

NIRB Assessment and Decision

After a thorough assessment of all material provided to the Board (please see Procedural History and Project Activities in Appendix A), in accordance with the principles identified within section 12.4.2 of the NLCA, the decision of the Board as per section 12.4.4 of the NLCA is:

12.4.4 (a): the proposal may be processed without a review under Part 5 or 6; NIRB may recommend specific terms and conditions to be attached to any approval, reflecting the primary objectives set out in Section 12.2.5

Recommended Project-Specific Terms and Conditions, pursuant to 12.4.4(a) of the NLCA

The Board is recommending the following or similar project-specific terms and conditions be imposed upon the Proponent through all relevant legislation:

General

1. Advanced Explorations Inc. (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 to the NIRB obtained and required for this project prior to the commencement of the project.
3. The Proponent shall provide the NIRB with an updated *Oil and Hazardous Material Spill Contingency Plan* prior to the commencement of project activities. The updated plan should address recommendations received from the Government of Nunavut – Department of Environment (dated August 23, 2007) and Environment Canada (dated August 23, 2007) for this project.
4. The Proponent shall notify the NIRB of any changes in operating plans or conditions associated with this project prior to any such change.
5. The Proponent shall operate in accordance with all commitments stated in correspondence provided to NIRB and INAC including but not limited to the following:
 - a. INAC Land Use Permit Application #N2007C0033, July 30, 2007
 - b. Letter to Mr. Jeff Holwell re: Application for Land Use Permit, July 23, 2007
 - c. Abandonment and Restoration Plan, revised April 2007
 - d. Oil and Hazardous Material Spill Contingency Plan, revised April 1, 2007
6. The Proponent shall operate the site in accordance with all applicable Acts, Regulations and Guidelines.
7. The Proponent should, to the extent possible, hire local people and consult with local residents regarding their activities in the region.

Water

8. The Proponent shall not use water, including constructing or disturbing any stream, lakebed or the banks of any definable water course unless approved by the Nunavut Water Board.

Waste

9. The Proponent shall incinerate all combustible wastes daily, and remove the ash from incineration activities and non-combustible wastes from the project site to an approved facility for disposal.

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

Fuel and Chemical Storage

11. The Proponent shall consult and implement the recommendations found in the 2003 CCME Guidance Document PN 1326 entitled "Environmental Code of Practice for Above Ground and Underground Storage Tank Systems containing Petroleum Product and Allied Petroleum Products".
12. The Proponent shall locate all fuel and other hazardous materials a minimum of thirty-one (31) metres above the high water mark of any water body and in such a manner as to prevent their release into the environment.
13. The Proponent shall implement secondary containment systems of adequate size and volume (110% of storage volume) for all fuel and hazardous chemical storage, including storage of CaCl.
14. The Proponent shall ensure appropriate spill response equipment and clean up materials are on hand during any transfer of fuel or hazardous materials. The Proponent shall ensure that all staff on site are trained in the proper use of these materials and equipment.
15. The Proponent shall ensure that all drum cache locations are clearly defined and marked so that they remain visible during the winter months.
16. The Proponent shall store all chemicals in such a manner that they are inaccessible to wildlife.
17. The Proponent shall report all spills of fuel, or other deleterious materials immediately to the 24 hour Spill Line at (867) 920-8130.

Wildlife

18. The Proponent shall ensure that there is no damage to wildlife habitat in conducting this operation. Deliberate feeding and harassment of any wildlife is absolutely prohibited. The Proponent shall ensure that there is no hunting or fishing, unless proper Nunavut authorizations have been acquired.
19. The Proponent shall restrict aircraft/helicopter activity related to the project to a minimum altitude of 610 m above ground level in places where there are occurrences of wildlife, unless there is a specific requirement for low-level flying.
20. The Proponent shall ensure that aircraft maintain a vertical distance of 1000 meters and a horizontal distance of 1500 meters from any observed groups (colonies) of migratory birds.
21. The Proponent shall ensure that aircraft/helicopter do not, unless for emergency, touch-down in areas where wildlife are present.
22. The Proponent shall avoid raptor nesting sites and concentrations of nesting or molting waterfowl by aircraft/helicopter at all times and ensure that there is minimal disturbance to any nesting birds, migratory birds and wildlife in the area.
23. If nests containing eggs or young are encountered, the proponent should avoid these areas until nesting is complete and the young have left the nest.
24. The Proponent shall immediately cease activities that may interfere with migration or calving of caribou or muskox, until the caribou or muskox have passed or left the area.
25. The Proponent shall follow procedures outlined in the "Safety in Bear Country Manual", and should contact the Regional Biologist or the Wildlife manager for information and advice on measures which should be taken to minimize the possibility of conflicts/interactions with bears. Consideration should be given to setting up an electric fence around the camp.

26. The Proponent is encouraged to document wildlife observations (i.e. bear, caribou, fox, wolf and raptor) within the project area and report these observations annually to the following Department of Environment contacts:

- a. Seeglook Akeeagok, Regional Manager, Wildlife (867) 975-7800, sakeeagok@gov.nu.ca
- b. Debbie Jenkins, (867) 899-8876, pondbiologist@qiniq.com

Physical Environment

27. When necessary, the Proponent shall use water for dust suppression in order to maintain ambient air quality without causing water to pool or runoff.
28. The Proponent shall not remove any material from below the ordinary high water mark of any lake or stream.
29. The Proponent shall not deposit or permit the deposit of sediment into any water body.

Other NIRB Concerns and Recommendations

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

Indian and Northern Affairs Canada

Indian 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.

INAC should also 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.

Regulatory Requirements

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

1. Section 36(3) of the *Fisheries Act* (<http://laws.justice.gc.ca/en/showtdm/cs/F-14///en>) which states that no person shall deposit or permit the deposit of a deleterious substance in any type in water frequented by fish or in any place under any conditions where the deleterious substance may enter such a water body.
2. The Proponent shall ensure compliance with the *Nunavut Waters and Nunavut Surface Rights Tribunal Act* which states that “no person shall use, or permit the use of, waters in Nunavut except in accordance with the conditions of a licence,” and “no person shall deposit or permit the deposit of waste (a) in waters in Nunavut; or (b) in any other place in Nunavut under conditions in which the waste, or any other waste that results from the deposit of that waste, may enter waters in Nunavut” (<http://www.canlii.org/ca/sta/n-28.8/whole.html>).
3. The *Migratory Birds Convention Act* (<http://laws.justice.gc.ca/en/showtdm/cs/M-7.01>) which states that no person disturb or destroy the nests or eggs of migratory birds. If nests containing eggs or

young are encountered, the Proponent shall avoid these areas until nesting is complete and the young have left the nest.

4. *The Species at Risk Act* (<http://laws.justice.gc.ca/en/showtdm/cs/S-15.3>). Attached in **Appendix B** is a list of Species at Risk in Nunavut. The Proponent should consult the Species at Risk Public Registry (<http://www.sararegistry.gc.ca/>) to identify any Species at Risk within the project location. Further, the Proponent shall develop monitoring plans for each relevant Species at Risk in accordance with any applicable status reports, recovery strategies, action plans, and management plans posted on the Species at Risk Public Registry and in consultation with the Government Organization with Primary Management Responsibility. Monitoring plans should record the locations and frequency of observing species of special concern and note any actions taken to avoid contact or cause disturbance to the species, its residence, or its critical habitat.
5. *The Nunavut Act* (<http://laws.justice.gc.ca/en/showtdm/cs/N-28.6>) which requires that no person alter or disturb any archaeological or palaeontological sites in Nunavut unless permission is first granted through the permitting process. If any archaeological or palaeontological sites are found they should remain undisturbed and their location should be reported to the Government of Nunavut Department of Culture, Language, Elders and Youth. The Proponent must comply with the proposed terms and conditions listed in the attached **Appendix C**.
6. *The Transportation of Dangerous Goods Regulations, Transportation of Dangerous Goods Act* (<http://www.tc.gc.ca/tdg/menu.htm>), and the *Environmental Protection Act* (<http://laws.justice.gc.ca/en/C-15.31/text.html>) which present the requirements for the handling, storing, managing and transportation of dangerous goods, including hazardous wastes, fuel and contaminated material. The Proponent must ensure that proper shipping documents accompany all movements of dangerous goods. The Proponent must register with GN-DOE by contacting Robert Eno at 867-975-7748 or reno@gov.nu.ca.

Validity of Land Claims Agreement

Section 2.12.2

Where there is any inconsistency or conflict between any federal, territorial and local government laws, and the Agreement, the Agreement shall prevail to the extent of the inconsistency or conflict.

Dated September 6, 2007 at Sanikiluaq, NU.



Lucassie Arragutainaq, Chairman

Appendix A - Procedural History and Project Activities

Procedural History

On July 30, 2007 the Nunavut Impact Review Board (NIRB or Board) received Advanced Explorations Inc.'s "Roche Bay Mining" land use application from Indian and Northern Affairs Canada (INAC). NIRB assigned this project proposal file number 07EN058.

This application was distributed to the community of Hall Beach and to interested Federal and Territorial Agencies. The NIRB requested that interested Parties review the application and provide NIRB with comments by August 27, 2007 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 and socio-economic effects; and if so, why;
- Whether the project 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.

On August 22, 2007 the NIRB acknowledged receipt of additional information related to this project proposal from Advanced Explorations Inc. (the Proponent). The Proponent proposed to amend their original application to include a second sealift landing site within the boundaries of the existing project area.

The NIRB staff determined that this request resulted in a change to the original scope of the proposed project. Therefore, the NIRB extended the comment period provided to interested parties by an additional 2 days to August 29, 2007 (original comment deadline was August 27, 2007). On or before August 29, 2007 the NIRB received comments from the following interested Parties (see Comments and Concerns):

- Environment Canada (EC)
- Government of Nunavut – Department of Environment (GN-DOE)

All comments provided to NIRB regarding this project proposal can be viewed on NIRB's ftp-site, at the following location: ftp://ftp.nunavut.ca/nirb/NIRB_SCREENINGS/COMPLETED_SCREENINGS/

On August 30, 2007 the NIRB provided an opportunity for the Proponent to respond to the Parties' concerns. The Proponent provided a response to each Party's concerns on September 4, 2007.

Project Activities

The proposed project is located in the Qikiqtani Region, near the community of Hall Beach and includes the following activities:

- Two sealift landing sites
- Drill salt (calcium chloride) storage
- Fuel storage

Appendix B

Species at Risk in Nunavut

This list includes species listed on one of the Schedules of SARA (*Species at Risk Act*) and under consideration for listing on Schedule 1 of SARA. These species have been designated as at risk by COSEWIC (Committee on the Status of Endangered Wildlife in Canada). This list may not include all species identified as at risk by the Territorial Government.

- 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.

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

Updated: January 3, 2007

Species at Risk	COSEWIC Designation	Schedule of SARA	Government Organization with Lead Management Responsibility ¹
Eskimo Curlew	Endangered	Schedule 1	EC
Ivory Gull	Endangered ²	Schedule 1	EC
Peregrine Falcon (subspecies anatum)	Threatened	Schedule 1	Government of Nunavut
Ross's Gull	Threatened	Schedule 1	EC
Harlequin Duck (Eastern population)	Special Concern	Schedule 1	EC
Felt-leaf Willow	Special Concern	Schedule 1	Government of Nunavut
Peregrine Falcon (subspecies tundrius)	Special Concern	Schedule 3	Government of Nunavut
Short-eared Owl	Special Concern	Schedule 3	Government of Nunavut
Fourhorn Sculpin	Special Concern	Schedule 3	DFO
Peary Caribou	Endangered ³	Pending	Government of Nunavut
Beluga Whale (Eastern Hudson Bay population)	Endangered	Pending	DFO
Beluga Whale (Cumberland Sound population)	Threatened	Pending	DFO
Beluga Whale (Western Hudson Bay population)	Special Concern	Pending	DFO
Beluga Whale	Special Concern	Pending	DFO

(Eastern High Arctic – Baffin Bay population)			
Bowhead Whale (Hudson Bay-Foxe Basin population)	Threatened ⁴	Pending	DFO
Bowhead Whale (Davis Strait-Baffin Bay population)	Threatened ⁴	Pending	DFO
Porsild's Bryum	Threatened	Pending	Government of Nunavut
Atlantic Walrus	Special Concern	Pending	DFO
Narwhal	Special Concern	Pending	DFO
Rusty Blackbird	Special Concern	Pending	Government of Nunavut
Barren-ground Caribou (Dolphin and Union population)	Special Concern ³	Pending	Government of Nunavut
Grizzly Bear	Special Concern	Pending	Government of Nunavut
Polar Bear	Special Concern	Pending	Government of Nunavut
Wolverine (Western Population)	Special Concern	Pending	Government of Nunavut

¹ Environment 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. EC = Environment Canada, DFO = Department of Fisheries and Oceans

² Designated as Endangered by COSEWIC in April 2006 and it is expected that the category of concern in SARA will also be changed from Special Concern to Endangered.

³ Peary Caribou was split into three separate populations in 1991: Banks Island (Endangered), High Arctic (Endangered) and Low Arctic (Threatened) populations. The Low Arctic population also included the Barren-ground Caribou - Dolphin and Union population. In May 2004 all three population designations were de-activated, and the Peary Caribou, *Rangifer tarandus pearyi*, was assessed separately from the Barren-ground Caribou (Dolphin and Union population), *Rangifer tarandus groenlandicus*. The subspecies *pearyi* is composed of a portion of the former "Low Arctic population" and all of the former "High Arctic" and "Banks Island" populations, and it was designated Endangered in May 2004. Although SARA lists Peary Caribou on Schedule 2 as three separate populations, the most current designation is the COSEWIC designation of the subspecies *pearyi* as Endangered.

⁴ The "Eastern and Western Arctic populations" of Bowhead Whale were given a single designation of Endangered in April 1980 by COSEWIC. These were split into two populations to allow separate designations in April 1986. The Eastern population was not re-evaluated in April 1986, but retained the Endangered status of the original "Eastern and Western Arctic populations". The Eastern Arctic population was further split into two populations (Hudson Bay-Foxe Basin population and Davis Strait-Baffin Bay population) in May 2005, and both these populations were designated as Threatened. Both these populations are under consideration for addition to Schedule 1. Although SARA lists the Eastern Arctic population as Endangered (Schedule 2), the most current designation is the COSEWIC designations of the Hudson Bay-Foxe Basin and Davis Strait-Baffin Bay populations as Threatened.

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



BACKGROUND: Archaeology

As stated in Article 33 of the Nunavut Land Claims Agreement:

The archaeological record of the Inuit of Nunavut is a record of Inuit use and occupancy of lands and resources through time. The evidence associated with their use and occupancy represents a cultural, historical and ethnographic heritage of Inuit society and, as such, Government recognizes that Inuit have a special relationship with such evidence, which shall be expressed in terms of special rights and responsibilities. [33.2.1]

The archaeological record of Nunavut is of spiritual, cultural, religious and educational importance to Inuit. Accordingly, the identification, protection and conservation of archaeological sites and specimens and the interpretation of the archaeological record is of primary importance to Inuit and their involvement is both desirable and necessary. [33.2.2]

In recognition of the cultural, spiritual and religious importance of certain areas in Nunavut to Inuit, Inuit have special rights and interests in these areas as defined by Article 33 of the Nunavut Land Claims Agreement. [33.2.5]

BACKGROUND: Palaeontology

Under the Nunavut Act¹, the federal Government can make regulations for the protection, care and preservation of palaeontological sites and specimens in Nunavut. Under the *Nunavut Archaeological and Palaeontological Sites Regulations*², it is illegal to alter or disturb any palaeontological site in Nunavut unless permission is first granted through the permitting process.

Definitions

¹ s. 51(1)

² P.C. 2001-1111 14 June, 2001

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 Nunavut Land Claims Agreement.

“palaeontological site” means a site where a fossil is found.

“fossil” includes:

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

Terms and Conditions

- 1) The permittee shall not operate any vehicle over a known or suspected archaeological or palaeontological site.
- 2) The permittee shall not remove, disturb, or displace any archaeological artifact or site, or any fossil or palaeontological site.
- 3) The permittee shall immediately contact the Department of Culture, Language, Elders and Youth (867) 934-2046 or (867) 975-5500 or 1 (866) 934-2035 should an archaeological site or specimen, or a palaeontological site or fossil be encountered or disturbed by any land use activity.
- 4) The permittee 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 the Department of Culture, Language, Elders and Youth, Government of Nunavut.
- 5) The permittee shall follow the direction of the Department of Culture, Language, Elders and Youth and DIAND in restoring disturbed archaeological or palaeontological sites to an acceptable condition.
- 6) The permittee shall provide all information requested by the Department of Culture, Language, Elders and Youth concerning all archaeological sites or artifacts and all palaeontological sites and fossils encountered in the course of any land use activity.
- 7) The permittee shall make best efforts to ensure that all persons working under authority of the permit are aware of these conditions concerning archaeological sites and artifacts, and palaeontological sites and fossils.
- 8) The permittee shall avoid the known archaeological and/or palaeontological sites listed in Attachment 1.

9) The permittee shall have an archaeologist or palaeontologist perform the following functions, as required by the Department of Culture, Language, Elders and Youth:

- a. survey
- b. inventory and documentation of the archaeological or palaeontological resources of the land use area
- c. assessment of potential for damage to archaeological or palaeontological sites
- d. mitigation
- e. marking boundaries of archaeological or palaeontological sites
- f. site restoration

The Department of Culture, Language, Elders and Youth shall authorize by way of a Nunavut Archaeologist Permit or a Nunavut Palaeontologist Permit, all procedures subsumed under the above operations.