



Land Administration  
P.O. Box 100  
Iqaluit, NU X0A 0H0  
Phone: 867-975-4275  
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*Your file - Votre référence*

*Our file - Notre référence*

May 31, 2012

Environment Canada  
Property Management District 3  
335 River Road  
Ottawa, ON  
K1G 1G9

Dear Mr. Carroll:

**Re: Land Use Permit #N2012N0012**  
**Type of Operation: Research Facility**  
**Location: Eureka, Baffin, NU, NTS 49G**

Enclosed is your copy of Land Use permit number N2012N0012 authorizing your project as described in your application dated April 4, 2012, received by this office April 10, 2012.

Your application has received a wide distribution to other Federal departments, Government of the Nunavut departments, communities in the area of your operation and concerned Inuit groups.

In distributing your application the Nunavut Impact Review Board (NIRB) sought comments from these various agencies based on their area of expertise that will help ensure minimum negative impact on the environment. The issuance of this permit indicates that as a result of the NIRB environmental screening process it was decided that the potentially adverse environmental effects that may be caused by your proposal are mitigable with known technology and are not significant. The terms and conditions in the permit will, in our opinion, provide the necessary protection to the environment.

Our office is requesting that an application be submitted to our office in the near future to have administration and control of the Reserve area for the Eureka Weather Station Facility transferred from the department of Aboriginal Affairs and Northern Development Canada to the department of Environment Canada under the *Federal Real Property and Federal Immovables Act*. Please contact our office should you require any assistance with the application requirements and process.

Please ensure that you adhere to the operating conditions, annexed to your permit. Should you have any questions regarding any conditions of this permit, please do not hesitate to contact me at 867-975-4283 or email [landsmining@aandc.gc.ca](mailto:landsmining@aandc.gc.ca).

Sincerely,



Tracey McCaie  
A/Manager, Land Administration

cc: Manager, Field Operations  
RMO - Baffin RMO  
NIRB  
NPC  
CIDMS #532498



**LAND USE PERMIT  
NORTHERN AFFAIRS PROGRAM**

**PERMIS D'UTILISATION DES TERRES  
PROGRAMME DES AFFAIRES DU NORD**

Permit Class - Permis Catégorie

**A**

Permit No - NE de permis

**N2012N0012**

Subject to the Territorial Land Use Regulations and the terms and conditions in this permit, authority is hereby granted to:

Sous réserve du Règlement sur l'utilisation des terres territoriales et des conditions de ce permis:

**Environment Canada, Property District 3**

Permittee - Détenteur de permis

To proceed with the land use operation described in the application of:

Est autorisé à entreprendre les travaux d'exploitation des terres décrits dans la demande de permis du:

Signature

**Carl Carroll**

Date

**May 31, 2012**

Type of Land Use Operation - Genre de travaux d'exploitation des terres

**Research Facility**

Location - Emplacement

**Eureka, Baffin, NU, NTS 49G**

The conditions attached to this permit are incorporated into and form an integral part of the permit.

Les conditions attachées à ce permis en font partie intégrante.

This permit may be assigned, extended, discontinued, suspended or cancelled pursuant to the Territorial Land Use Regulations.

Ce permis peut faire l'objet d'une cession, d'une prolongation d'une cessation d'une suspension ou d'une annulation, en vertu du Règlement sur l'utilisation des terres territoriales.

Dated at

Date à **Iqaluit**

Engineer  
Ingénieur

This

Ce **31st** Day of **May**, **2012**

Commencement Date

Date du début des travaux **May 31st, 2012**

Expiry Date

Date d'achèvement **May 30th, 2014**

**NOTE**

IT IS A CONDITION OF THIS PERMIT THAT THE PERMITTEE COMPLY WITH ANY OTHER APPLICABLE ACT, REGULATION, ORDINANCE BY - LAW OR ORDER DEFAULT HEREOF MAY RESULT IN SUSPENSION OR CANCELLATION OF THIS PERMIT.

**REMARQUE**

LE DÉTENTEUR DU PRÉSENT PERMIS DOIT SE CONFORMER À TOUT AUTRE RÈGLEMENT, LOI, DÉCRET RÈGLEMENT MUNICIPAL OU ARRÊTÉ APPLICABLE. LE MANQUEMENT À CETTE OBLIGATION POURRAIT DONNER LIEU À LA SUSPENSION OU À L'ANNULATION DU PERMIS.

**Canada**



**CONDITIONS ANNEXED TO AND FORMING PART  
OF LAND USE PERMIT NUMBER N2012N0012**

**31 (1) (a) - Location and Area**

1.	The Permittee shall not conduct this land use operation on any lands not designated in the accepted application, unless otherwise authorized in writing by the Engineer.	PLANS
2.	The Permittee shall ensure that all temporary camps are located on gravel, sand or other durable land.	CAMP LOCATION
3.	The Permittee shall not erect camps or store material on the surface ice of lakes or streams.	STORAGE ON ICE

**31 (1) (b) – Time**

4.	The Permittee's Field Supervisor shall contact or meet with a Land Use Inspector at the Iqaluit office of the Department of Indian Affairs and Northern Development, phone number (867) 975-4296, at least 48 hours prior to the commencement of this land use operation.	CONTACT INSPECTOR
5.	The Permittee shall advise a Land Use Inspector at least 10 days prior to the completion of the land use operation of ;  a) his plan for removal or storage of equipment and materials, and  b) when final clean-up and restoration of the lands used will be completed.	REPORTS BEFORE REMOVAL
6.	The Permittee shall complete all clean-up and restoration of the lands used prior to the expiry date of this permit.	CLEAN-UP
7.	The Engineer reserves the right to impose closure to any area to the Permittee in periods when dangers to natural resources are severe.	CLOSURE

**31 (1) (c) - Equipment**

8.	The Permittee shall not use any equipment except of the type, size and number that is listed in the accepted application, unless otherwise authorized in writing by the Land Use Inspector.	ONLY APPROVED EQUIPMENT
9.	The Permittee shall use a forced-air fuel-fired incinerator to incinerate all combustible garbage and debris.	INCINERATORS
10.	The Permittee shall burn all combustible garbage and debris in a container acceptable to a Land Use Inspector.	INCINERATION

11.	The Permittee shall keep all garbage and debris in a covered metal container to prevent access by wildlife.	GARBAGE CONTAINERS
12.	The Permittee shall, in camps of more than five (5) personnel, maintain the following fire-fighting equipment in the base camp and in active readiness:  (a) Four (4) backpack bags or cans complete with hand pumps.  (b) A minimum of two pieces of each of the following:  pulaskis, axes, shovels	FIRE FIGHTING EQUIPMENT
13.	The Permittee shall ensure that appropriate spill response equipment and clean-up materials (eg shovels, pumps, barrels, drip pans, and absorbents) must be readily available during any transfer of fuel or hazardous substances, as well as at fuel caches, vehicle-maintenance areas.	SPILL KITS

**31 (1) (e) - Type, Location, Capacity and Operation of Facilities**

14.	The Permittee shall not locate any sump within thirty-one (31) metres of the normal high water mark of any water body.	SUMPS FROM WATER
15.	The Permittee shall backfill and restore all sumps prior to the expiry date of this permit.	BACKFILL SUMPS
16.	The Permittee shall ensure that the land use area is kept clean and tidy at all times.	CLEAN WORK AREA

**31 (1) (f) - Control or Prevention of Flooding, Erosion and Subsidence of Land**

17.	The Permittee shall remove any obstruction to natural drainage caused by any part of this land use operation.	NATURAL DRAINAGE
18.	The Permittee shall not cut any stream bank unless authorized in writing by a Land Use Inspector.	STREAM BANKS
19.	The Permittee shall implement suitable erosion and sediment suppression measures on disturbed areas in order to prevent sediment from entering any water body.	EROSION AND SEDIMENT SUPPRESSION
20.	The Permittee shall use water or other non-toxic and biodegradable additives for dust suppression as necessary to maintain ambient air quality without causing water to pool or runoff.	DUST SUPPRESSION
21.	The Permittee shall take appropriate dust suppression measures when conducting soil turning and removal.	LANDFARM DUST SUPPRESSION



22.	The Permittee shall prepare the site in such a manner as to prevent rutting of the ground surface.	PREVENTION OF RUTTING
23.	The Permittee shall not move any equipment or vehicles unless the ground surface is in a state capable of fully supporting the equipment or vehicles without rutting or gouging.	VEHICLE MOVEMENT FREEZE-UP
24.	The Permittee shall suspend overland travel of equipment or vehicles if rutting occurs.	SUSPEND OVERLAND TRAVEL

**31 (1) (g) - Use, Storage, Handling and Disposal of Chemical or Toxic Material**

25.	The Permittee shall deposit all sewage into a sump.	SEWAGE DISPOSAL
26.	The Permittee shall store all fuel and chemicals in such a manner as to prevent access by wildlife	STORAGE
27.	The Permittee shall burn all garbage and debris at least daily.	GARBAGE DISPOSAL
28.	The Permittee shall remove all non-combustible garbage and debris from the land use area to a disposal site approved in writing by a Land Use Inspector.	REMOVE GARBAGE
29.	The Permittee shall dispose of all combustible waste petroleum products by removal.	WASTE PETROLEUM DISPOSAL
30.	The Permittee shall only treat petroleum and hydrocarbon contaminated soils/snow using the landfarm facility. Materials contaminated with other substances such as glycol and heavy metals are not to be stored in the landfarm and shall only be disposed of at an authorized facility. The Permittee shall ensure that the required standards set out in the Nunavut Water Board Water Licence for this project are met prior to any discharge of collected water in the retention cell.	CONTAMINATED SOIL/SNOW TREATMENT
31.	The Permittee shall ensure that the equipment used in the landfarm operation for aeration have been cleaned off within the landfarm facilities prior to exiting to prevent contaminated soil transfer.	LANDFARM EQUIPMENT
32.	All operational personnel shall be adequately trained prior to the commencement of any operation in the landfarm facility. Operational personnel should also be trained in the operational guidelines and commitments made by the Permittee for this project.	LANDFARM OPERATION TRAINING
33.	The Permittee shall dispose of all toxic or persistent substances in a manner as approved in writing by the Engineer.	WASTE CHEMICAL DISPOSAL

34.	The Permittee shall use drip pans or equivalent device when refueling equipment on-site. The Permittee shall ensure that an appropriate spill kit be readily available during transfer of any fuel.	REFUELING EQUIPMENT
35.	The Permittee shall ensure that all personnel are properly trained in fuel and hazardous waste handling procedures as well as spill response procedures.	PERSONNEL TRAINING
36.	The Permittee shall report all spills immediately in accordance with instructions contained in "Spill Report" form NWT 1752(05/93). Twenty four (24) hour spill report line (867)920-8130.	REPORT CHEMICAL AND PETROLEUM SPILLS
37.	The Permittee prior to the discharge of fluids from any sump, shall carry out an analysis of the fluids in a manner prescribed by the Engineer and obtain his written approval to discharge.	SUMP DISCHARGE

**31 (1) (h) - Wildlife and Fisheries Habitat**

38.	The Permittee shall not unnecessarily damage wildlife habitat in conducting this land use operation.	HABITAT DAMAGE
39.	The Permittee shall construct and maintain all structures placed in streams frequented by fish, in such a manner that will not obstruct passage of fish.	FREE FISH MOVEMENT
40.	The Permittee 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.	WILDLIFE SENSITIVITY
41.	The Permittee shall not obstruct the movement of fish while conducting this land use operation.	FREE FISH MOVEMENT
42.	<p>(1) The Permittee shall have all waste water clarified in settling ponds prior to its being returned to the stream.</p> <p>(2) The Permittee shall locate settling ponds above the high water mark of the stream.</p>	SETTLING PONDS
43.	During the period of May 15 to July 15, when caribou are observed within 1km of project operations, the Permittee shall suspend all operations, including low-level over flights. Following July 15, if caribou cows or calves are observed within 1km 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.	WILDLIFE SENSITIVITIES
44.	The Permittee shall ensure that all field personnel are made aware of the measures in place to protect wildlife and are made aware of the measures in place to protect wildlife and are provided training and/or advice on how to implement these measures.	WILDLIFE PROTECTION MEASURES



45.	The Permittee shall ensure that there is minimal disturbance to any nesting birds and wildlife in the area. Harassment of wildlife is prohibited. This includes persistently worrying or chasing animals, or disturbing large groups of animals.	NO HARASSING WILDLIFE
46.	The Permittee shall restrict aircraft/helicopter activity related to the project to a minimum altitude of 610m above ground level, unless there is a specific requirement for low-level flying, which does not disturb wildlife and migratory birds. Ensure that aircraft maintain a vertical distance of 1000m and a horizontal distance of 1500m from any observed groups (colonies) of migratory birds. Ensure that aircraft avoid the seaward side of seabird colonies and areas used by flocks of migrating waterfowl by 3km. It is recommended aircraft avoid critical and sensitive wildlife areas at all times by choosing alternate flight corridors. The Permittee shall also advise all pilots of relevant flight restrictions and enforce their application over the project area and flight paths to/from the project area.	LOW LEVEL FLIGHT RESTRICTION
47.	The Permittee shall ensure that aircraft/helicopter do not, unless for emergency, touch-down in areas where wildlife are present.	EMERGENCY TOUCHDOWN
48.	Your operation is in an area where bears may be encountered. Proper food handling and garbage disposal procedures will lessen the likelihood of bears being attracted to your operation. Information about the latest bear detection and deterrent techniques can be obtained from the Department of Renewable Resources at (867) 979-7800.	BEAR/MAN CONFLICT

**31 (1) (i) - Objects and Places of Recreational, Scenic and Ecological Value**

49.	The Permittee shall not feed wildlife.	NO FEEDING WILDLIFE
50.	The Permittee shall confirm there are no active nests (i.e. nests containing eggs or young) in the vicinity before activities commence. If active nests of any birds are encountered, the Permittee shall avoid these areas until nesting is complete and the young have left the nest. Activity near active nests should be limited to a distance greater than 100m.	NO DISTURBING NESTS

**31 (1) (k) - Petroleum Fuel Storage**

51.	The Permittee shall report in writing to a Land Use Inspector the location and quantity of all petroleum fuel caches within ten (10) days after the establishment.	REPORT FUEL LOCATION
52.	The Permittee shall not place any petroleum fuel storage containers within thirty-one(31) metres of the normal high water mark of any water body.	FUEL BY WATER



53.	The Permittee shall locate mobile fuel facilities on land when stationary for any period of time exceeding twelve (12) hours.	FUEL ON LAND
54.	The Permittee shall not allow petroleum products to spread to surrounding lands or into water bodies.	FUEL CONTAINMENT
55.	The Permittee shall have one extra fuel storage container on site equal to, or greater than, the size of the largest fuel container.	FUEL EXTRA CONTAINER
56.	The Permittee shall construct a dyke around each stationary fuel container or group of stationary fuel containers where any one container has a capacity exceeding 4,000 litres.	DYKE FUEL CONTAINERS
57.	The Permittee shall line the dyke and area enclosed by the dyke with a type of plastic film liner approved by the Engineer.	LINE DYKE
58.	The volume of the dyked area shall be 10% greater than the capacity of the largest fuel container placed therein.	CAPACITY
59.	The Permittee shall ensure that the dyke and the area enclosed by the dyke shall be impermeable to petroleum products at all times	IMPERMEABLE DYKE
60.	The Permittee shall:  a) examine all fuel storage containers for leaks a minimum of once every day.  b) repair all leaks immediately.	CHECK FOR LEAKS
61.	The Permittee shall use adequate secondary containment or a surface liner (eg. Self-supporting insta-berms and fold-a-tanks) when storing barrelled fuel and chemicals at all locations.	SECONDARY CONTAINMENT
62.	The Permittee shall mark all stationary petroleum products storage facilities with flags, posts or similar devices so that they are at all times plainly visible to local vehicle travel.	MARK FUEL LOCATION
63.	The Permittee shall seal all container outlets except the outlet currently in use.	SEAL OUTLET
64.	The Permittee shall mark all fuel containers with the Permittee's name.	MARK CONTAINERS

**31 (1) (m) - Matters Not Inconsistent with the Regulations**

65.	The Permittee shall display a copy of this permit in a conspicuous place in each campsite established to carry out this land use operation.	DISPLAY PERMIT
66.	The Permittee shall keep on hand, at all times during this land use operation, a copy of the Land Use Permit.	COPY OF PERMIT

67.	<p>The Permittee shall provide in writing to the Engineer, at least forty-eight (48) hours prior to commencement of this land use operation, the following information:</p> <ul style="list-style-type: none"> <li>a) person, or persons, in charge of the field operation to whom notices, orders, and reports may be served;</li> <li>b) alternates;</li> <li>c) all the indirect methods for contacting the above person(s).</li> </ul>	IDENTIFY AGENT
68.	The Permittee shall conspicuously display the land use permit number on all vehicles and equipment.	DISPLAY PERMIT NUMBER
69.	The Permittee shall submit to the Engineer a contingency plan, for chemical and petroleum spills, for use during the construction and operation of the winter road.	CONTINGENCY PLAN
70.	<ul style="list-style-type: none"> <li>a) During migration of caribou, the Permittee shall not locate any operation so as to block or cause substantial diversion of migration.</li> <li>b) The Permittee shall cease activities that may interfere with migration, such as airborne geophysics surveys or movement of equipment, until the migrating caribou have passed</li> </ul>	CARIBOU PROTECTION MIGRATION
71.	The Permittee shall abide by and comply with all applicable lawful rules, acts, regulations, and by-laws of Canada, Nunavut, any Municipal or regulatory body or authority having jurisdiction, the Nunavut Land Claim Agreement, and all other agreements, permits, licenses, and other instruments whatsoever related to the project.	ADHERENCE TO LAWFUL RULES, ACTS, REGS & BYLAWS
<b>Archaeological &amp; Paleontological Terms and Conditions for INAC Land Use Permit</b>		
72.	<p>“archaeological site” means a place where an archaeological artifact is found.</p> <p>“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.</p> <p>“palaeontological site” means a site where a fossil is found.</p> <p>“fossil” includes:</p> <ul style="list-style-type: none"> <li>(a) natural casts</li> <li>(b) preserved tracks, coprolites and plant remains; and</li> <li>(c) the preserved shells and exoskeletons of invertebrates and the eggs, teeth and bones of vertebrates.</li> </ul>	DEFINITIONS



73.	The Permittee shall avoid any known or suspected archaeological and/or palaeontological sites.	AVOIDANCE OF ARCHAEOLOGICAL AND/OR PALEONTOLOGICAL SITES
74.	The Permittee shall not remove, disturb, or displace any archaeological artifact or site, or any palaeontological site or fossil.	DISTURBANCE OF ARCHAEOLOGICAL AND/OR PALEONTOLOGICAL SITE
75.	<p>The Permittee shall immediately cease any activity should a suspected archaeological, palaeontological, or burial site be discovered during the course of a land use operation. The Permittee is required to immediately contact the Land Administration division at Indian and Northern Affairs Canada at (867)975-4283 or (867)975-4285 or (867)975-4280 as well as the Department of Culture, Language, Elders and Youth at (867)934-2046 or (867)975-5500 or 1(866)934-2035.</p> <p>Permission to resume land use operations must be obtained from the Engineer. At such time the Engineer may, at his/her discretion, require that you have an archaeologist or palaeontologist perform the following functions:</p> <ul style="list-style-type: none"> <li>(a) Survey</li> <li>(b) Inventory and documentation of the archaeological or paleontological resources of the land use area</li> <li>(c) Assessment of potential for damage to archaeological or palaeontological sites</li> <li>(d) Mitigation</li> <li>(e) Marking boundaries of archaeological or palaeontological sites</li> <li>(f) Site restoration</li> </ul>	CEASE OPERATION OF LAND USE ACTIVITY
76.	The Permittee shall ensure that all persons working under the authority of the permit are aware of these conditions pertaining to archaeological sites and artifacts as well as paleontological sites and fossils.	KNOWLEDGE OF ARCHAEOLOGICAL AND PALEONTOLOGICAL TERMS AND CONDITIONS

CIDM's #532186

## 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 ([http://www.sararegistry.gc.ca/default\\_e.cfm](http://www.sararegistry.gc.ca/default_e.cfm)) to get the current status of a species.

Updated: January 2012

Terrestrial Species at Risk <sup>1</sup>	COSEWIC Designation	Schedule of SARA	Government Organization with Primary Management Responsibility <sup>2</sup>
Eskimo Curlew	Endangered	Schedule 1	EC
Ivory Gull	Endangered	Schedule 1	EC
Ross's Gull	Threatened	Schedule 1	EC
Harlequin Duck (Eastern population)	Special Concern	Schedule 1	EC
Rusty Blackbird	Special Concern	Schedule 1	GN
Felt-leaf Willow	Special Concern	Schedule 1	GN
Peregrine Falcon	Special Concern ( <i>anatum-tundrius</i> complex <sup>3</sup> )	Schedule 1 - Threatened ( <i>anatum</i> ) Schedule 3 – Special Concern ( <i>tundrius</i> )	GN
Short-eared Owl	Special Concern	Schedule 3	GN
Peary Caribou	Endangered	Schedule 1	GN



Terrestrial Species at Risk <sup>1</sup>	COSEWIC Designation	Schedule of SARA	Government Organization with Primary Management Responsibility <sup>2</sup>
Barren-ground Caribou (Dolphin and Union population)	Special Concern	Schedule 1	GN
Polar Bear	Special Concern	Schedule 1	GN
Red Knot ( <i>rufa</i> subspecies)	Endangered	Pending	EC
Red Knot ( <i>islandica</i> subspecies)	Special Concern	Pending	EC
Porsild's Bryum	Threatened	Pending	GN
Horned Grebe (Western population)	Special Concern	Pending	EC
Grizzly Bear	Special Concern	Pending	GN
Wolverine (Western population)	Special Concern	Pending	GN
Atlantic Cod, Arctic Lakes	Special Concern	No schedule	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 population)	Special Concern	Pending	DFO
Beluga Whale (Eastern High Arctic – Baffin Bay population)	Special Concern	Pending	DFO
Bowhead Whale (Eastern Canada – West Greenland population)	Special Concern	Pending	DFO
Killer Whale (Northwest Atlantic / Eastern Arctic populations)	Special Concern	Pending	DFO
Narwhal	Special Concern	Pending	DFO

<sup>1</sup> The Department of Fisheries and Oceans has responsibility for aquatic species.

<sup>2</sup> Environment Canada (EC) 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>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.