or palaeontologist allow permit requirements to be met; i.e. fieldwork, collections management, artifact and specimen conservation, and report preparation. On the recommendation of the contract archaeologist or palaeontologist in the field and the Government of Nunavut, the developer shall implement avoidance or mitigative measures to protect heritage resources or to salvage the information they contain through excavation, analysis, and report writing. The developer assumes all costs associated with the study in its entirety.

Through his or her active participation and supervision of the study, the contract archaeologist or palaeontologist is accountable for the quality of work undertaken and the quality of the report produced. Facilities to conduct fieldwork, analysis, and report preparation should be available to this individual through institutional, agency, or company affiliations. Responsibility for the curation of objects recovered during field work while under study and for documents generated in the course of the study as well as remittance of artifacts, specimens and documents to the repository specified on the permit accrue to the contract archaeologist or palaeontologist. This individual is also bound by the legal requirements of the *Nunavut Archaeological and Palaeontological Sites Regulations*.

#### **Types of Development**

In general, those developments that cause concern for the safety of heritage resources will include one or more of the following kinds of surface disturbances. These categories, in combination, are comprehensive of the major kinds of developments commonly proposed in Nunavut. For any single development proposal, several kinds of these disturbances may be involved

- Linear disturbances: including the construction of highways, roads, winter roads, transmission lines, and pipelines;
- Extractive disturbances: including mining, gravel removal, quarrying, and land filling;
- *Impoundment disturbances: including dams, reservoirs, and tailings ponds;*
- Intensive land use disturbances: including industrial, residential, commercial, recreational, and land reclamation work, and use of heritage resources as tourist developments.

• Mineral, oil and gas exploration: establishment of camps, temporary airstrips, access routes, well sites, or quarries all have potential for impacting heritage resources.

# **Types of Studies Undertaken to Preserve Heritage Resources**

**Overview:** An overview study of heritage resources should be conducted at the same time as the development project is being designed or its feasibility addressed. They usually lack specificity with regard to the exact location(s) and form(s) of impact and involve limited, if any, field surveys. Their main aim is to accumulate, evaluate, and synthesize the existing knowledge of the heritage of the known area of impact. The overview study provides managers with baseline data from which recommendations for future research and forecasts of potential impacts can be made. A Class I Permit is required for this type of study if field surveys are undertaken.

**Reconnaissance:** This is done to provide a judgmental appraisal of a region sufficient to provide the developer, the consultant, and government managers with recommendations for further development planning. This study may be implemented as a preliminary step to inventory and assessment investigations except in cases where a reconnaissance may indicate a very low or negligible heritage resource potential. Alternately, in the case of small-scale or linear developments, an inventory study may be recommended and obviate the need for a reconnaissance.

The main goal of a reconnaissance study is to provide baseline data for the verification of the presence of potential heritage resources, the determination of impacts to these resources, the generation of terms of reference for further studies and, if required, the advancement of preliminary mitigative and compensatory plans. The results of reconnaissance studies are primarily useful for the selection of alternatives and secondarily as a means of identifying impacts that must be mitigated after the final siting and design of the development project. Depending on the scope of the study, a Class 1 or Class 2 Permit is required for this type of investigation.

**Inventory:** A resource inventory is generally conducted at that stage in a project's development at which the geographical area(s) likely to sustain direct, indirect, and perceived impacts can be well defined. This requires systematic and intensive fieldwork to ascertain the effects of all possible and alternate construction components on heritage resources. All heritage sites must be recorded on Government of Nunavut Site Survey forms. Sufficient information must be amassed from field, library and archival components of the study to generate a predictive model of the heritage resource base that will:

- allow the identification of research and conservation opportunities;
- enable the developer to make planning decisions and recognize their likely effects on the known or predicted resources; and
- make the developer aware of the expenditures, which may be required for subsequent studies and mitigation. A Class 1 or 2 permit is required.

**Assessment:** At this stage, sufficient information concerning the numbers and locations of heritage resources will be available, as well as data to predict the forms and magnitude of impacts. Assessments provide information on the size, volume, complexity and content of a

heritage resource, which is used to rank the values of different sites or site types given current archaeological knowledge. As this information will shape subsequent mitigation program(s). great care is necessary during this phase.

**Mitigation:** This refers to the amelioration of adverse impacts to heritage resources and involves the avoidance of impact through the redesign or relocation of a development or its components; the protection of the resource by constructing physical facilities; or, the scientific investigation and recovery of information from the resource by excavation or other method. The type(s) of appropriate mitigative measures are dictated by their viability in the context of the development project. Mitigation strategies must be developed in consultation with, and approved by, the Department of Culture and Heritage. It is important to note that mitigation activities should be initiated as far in advance of the construction of the development as possible.

**Surveillance and monitoring:** These may be required as part of the mitigation program.

Surveillance may be conducted during the construction phase of a project to ensure that the developer has complied with the recommendations.

Monitoring involves identification and inspection of residual and long-term impacts of a development (i.e. shoreline stability of a reservoir); or the use of impacts to disclose the presence of heritage resources, for example, the uncovering of buried sites during the construction of a pipeline.