Facsimile Transmittal
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Nunavummi Qaujisaqtulirijikkut
Nunavut Research Institute

To:	Executive Director, NWB	From:	Susan Ignace Woodley / Mary Ellen Thomas
			Nunavut Research Institute, Nunavut Arctic College
Fax:	867-360-6369		Box 1720
Phone:			Iqaluit, Nunavut, XOA OHO
Date:	Mar. 7, 2002		Phone: (867) 979- 4108
Pages:	Including this cover = 11		Fax: (867) 979-4681
			e-mail: slcnri@nunanet.com
Re:	Research License		Website: http://pooka.nunanet.com/~research

Mar 7/02

Please find attached an environmental baseline study proposal from Inmet Mining Corp. They want to start April 1, Sorry for the short notice. Please advise us ASAP.

Thank you! Susan.

06/03/2002

DISTRIBUTION

Please find enclosed a copy of an application for a *Science Research Licence* from **Ben Hubert, Hubert and Associates, for Inmet Mining Corporation.**

Ben Hubert's research is titled "***Izok Project Feasibility and Environmental Baseline Studies***" and is proposed to take place from April 1, 2002 to November 30, 2002.

As per the **Scientists Act** of Nunavut, community consultation is required before a Science Research Licence can be issued. The documentation is provided for your information and review. A ***Reviewer Recommendation Form*** is enclosed for your response by **March 31, 2002.**

Thank you for your continued assistance. Please contact our office if you have any questions or concerns regarding the above.

Susan Ignace Woodley

for Mary Ellen Thomas
Manager, Research Liaison

encl.

cc: Environmental Assessment Screener, NIRB
Executive Director, NPC
Executive Director, NWB
Area Manager, DFO
Assistant Director of Wildlife Manager, NWMB
Lands Administrator, Kitikmeot Inuit Association
Mayor/SAO, Kugluktuk
Chairperson, Kugluktuk HTO

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Arctic College

Nunavummi Qaujisaqtulirijikkut /Nunavut Research Institute
Box 1720, Iqaluit, NT XOA OHO phone: (819) 979-4108 fax: (819) 979-4681 email: slcnri@nunanet.com

Reviewer Recommendation Form: Land &/or Water based Research

Applicant Name:	**Ben Hubert**
Project Name:	**Izok Project Feasibility and Environmental Baseline Studies**

Review Panel Name:	**Executive Director, NWB**
Region:	**Kitikmeot**

Research Discipline: Environmental Studies

Panel Comments:

Requested Terms or Conditions:

Approved ☐ Rejected ☐	Annual ☐ or Multi-year ☐	Signature	Title:	Date

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SCIENTIFIC RESEARCH LICENCE APPLICATION

(Land, Freshwater & Marine Based Research)

This application fulfills the requirements for NIRB environmental screening

SECTION 1: APPLICANT INFORMATION

Fax: 416 361 3564

1. Applicant's full name and mailing address:
Inmet Mining Corporation
Suite 3400, Maritime Life Tower
79 Wellington Street West
P O Box 19, TD Centre
Toronto, ON M5K 1A1

Att.: Ian Pirie, Project Manager
ph. 416 860 3955
E-mail: <pirieі@inmet-toronto.com>

2. Field Supervisor (address, if different from above): **Phone (radio or otherwise):**
Ben Hubert
1660 Evergreen Hill SW
Calgary, AB T2Y 3B6
ph. 403 256 0017 / fax 403 256 1228
E-mail: <bhubert@cadvision.com>

3. Other Personnel list (name and position):
The research to be completed will be conducted by consultants under contract to the Project. The individual study teams have yet to be determined. These details will be provided when consulting assignments have been made. This is expected for late March.

Total # of personnel: TBA **Total # of person days:** TBA

SECTION 2: AUTHORIZATION NEEDED

4. List the organisations you will contact for necessary authorizations associated with the project. (See Appendix A & B):

The research to be done under this application will be in support of the Izok Project, a base metal property in the West Kitikmeot Region of Nunavut. The field work is intended to address the gaps identified in the Izok Project Environmental Evaluation prepared in 1995. The work in 2002 will be attached to an overall land use program that will include a limited amount of diamond drilling. The work will be based out of the existing Izok Project Camp situated at 65 41 N X 112 53 W on a Surface Lease (#3055 dated May 27, 1998 ; also shows on maps as NWT Lease #86 H/10-1-7) issued by DIAND and expires on May 1, 2008). Other approvals required for the overall 2002 program include:

- Land Use Permit from DIAND Iqaluit;
- Water Use Licence for the Nunavut Water Board;
- Land Use Licence from KIA to trespass on IOL in the course of scientific studies;
- Wildlife Research Permit from GN-DSD;
- Fisheries Research Licence from DFO Iqaluit;
- Archaeologists' Permit from the Inuit Heritage Trust
- Wildlife Research Permit from GNWT-DRWED*;
- Scientist Licence from GNWT-ARI*.

* The study area may include watersheds and wildlife habitat in the Northwest Territories.

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

- the Izok Project ore body is held under DIAND subsurface mineral lease ML3163 which expires October 17, 2005;
- the existing camp and airstrip are on lands subject DIAND surface lease #3055 dated May 27, 1998 (Also known as NWT Lease #86 H/10-1-7) issued to Inmet and expires May 1, 2008.

SECTION 3: PROJECT PROPOSAL DESCRIPTION

6. Project duration:

Period of operation: April 1, 2002 to November 30, 2002
Proposed term of permit: April 1, 2002 to December 30, 2002.

Project Title:

Izok Project Feasibility and Environmental Baseline Studies

7. Location(s) of data collection:

- Land Status Types:
  Federal Crown and Inuit Owned Surface Lands - IOL block CO-05/76E, L, 86H.
- Please ensure that maps of the project area are attached (1:50 000, 1:250 000)

Location Name	Region	Latitude (north)	Longitude (west)	NTS Map sheet #	Land Status
Izok Lake plus 15 km radius including: Iznogoudh Lake Itchen Lake, and Ham Lake (IOL).	West Kitikmeot	65°30' to 65°45'	112°20' to 113°00'	86H	Crown and IOL
For additional sites, attach a separate page					

NON-TECHNICAL PROJECT PROPOSAL SUMMARY

8. On a separate page, please include a non-technical description of the project proposal, no more than 300 words, in English & Inuktituk (Inuinaktun, if in the Kitikmeot). The project description should outline the project activities (research methods, camps, etc.) and their necessity, method of transportation, any structures that will be erected, expected duration of activity and alternatives considered. If the proposed activity fits into any long-term developments, please describe the projected outcome of the development for the area and its timeline.

SECTION 4: MATERIAL USE

9. List equipment (including drills, pumps, aircrafts, etc.):

These environmental baseline studies are in support of the Izok Project, a base metal property currently in a development feasibility study. The feasibility study requires additional metallurgical tests that call for diamond drilling. A Land Use Application to DIAND for this work is in preparation and will be submitted to DIAND in Iqaluit shortly.

Equipment type and number	Size-dimensions	Proposed use

10. Detail fuel and hazardous materials use:

These details will be covered in the Land Use Application to DIAND.

Fuels	Number of Containers	Capacity of Containers (gal & litres)
• Diesel		
• Gasoline		
• Aviation fuel		
• Propane		
• Other		
Hazardous Materials	**Number of Containers/Concentration**	**Capacity of Containers (gal & litres)**
•		
•		
•		

10. Describe method of fuel transfer:

These details will be covered in a new Land Use Application to DIAND for the proposed diamond drilling program planned for the summer of 2002.

11. Describe any procedures and materials in place to handle accidental spills. Please attach the spill contingency plan and other appropriate information about the hazardous materials associated with the proposed project.

The overall environmental management and contingency plans will be included in the Land Use Application to DIAND.

SECTION 5: WASTE DISPOSAL AND TREATMENT FACILITIES

12. Describe amount and methods of disposal:

Type of Waste	Projected Amount Generated	Method of Disposal	Additional Treatment Procedures
Sewage		man-made lagoon	
Grey water		man-made lagoon	
Garbage		incinerator	
Overburden (organic soil, waste material, tailings)	none		
Hazardous waste:	none		
Other:	diamond drill cuttings	as per Land Use Permit terms and conditions.	

SECTION 6: RESTORATION AND ABANDONMENT PLANS

13. Describe or attach the proposed procedure for site restoration upon abandonment of any area associated with the project:

Site restoration and abandonment is subject to the conditions in the existing surface lease with DIAND.

SECTION 7: ENVIRONMENTAL IMPACT

14. Indicate and describe the components of the environment that are near the project area, as applicable. Attach any relevant maps or information:

Type of species (common name, associated herd, etc.)	Important Habitat Area (calving, staging, denning, migratory pathways, spawning, nesting, etc.)	Critical time periods (calving, post-calving, spawning, nesting, breeding, etc.)
Example: *Narwhal*	*Ice floe edge in Pond Inlet*	*June-July, around break-up*
Fish:	under study	under study
Caribou:	Bathurst herd under study	under study
Muskox:	under study	under study
Raptor:	under study	under study
Migratory Birds:	under study	under study
Waterfowl:	under study	under study
Seals:	none in study area	
Whales:	none in study area	

Narwhals:	none in study area	
Canid family (wolves, wolverines, foxes, etc.)	under study	under study
Bears (grizzly, polar, black):	under study	under study
Other:		
Eskers:	under study	under study
Communities:	under study	under study
Historical/Archaeological sites:	under study	under study

15. Indicate and describe other known uses of the area such as local development, traditional use (hunting/fishing/spiritual), outfitting, tourism, mineral development, research, etc.:

The massive sulfide mineralization was discovered in 1974. Intermittent mineral exploration field programs since then including diamond drilling campaigns in 1975, 1976, 1992, 1993, and 1995 have not noted any ongoing land use in the Project area by others.

16. Describe the impacts of the proposed project activity on the environmental components and uses, in the area listed above:

- large mammal studies will not require any collections or handling of live animals destructive sampling;
- studies of small mammal populatons may involve snap trapping in selected plant communities;
- fish populations and habitat studies will require a limited level of collection to establish baseline levels of metals and other contaminants in fish organ and muscle tissue;
- fish habitat studies will require collection of benthos, as wellas phytoplankton and periphyton samples;
- climate and hydro metric studies will require monitoring ambient conditions with electronic sensors.

No measurable effects on any of the environmental components or fish and wildlife populations under study are expected.

17. What are some suggested mitigation measures for these impacts?

It is expected that each of the studies to be done will employ "best practice" in the course of their work and that all will be completed in conformity with the environmental management plan filed with the Land Use Application to DIAND.

SECTION 7: COMMUNITY INVOLVEMENT & REGIONAL BENEFITS

18. List the community representatives that you have contacted about this proposed project:

The Project has been on "hold" since 1995. Prior to that there was an active consultation effort between Inmet and the community of Kugluktuk including negotiations on a draft community benefits agreement. Consultations with the Kugluktuk will resume will prior to commencement of the 2002 field work and continue through the course of the Project feasibility study phase.

Community	Name	Organisation	Date Contacted	Means	Telephone #	Fax #

19. Describe the level of involvement that the residents of Nunavut have had with respect to the proposed project. Elaborate on local employment opportunity, training programs, contracts, Inuit Impact Benefit Agreements (if applicable):

The Project feasibility study is expected to confirm technical and commercial feasibility which should lead to mine development which would be preceded by an Inuit Impact Benefit Agreement as per Article 26 of the NLCA. In the meantime Inmet will exercise its best effort to ensure participation by residents of Kugluktuk in the studies and other Project field activities. Inmet expects the same effort by its contractors and consultants.

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

21. Is there a Traditional Knowledge (TK) component to this research project? If yes, see Appendix C.

The Project falls within the geographic range of the NTKP study completed by the Kugluktuk HTO and KIA. The information collected is currently in the compilation stage and on completion the information relevant to the Izok Project area will be extracted from that study under terms and conditions to be agreed upon by Inmet and KIA.

Applicant

Signature President Title 21-02-02 Date

Summary of Proposed Environmental Studies at the Izok Project 2002

The environmental studies for Inmet Mining Corporation at the Izok Project in 2002 are intended to fill data gaps that remained from the studies completed there in the early 1990's. These studies are part of updating the Project's feasibility for commercial production of base metal concentrate. The studies will be undertaken in three separate assignments to consultants: climate and hydrology, wildlife and wildlife habitat (under separate application to Government of Nunavut Department of Sustainable Development), and fish populations and fish habitat including water quality.

The study of climate and hydrology will require an automatic weather station to be set up near the Project site. This station will record hourly data including: air temperature, wind speed and direction, and summer precipitation. The study of water flow through the Project area will start in May by measuring the snowcover on the watershed area upstream to the Project and estimating the water content in the snow that will melt and flow through the Project area. This study will also need an automatic water level recorder near the outflow of Iznogoudh Lake and several water level staff gauges that will require regular inspection to record the water levels of lakes both upstream and down stream of the automatic water level recorder. Finally, the study will also examine the presence and quantity of ground water in the Project area and if present, collect samples for ground water quality analyses.

The wildlife study is to collect information generally on all aspects of wildlife in the Project area. It will be done under separate licence from Government of Nunavut Department of Sustainable Development.

The fish and fish habitat study is to collect information of fish populations in the water bodies in the immediate vicinity of the Project both upstream and downstream of the Project. The study will include examination of fish habitat by making collections of lake and stream sediments and organisms. Collections of fish will also be made to take samples for analysing metal concentrations in fish liver and muscle tissue.

Inmet Mining has advised all consultants wishing to undertake this work that it is important to use as much local help as possible and expects that field assistants from Kugluktuk will be working on all field aspects of these studies.

The study area includes IOL Parcel CO-05 / 76 E, L, 86H. Results of these studies will be reviewed with the Kugluktuk HTO soon after final reports have been completed.

BH
07-02-02

Nainarhimayut Avatittigut Qauyihainiarhimayut IZOK-ligiyuni 2002-mi

Avatitigut qauyihainiarhimayut Inmet Uyagarhiuqtit Kuapurisan IZOK-ligiyuni 2002-mi ilitturiyumaplutik iniqtauhimaittunik qauyihaiyuni 1990-tit atulihaqtilugit. Qauyihainiit ilitturiyumigumaplutik uyagarhiuqviuyuminariahaa. Pingahunik atuni qauyihaipkainiaqtut: hilatigut imaqtigullu, an'ngutitigut umavitigullu (atuni tukhiutauyuq Nunavut Gavamanit An'nguhiqiyinit); iqaluqarninik qaffiuniinnirlu, imap qanurininiganirlu.

Hilatigut imaqtigullu qauyihainiq napparhiyariaqaqtut hilalirivikhamik igluqpangmik havarvihap haniani. Uvani hilalirivingmi naunairiniaqtut ublurhiutikkut ikaarniq tamat: hilap niglaumanianik unarnianigluuniit, anugip aulanianik kayumingnianiglu, auyamilu nipaliqnianik. Imaqtigut qauyihaiyut May-mi qauyihailirniaqtut aputip ivyunianik imap aulaviriniaqtaitigut kulvani havarvihap. Itqurniarlutiglu kanuq imangniariahaa aput mahaktigumi imarlu aulalirumi havarvihatigut. Imaqtigullu qauyihaiyut ilihiyariaqaqtut imap aulaviani itiniganik titigaqhimarutikhamik imigut Iznogoudh Tahiup haniani. Ilihiyariqarhutiglu imap ittiniinik uktutihanik tattini hivuani tunganilu nappaqtauniaqtup titigarhimaniaqtup. Kingulirmik, qauyihainiaqtut ilitturinahuarlutik nunap ikkiangani imaqariakhaa kanuraalurlu imaqariakhaa havarvihami. Nunap ikkiangani imaqarniqqat imaqtarlutik qauyihaqtahamingnik.

An'ngutitigut qauyihaiyumayut kattitirilutik ilitturiniarlutik quyarinaq an'ngutitigut havarvihami. Qauyihainiaqtut atuni laisitarlutik Nunavut Gavamaanit An'nguhiqiyinit.

Iqaluktiguttauq qaiyihaiyumayut kattitirilutik ilitturiniarlutik iqaluktigut qaffiuniinnik tattini havarvihap hivuani tunganilu imap aulaniagut. Qauyihainiaqtut ilitturiniarlutik iqaluqarninit kanurittakhaitta imap atani tattini imaarnilu aulayuni umayuvalungniglu immani. Iqaluktarniaqtullu ilitturiniarlutik iqaluit havivaluniliriahaita tinguini niqainilu.

Inmet Uyagarhiuqtit ilittugipkainarirumayut hapkuninga havangirumaniarumik ikpingnaqtuq ikayuqtiqarlutik nunaqaqqaqtunit ayurnangitpat niriukhutiglu havaqatauniaqtut Kurluqturmiut tamaini qauyihaiyutauyuni.

Qauyihaqtauniaqtuni hapkua ilauyut Inuit Nunangat Nappalik CO-05 / 76 E, L, 86II. Qauyihaiyutauyuni ilitturiyauyut ihivriuqtauniaqtut Kurluqtup An'ngutitigut Katimayiinit kilamik iniqtauriaqqata titiqqat qauyihaqtauyunit.