

**SCIENTIFIC RESEARCH LICENCE APPLICATION**  
**LAND, FRESHWATER & MARINE BASED RESEARCH**

NRI strongly recommends that applicants review the following documents prior to submitting an application: *Scientific Research Licencing Guidelines* and *Negotiating Research Relationships in Inuit Communities: A Guide for Researchers*.

For more information about the Nunavut Research Institute (NRI) please visit our web site [www.nri.nu.ca](http://www.nri.nu.ca)

## IMPORTANT

This application fulfills the requirements for the NIRB environmental screening.  
Please be advised that your application will not be processed until the application form, project summary,  
and maps are received.

## SECTION 1: APPLICANT INFORMATION

**1a. Project Title**      **Hydrocarbon Potential of Ellef Ringnes Island**

**1b. Project Number**

Please indicate if applicant has submitted any previous application(s) to NRI related to this project proposal?	Yes	No	x
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If yes, please indicate the previous NRI licence number:

Please indicate if applicant has submitted any previous application(s) to NIRB related to this project proposal? Yes ☒ No ☐

If yes, please indicate the previous NIRB project number(s): NIRB 09YN056

**2. Applicant's full name and mailing address:**

Keith Dewing	Phone:	403-292-7135
Geological Survey of Canada	Fax:	403-292-4961
3303-33 <sup>rd</sup> St NW, Calgary, AB T2L 2A7	Email:	kdewing@NRCan.gc.ca

**3. Field Supervisor's name and mailing address:**

Steve Grasby	Phone:	403-292-7111
Geological Survey of Canada	Fax:	403-292-4961
3303-33 <sup>rd</sup> St NW, Calgary, AB T2L 2A7	Email:	sgrasby@NRCan.gc.ca

**4. Other Personnel list (name, position, affiliation)**

Steve Gordey, Research Scientist, GSC-Vancouver	Jennifer Galloway Research Scientist, GSC-Calgary
Ashton Embry, Research Scientist, GSC-Calgary	3 student assistants, to be determined Camp Manager Doug Stearn
Kirk Osadetz Research Scientist, GSC-Calgary	Wildlife monitor, to be determined Pilot and Engineer, to be determined

## SECTION 2: AUTHORIZATION NEEDED

**1. Indicate all authorizations associated with the project proposal:**

<input type="checkbox"/>	Regional Inuit Association (RIA)	<input type="checkbox"/>	Canadian Launch Safety (CLS)
<input checked="" type="checkbox"/>	Nunavut Water Board (NWB)	<input type="checkbox"/>	Environment Canada (EC)
<input type="checkbox"/>	Nunavut Planning Commission (NPC)	<input type="checkbox"/>	Department of Environment (GN)
<input checked="" type="checkbox"/>	Department of Indian And Northern Development (DIAND)	<input type="checkbox"/>	Department of National Defense (DND)
<input type="checkbox"/>	Department of Fisheries and Oceans (DFO)	<input type="checkbox"/>	Hamlet
<input type="checkbox"/>	Community Government & Services (CG&S)	<input type="checkbox"/>	Parks Canada (PC)
<input checked="" type="checkbox"/>	Nunavut Research Institute (NRI/GN)	<input type="checkbox"/>	Canadian Wildlife Service (CWS)
<input checked="" type="checkbox"/>	Department of Culture, Language, Elders, and Youth (CLEY/GN)	<input type="checkbox"/>	Other (please specify):

2. List the active permits, licences, or other rights related to the project proposal and their expiry date:

INAC Land Use Permit (currently being processed), anticipated to arrive in the next week (INAC LUP #: N2009N0010).

Nunavut Water Board (application submitted).

CLEY Paleontology Permit (application submitted).

Approval from Nunavut Impact Review Board (09YN056)

3. Have you applied for all authorizations required to conduct the project proposal activities?

☒ YES

☐ NO

### SECTION 3: PROJECT PROPOSAL DESCRIPTION

1. Indicate the activities related to the project proposal:

<input checked="" type="checkbox"/>	Temporary camp (to be removed at end of field season)	<input type="checkbox"/>	Soil disposal/ soil storage
<input type="checkbox"/>	Permanent camp (to remain for life of authorization)	<input type="checkbox"/>	Incineration of combustible wastes and removal of non-combustible wastes
<input type="checkbox"/>	Construction of recreational or safety cabin	<input type="checkbox"/>	River/ stream/ lake crossing or work/ bridge
<input checked="" type="checkbox"/>	Temporary fuel storage (to be removed at end of field season)	<input type="checkbox"/>	Drainage alteration
<input type="checkbox"/>	Permanent fuel storage (to remain for life of authorization)	<input type="checkbox"/>	Geoscientific sampling by diamond drilling
<input type="checkbox"/>	Placement of structures for life of permit (other than camp or cabin – i.e. scientific instruments)	<input checked="" type="checkbox"/>	Geoscientific sampling by soil sampling
<input type="checkbox"/>	Placement of permanent structures (other than camp or cabin – i.e. scientific instruments)	<input type="checkbox"/>	Geoscientific sampling by trenching
<input type="checkbox"/>	Air surveys (i.e. geophysical, wildlife)	<input type="checkbox"/>	Geoscientific sampling by borehole core
<input checked="" type="checkbox"/>	Use of aircraft/watercraft/land vehicle for personnel drop-off and pick-up to project location	<input type="checkbox"/>	Blasting
<input type="checkbox"/>	Use of on-site mechanized vehicles (i.e. atv, snowmobile, truck, zodiac)	<input type="checkbox"/>	Channeling
<input checked="" type="checkbox"/>	Sewage or grey water disposal via sump	<input type="checkbox"/>	Excavation
<input type="checkbox"/>	Hazardous waste storage or disposal	<input type="checkbox"/>	Hydrological testing
<input type="checkbox"/>	Solid waste disposal	<input type="checkbox"/>	Abandonment and restoration
<input type="checkbox"/>	Chemical storage	<input type="checkbox"/>	Site restoration (fertilization/ grubbing/ scarification/ spraying/ recontouring)
<input type="checkbox"/>	Explosives storage	<input checked="" type="checkbox"/>	Research
<input type="checkbox"/>	Soil testing	<input type="checkbox"/>	Ecological survey
		<input type="checkbox"/>	Harvesting
		<input type="checkbox"/>	Removal of vegetation for scientific purposes
		<input type="checkbox"/>	Other:

2. Personnel

Total No. of personnel on site = (A)	23	Total No. of days on-site = (B)	30	Total No. of Person days (A) × (B) =	690
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### 3. Timing

Period of operation:

25 June, 2010

to

6 August, 2010

Proposed term of  
authorization:

1 June 2010

to

30 September, 2011

Please outline the phases of the proposed project (construction/ operation/ decommissioning) including the timing and scheduling of each phase.

Camp Mobilization 25 June – 30 June, 2010

Field work 30 June – 02 August 2010

Camp demobilization and storage 03-06 August

Camp mobilization 25-30 June 2011

Field work 30 June – 02 August 2011

Decommission site and removal of all materials 03-06 August, 2011

### 4. Location(s) of data collection:

Location Name	Region	Co-ordinates	NTS Map Sheet #	Land Status
	North Baffin, South Baffin, Kivalliq, Kitikmeot	Lat (degree / minute), Long (degree / minute)		Crown, Commissioners', Inuit Owned
Ellef Ringnes Island	North Baffin	77° 46' N to 79° 20' N 98° 55' W to 105° 40' W	69F, 69E, 69G, 79H, 79E, 69D13, 69C16	Crown

If the project proposal includes a **camp**, please provide the coordinates of the camp location

Lat (degree/minute)

78°12.879'N

Long (degree/minute)

101°03.255'W

NTS Map Sheet # (if different from above)

069F

The Nunavut Impact Review Board may require additional location information in a subsequent Project Specific Information Requirement (PSIR) submission. This may take the form of a digital Geographic Information Systems (GIS) file.

## SECTION 4: NON-TECHNICAL PROJECT PROPOSAL DESCRIPTION

Please attach a non-technical description of the project proposal, no more than 500 words, in English and Inuktitut (+Inuinnaqtun, if in the Kitikmeot). The project description should outline the following:

- Project Title
- Researcher's Name and Affiliation
- Project Location
- Timeframe
- Project Description
  - purpose
  - goals & objectives

- method of transportation
- any structures that will be erected (permanent / temporary)
- restoration / abandonment plans
- Methodology
  - collection protocol
  - collection mechanisms
  - indicate why specific communities or individuals were selected for your research
- Data
  - short term & long term use of data
  - other uses of data
- Reporting
  - How will the research results be communicated to the individual participants, communities, regional and Nunavut organizations?
  - Will the research result in a publication?

## SECTION 5: MATERIAL USE

### 1. List equipment (including drills, pumps, aircrafts, vehicles etc.):

Equipment type and number	Size – dimensions	Proposed use
Bell 206L Helicopter	Rotor Span ~ 37 feet Length ~ 33 feet	To position field crews
Twin Otter (on Tundra tires)	Wing span ~ 65 feet Length ~ 52 feet	For transportation to and from camp

### 2. Detail fuel and hazardous material use:

Fuel	Number of Containers and Capacity of Containers	Total Amount of Fuel (in Litres)	Proposed Storage Methods
Diesel	4 x 45 gal. drums	820 L	Diesel fuel will be stored in secondary containment (berms) with spill kits and a contingency plan on hand.
Gasoline	N/A	N/A	N/A
Aviation fuel	120 x 45 gal. drum	24600 L	Aviation fuel will be contained in a secondary containment (berms) and spill kits and a contingency plan on hand.
Propane	10 x 20lb tank	200lbs	Stored in well ventilated area with berms and a fire extinguisher.
Other			
<b>Hazardous Materials and Chemicals</b>		<b>Total Amount of Hazardous Materials and Chemicals (in Litres)</b>	

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### 3. Detail daily water consumption rates

Daily amount (in Litres)	Proposed water retrieval methods	Proposed water retrieval location
~ 0.5	Manual retrieval using a bucket and mesh screening	Water would be taken from a nearby river.

### 4. Have you applied for a Class A License with the Nunavut Water Board?

☒ YES

☐ NO

## SECTION 6: WASTE DISPOSAL AND TREATMENT METHODS

### 1. List the types of waste:

Type of waste	Projected amount generated	Method of Disposal	Additional treatment procedures
Sewage (human waste)	2000 L over 5 weeks	Latrine	Incinerate
Greywater	2000 L over 5 weeks	Sump	
Combustible wastes	500 kg	Incinerate	
Non-Combustible wastes	500 kg	Fly out	
Overburden (organic soil, waste material, tailings)			
Hazardous waste			
Other:			

### 2. Will you be incinerating combustible waste, removing all solid waste, and removing the ash generated from incineration?

☒ YES

☐ NO

## SECTION 7: COMMUNITY INVOLVEMENT & REGIONAL BENEFITS

### 1. List the community representatives that have been contacted and provide the minutes of the meetings if available:

Community	Name	Organization	Date Contacted

### 2. How will the proposed project benefit Nunavut?

Generally, the project will help define the hydrocarbon potential of northwestern Nunavut allowing for better land use planning and highlight areas in need of baseline studies. On the local scale, this project anticipates hiring from Resolute Bay to provide a learning and employment opportunity as well vital help needed in realizing the success of this project.

**4. Describe and attach documentation regarding community support or concerns for the proposed project:**

Ellef Ringnes Island is one of the northernmost islands in Nunavut. It is 450 km north of Resolute Bay and 475 km northwest of Grise Fiord. The proposed project activities are to update the geology of Ellef Ringnes Island. Ellef Ringes is a desolate island with no communities occurring on the island and only a weather monitoring station at Isachsen. Similarly, the island does not have any national parks, wildlife areas, historic sites, or migratory bird sanctuaries

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**5. Is there a traditional knowledge component to this research project? If yes, please explain:**

There is no traditional knowledge component affiliated with this research project.

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**SECTION 8: GENERAL QUESTIONS**

**1. Do you give NRI permission to publish project information in the Nunavut Research Institute Annual Compendium of Research Undertaken in Nunavut?**

☒ YES

☐ NO

**2. Is the proposed research associated with International Polar Year (IPY)?**

☐ YES

☒ NO

**3. In addition to the application form, applicants are required to submit additional information in an electronic format to the Manager, Research Liaison, [cfilion@nac.nu.ca](mailto:cfilion@nac.nu.ca). Please check that the following have been submitted to NRI:**

- ☐ **Project Summary** -in English and Inuktitut (+Inuinnaqtun, if in the Kitikmeot)
- ☐ **NTS Maps** of the project

**Applicant:**

\_\_\_\_\_  
**Signature**

\_\_\_\_\_  
**Title**

\_\_\_\_\_  
**Date**