



VIA EMAIL

November 10, 2011

Ms. Phyllis Beaulieu
Manager of Licensing
Nunavut Water Board
PO Box 119
Gjoa Haven, NU X0B 1J0
licencing@nunavutwaterboard.org

Dear Ms. Beaulieu:

Re: Kiggavik Exploration Licence 2BE-KIG0812 – Amendment Request to Authorize Drilling During Low Flow Artesian Conditions.

Nunavut Water Board (NWB) Licence 2BE-KIG0812 was issued to AREVA Resources Canada Inc. for exploration activities on April 25, 2008 and expires December 31, 2012. The current application is intended to replace the application submitted March 29, 2011 and the approval granted July 16, 2011. AREVA has decided that drilling within 30 m of the ordinary high water mark at the Andrew Lake and Mushroom lake areas is not necessary at this time and has removed this request from the application. However, AREVA is requesting authorization for drilling during low flow artesian conditions in all areas of the Kiggavik Lease. Such drilling would allow further exploration for uranium deposits as well as provide valuable information regarding the groundwater.

Under the current and previous NWB Licenses (2BE-SIS0607 – expired May 2007 and 2BE-KIG0708 – expired May 2008), AREVA believes they have maintained good communication and compliance standards with the NWB as evidenced in the annual report.

AREVA is confident that the attached company commitments will ensure protection of the environment. In support of this amendment request the following documents are enclosed.

- Executive Summary – English and Inuktitut
- Amendment Application Form
- Technical Support
- Application fee \$30.00

The following AREVA environmental Management Plans also support this amendment application. Copies of these plans are provided annually to as appendices to the annual report. They have not been included in this submission as an effort to reduce paper use and also as their size would make electronic submission prior to hard copy submission not feasible. Additional hard copies of the following plans can be provided on request. The plans will be updated as needed to reflect any changes as a result of licence amendments and will be forwarded to the NWB upon completion.

- Spill Contingency Plan
- Abandonment and Restoration Plan
- Waste Management Plan
- Noise Abatement Plan
- Wildlife Monitoring and Mitigation Plan

Exploration at the Kiggavik Project received a positive conformity determination against the Keewatin Regional Land Use Plan by the Nunavut Planning Commission (NPC) on December 15, 2006. The Nunavut Impact Review Board (NIRB) issued a screening decision under the file No. 06AN085 on April 3, 2007 that no review would be required. NIRB subsequently determined a change in Project scope and issued additional recommendations in a letter dated August 30, 2007.

Applications to authorizing agencies including a Project Proposal for mine development were submitted in November 2008. The mine development applications and proposal received a positive conformity determination against the Keewatin Land Use Plan in January 2009 and the NIRB made a screening recommendation for a public review of the Kiggavik Project to the Minister of Indian and Northern Development in March 2009. On March 2, 2010 AREVA received confirmation from NIRB that the Minister's decision indicated that the Kiggavik Project is subject to public review in accordance with Part 5 of Article 12 of the Nunavut Land Claims Agreement (NLCA). AREVA is applying for this amendment under Articles 12.10.2 and 13.5.5 of the NLCA that allow for continued approvals and licences for exploration activities when a project has been referred to a review.

Please note that a copy of this amendment application has been forwarded to the NPC and the NIRB to confirm whether a NPC conformity and/or a NIRB screening is required. If you have any questions or require additional information, please do not hesitate to contact me.

Best regards,

A handwritten signature in blue ink, appearing to be 'KJ' followed by a long horizontal stroke.

Kim Jackson
Environment and Radiation Protection Supervisor
Kiggavik Project, AREVA Resources Canada Inc.
kim.jackson@areva.ca
Ph: (306) 343-4043

Enclosure

cc:
Andrew Keim – Aboriginal Affairs and Northern Development Canada
Brian Aglukark - Nunavut Planning Commission
Sophia Granchino - Nunavut Impact Review Board
Ryan Barry – Nunavut Impact Review Board

EXECUTIVE SUMMARY

The Kiggavik Project is a uranium surface exploration project located approximately 80 kilometres west of the community of Baker Lake. The project consists of the Kiggavik lease, which contains the Kiggavik Site to the north and Sissons site to the south, and a claim, St. Tropez which is north of the Kiggavik Site. Please note that although geological mapping and prospecting may be carried out on the St. Tropez claim, water use will not be required in this area and there will be no adverse impacts to the environment as a result of these activities. AREVA is submitting this amendment request to continue drilling during low flow artesian conditions which could occur anywhere on the Kiggavik Lease in order to carry out the above mentioned activities.

Planned activities for the 2012 field season are similar to those conducted during the 2007-2011 field seasons. It is expected that the drill and support crews will commence mobilization to site between May and June with drilling completed and camp prepared for the winter season by the end September. Operations and personnel for all work will be based out of the Kiggavik camp and will be supported by helicopter services. Diamond drilling will continue at the Kiggavik and Sissons sites, largely focusing on exploration drilling areas of potential mineralization. A program of prospecting and geological mapping is planned to take place on the Kiggavik Lease and St. Tropez claim. Ground geophysical surveys may be carried out throughout the lease areas to identify potential for additional mineral deposits and to further evaluate known deposit areas. Geotechnical investigations may also be carried out to gain information on foundation and pad design and the possible road routes.

Environmental baseline studies may also continue throughout the 2012 field season. Environmental baseline studies include aquatics, terrestrial, wildlife assessment, hydrological and hydrogeological assessments to address any data gaps which are identified during the review of the Kiggavik Project's Draft Environmental Impact Statement. Environmental baseline studies predominantly take place at the Kiggavik and Sissons areas; however these studies may also take place along the potential road routes and near Baker Lake to further assess the potential impacts of each road route option.

AREVA recognizes that continued economic and social growth depends on a healthy environment. AREVA is committed to carrying out its field programs in a safe, environmentally responsible and sustainable manner. AREVA's Kiggavik Project has developed Environment and Safety Management Systems which are ISO 14001:2004 and OHSAS 18001:2007 certified respectively. AREVA is strongly dedicated to avoiding or reducing adverse impacts that our activities may have, and concern for the environment and our personnel is of paramount importance to AREVA.



Application for Water Licence Amendment

Document Date: May 2011

Application Submission Date: 11/10/2011
Month/Day/Year

P.O. BOX 119
GJOA HAVEN, NUNAVUT
XOB 1J0
TEL: (867) 360-6338
FAX: (867) 360-6369

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NUNAVUT IMALIRIYIN KATIMAYIT
NUNAVUT WATER BOARD
OFFICE DES EAUX DU NUNAVUT

DOCUMENT MANAGEMENT

Original Document Date: April 2010

DOCUMENT AMENDMENTS

	Description	Date
(1)	Updated for public distribution as separate document from NWB Guide 7	June 2010
(2)	Updated NWB logos and reformatted table to allow rows to break across page	May 2011
(3)		
(4)		
(5)		
(6)		
(7)		
(8)		
(9)		
(10)		



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NUNAVUT WATER BOARD
NUNAVUT IMALIRIYIN KATIMAYIT
OFFICE DES EAUX DU NUNAVUT

APPLICATION FOR WATER LICENCE AMENDMENT

The applicant is referred to the NWB's Guide 7: Licensee Requirements Following the Issuance of a Water Licence for more information about this application form.

EXISTING LICENCE NO: 2BE-KIG0812

1. LICENSEE CONTACT INFORMATION

Is the licensee the same as that referred to on the existing licence?

☒ Yes ☐ No

If No, a licence assignment must be completed and approved by the NWB. **An amendment will only be issued in the name of the current licensee in the absence of assignment of the licence.**

If the licensee is the same, but the name of the licensee has changed, attach a certificate of name change.

Name: AREVA Resources Canada Inc

Address: P.O. Box 9204
817-45th Street West
Saskatoon SK
S7N 3X5

Phone: 1(306) 343-4043
Fax: 1(306) 343-4044
e-mail: kim.jackson@areva.ca

2. LICENSEE REPRESENTATIVE CONTACT INFORMATION – If different from Block 1.

Name:

Address:

Phone: _____

Fax: _____

e-mail: _____

(Attach authorization letter.)

3. NAME OF PROJECT

Has the name of the project changed?

☐ Yes ☒ No

If Yes, indicate the name of the project including the name of the location: _____

4. LOCATION OF UNDERTAKING

Does the proposed amendment change the location of the amended undertaking?

☐ Yes ☒ No

Provide the project extents and camp locations. Identify proposed changes.

Project Extents

Please see Figure 1.0-1 Kiggavik Lease and St.Tropez Claim Boundaries which show the extents of the Project.

Camp Location(s)

Latitude: (64°26'26" N)

Longitude: (97°39'36" W)

5. MAP

Does the proposed amendment change the locations of any of the main components of the undertaking?

☐ Yes ☒ No

Attach a topographical map, indicating the main components of the undertaking. Identify proposed changes.

NTS Map Sheet No.: 64A/05	Map Name: Kiggavik Main Area Components	Map Scale: 1:35,000
	Sissons Main Area Components	1:30,000
	Bong and Granite Main Area Components	1:25,000

6. NATURE OF INTEREST IN THE LAND

Does the proposed amendment change the nature of the interest in the land?

☐ Yes ☒ No

If Yes, indicate changes. _____

Check any of the following that are applicable to the proposed undertaking (at least one box under the 'Surface' header must be checked).

Sub-surface

☐ Mineral Lease from Nunavut Tunngavik Incorporated (NTI)

Date (expected date) of issuance: _____ Date of expiry: _____

☐ Mineral Lease from Indian and Northern Affairs Canada (INAC)

Date (expected date) of issuance: _____ Date of expiry: _____

Surface

☒ Crown Land Use Authorization from Indian and Northern Affairs Canada (INAC)

Date (expected date) of issuance: _____ Date of expiry: _____

☐ Inuit Owned Land (IOL) Authorization from Kitikmeot Inuit Association (KIA)

Date (expected date) of issuance: _____ Date of expiry: _____

☒ IOL Authorization from Kivalliq Inuit Association (KivIA)

Date (expected date) of issuance: _____ Date of expiry: _____

☐ IOL Authorization from Qikiqtani Inuit Association (QIA)

Date (expected date) of issuance: _____ Date of expiry: _____

☐ Commissioner's Land Use Authorization

Date (expected date) of issuance: _____ Date of expiry: _____

☐ Other _____

Date (expected date) of issuance: _____ Date of expiry: _____

Is the name of the entity(s) holding authorizations the same as that considered in the existing water licence?

☒ Yes ☐ No

If No, a licence assignment must be completed and approved by the NWB.

Name of entity(s) holding authorizations:

7. NUNAVUT PLANNING COMMISSION (NPC) DETERMINATION

Indicate the land use planning area in which the existing project is located.

- | | |
|---------------------------------------|--|
| <input type="checkbox"/> North Baffin | <input checked="" type="checkbox"/> Keewatin |
| <input type="checkbox"/> South Baffin | <input type="checkbox"/> Sanikiluaq |
| <input type="checkbox"/> Akunnig | <input type="checkbox"/> West Kitikmeot |

Does the proposed amendment change the land use planning area?

- ☐ Yes ☒ No

If yes, indicate the land use planning area in which the amended undertaking is located.

- | | |
|---------------------------------------|---|
| <input type="checkbox"/> North Baffin | <input type="checkbox"/> Keewatin |
| <input type="checkbox"/> South Baffin | <input type="checkbox"/> Sanikiluaq |
| <input type="checkbox"/> Akunnig | <input type="checkbox"/> West Kitikmeot |

Was a land use plan conformity determination required from NPC prior to the issuance of the existing water licence?

- ☒ Yes ☐ No

If Yes, indicate date issued and attach copy. Dec.15, 2006

Does the proposed amendment change the original NPC conformity determination or the need to obtain one?

- ☐ Yes ☒ No

If Yes, indicate date issued (or expected) and attach a copy. _____

If No, provide written confirmation from NPC confirming that a land use plan conformity review is not required.

8. NUNAVUT IMPACT REVIEW BOARD (NIRB) DETERMINATION

Was a screening determination required from NIRB prior to the issuance of the existing water licence?

- ☒ Yes ☐ No

If Yes, indicate date issued and attach copy. April 3, 2007

Does the proposed amendment change the original NIRB screening determination or the need to obtain one?

- ☐ Yes ☒ No

If Yes, indicate date issued (or expected) and attach a copy. _____

If No, provide written confirmation from NIRB confirming that a screening determination is not required.

9. DESCRIPTION OF UNDERTAKING

Does the proposed amendment change the description of the undertaking?

☒ Yes ☐ No

List and attach plans and drawings or project proposal. Identify proposed changes.

There are no changes to the field program described in the December 2007 application which, as indicated in this application, will include geological mapping, geochemical and geophysical surveys, approximately 12,000 -14,000 meters of diamond drilling, and drill core logging and sampling. Environmental Baseline work may be conducted in 2012 including hydrology, aquatics, fish habitat, wildlife, soils and vegetation, marine and archaeology. Such studies would focus on supplementing data collected in previous years.

This amendment request is related to Part F section 6 of the Water Licence which states:

"If artesian flow is encountered, drill holes shall be immediately sealed and permanently capped to prevent induced contamination of groundwater or salinization of surface waters. The Licensee shall report all artesian flow occurrences within the Annual Report, including the location (GPS coordinates) and dates."

AREVA would like to further drilling efforts in areas which have encountered artesian flows in past field seasons. Artesian flows are expected in the Bong Grid area however artesian flows can be encountered anywhere while drilling. Exploration drilling, such as that planned for the Bong Grid area, is required in order to further assess the potential for future mining. AREVA is committed to continue to communicate with both NWB and INAC when experiencing artesian flows in order to properly assess the situation on a case-by-case basis.

In addition to the Kiggavik Project's environmental Management Plans the attached Technical Support document outlines the mitigation measures that will be implemented in order to preserve the integrity of the environment while carrying out the proposed activities.

10. OPTIONS

Does the proposed amendment change any of the alternative methods and locations that were considered to carry out the project?

☐ Yes ☒ No

Provide a brief explanation of the alternative methods or locations that were considered to carry out the project. Identify proposed changes.

11. CLASSIFICATION OF PRIMARY UNDERTAKING

Indicate the primary classification of undertaking for the existing licence by checking one of the following boxes:

- | | |
|--|--|
| <input type="checkbox"/> Industrial | <input type="checkbox"/> Agricultural |
| <input checked="" type="checkbox"/> Mining and Milling (includes exploration/drilling/exploration camps) | |
| <input type="checkbox"/> Conservation | <input type="checkbox"/> Recreational |
| <input type="checkbox"/> Municipal (includes camps/lodges) | <input type="checkbox"/> Miscellaneous (describe below): |
| <input type="checkbox"/> Power | <u>baseline studies</u> |

Does the proposed amendment change the classification of primary undertaking?

☐ Yes ☒ No

If Yes, indicate the primary undertaking of the amendment: _____

Information in accordance with applicable Supplemental Information Guidelines (SIG) must be updated and submitted with an Application for Amendment. Indicate which SIG(s) are applicable to your application.

- ☐ Hydrostatic Testing
- ☐ Tannery
- ☐ Tourist / Remote Camp
- ☐ Landfarm & On-Site Storage of Hydrocarbon Contaminated Soil
- ☐ Onshore Oil and Gas Exploration Drilling
- ☒ Mineral Exploration / Remote Camp
- ☐ Advanced Exploration
- ☐ Mine Development
- ☐ Municipal
- ☐ General Water Works
- ☐ Power

12. WATER USE

Indicate, using the boxes below, the types of water use(s) approved in the existing licence.

- | | |
|--|---|
| <input checked="" type="checkbox"/> To obtain water for camp/ municipal purposes | |
| <input checked="" type="checkbox"/> To obtain water for industrial purposes | <input type="checkbox"/> To divert a watercourse |
| <input type="checkbox"/> To cross a watercourse | <input type="checkbox"/> To modify the bed or bank of a watercourse |
| <input type="checkbox"/> To alter the flow of, or store water | <input type="checkbox"/> Flood control |
| <input type="checkbox"/> Other: _____ | |

Does the proposed amendment change the type(s) of water use(s)?

☐ Yes ☒ No

If Yes, indicate using the boxes below, the proposed change(s) to the type(s) of water use(s) noting any water use(s) that are to be added, continued, or removed.

- | | |
|---|---|
| <input type="checkbox"/> To obtain water for camp/ municipal purposes | |
| <input type="checkbox"/> To obtain water for industrial purposes | <input type="checkbox"/> To divert a watercourse |
| <input type="checkbox"/> To cross a watercourse | <input type="checkbox"/> To modify the bed or bank of a watercourse |
| <input type="checkbox"/> To alter the flow of, or store water | <input type="checkbox"/> Flood control |
| <input type="checkbox"/> Other: _____ | |

13. QUANTITY OF WATER INVOLVED

Does the proposed amendment change the source of water?

☐ Yes ☒ No

Indicate the water source(s). Identify proposed changes.: Water sources are shown on the attached maps. No changes to water sources.

(show location(s) on map)

Does the proposed amendment change the quality of the water source and/or its available capacity?

☐ Yes ☒ No

Describe the quality of the water source(s) and the available capacity(s). Identify any changes.: _____

Does the proposed amendment change the overall quantity of water to be used?

☐ Yes ☒ No

Provide the overall estimated quantity to be used. Identify proposed changes. : 300 m³/day – no changes required

Does the proposed amendment change the quantity of water to be used from each source?

☐ Yes ☒ No

Provide the estimated quantity(s) of water to be used from each source. Identify proposed changes. :

Does the proposed amendment change the quantity of water to be used for each purpose?

☐ Yes ☒ No

Provide the estimated quantities to be used for each purpose (camp, drilling, etc.). Identify proposed changes.:

Camp - 10 m³/day Drills – 290 m³/day (no change)

Does the proposed amendment change the method(s) of extraction?

☐ Yes ☒ No

Describe the method(s) of extraction. Identify proposed changes. : _____

Does the proposed amendment change the quantity(s) of water returned to source(s)?

☐ Yes ☒ No

Estimated quantity(s) of water returned to source(s). Identify proposed changes. : _____ m³/day

Does the proposed amendment change the quality(s) of water returned to source(s)?

☐ Yes ☒ No

Describe the quality(s) of water(s) returned to source(s). Identify any changes. : _____

14. WASTE

Check the appropriate box(s) to indicate the types of waste(s) approved in the existing licence.

- | | |
|---|---|
| <input checked="" type="checkbox"/> Sewage | <input checked="" type="checkbox"/> Waste oil |
| <input checked="" type="checkbox"/> Solid Waste | <input checked="" type="checkbox"/> Greywater |
| <input checked="" type="checkbox"/> Hazardous | <input type="checkbox"/> Sludges |
| <input checked="" type="checkbox"/> Bulky Items/Scrap Metal | <input type="checkbox"/> Contaminated soil and/or water |
| <input type="checkbox"/> Animal Waste | |
| <input checked="" type="checkbox"/> Other (describe): _____ | |

Does the proposed amendment change the type(s) of waste(s) to be generated or deposited?

☐ Yes ☒ No

If Yes, indicate using the boxes below, the proposed change(s) to the type(s) of waste(s) to be generated and/or deposited noting the addition, removal or continued generation and/or disposal of waste(s).

- | | |
|--|---|
| <input type="checkbox"/> Sewage | <input type="checkbox"/> Waste oil |
| <input type="checkbox"/> Solid Waste | <input type="checkbox"/> Greywater |
| <input type="checkbox"/> Hazardous | <input type="checkbox"/> Sludges |
| <input type="checkbox"/> Bulky Items/Scrap Metal | <input type="checkbox"/> Contaminated soil and/or water |
| <input type="checkbox"/> Animal Waste | |
| <input type="checkbox"/> Other (describe): _____ | |

15. QUANTITY AND QUALITY OF WASTE INVOLVED

Does the proposed amendment change the quantity(s) of the types of wastes involved?

☐ Yes ☒ No

Does the proposed amendment change the composition(s) of the types of wastes involved?

☐ Yes ☒ No

Does the proposed amendment change the method(s) of treatment for the types of waste involved?

☐ Yes ☒ No

Does the proposed amendment change the method(s) of disposal for the types of waste involved?

☐ Yes ☒ No

If Yes to any of the above, describe the proposed changes: _____

For each type of waste indicated in Block 14, describe its composition, quantity in cubic meters/day, method of treatment and method of disposal.

Type of Waste	Composition	Quantity Generated	Treatment Method	Disposal Method
Sewage	Liquid	~6 m ³ /day	NA	Mixed with greywater for disposal into a designated low lying area
Sewage	Solid	~0.8 m ³ /day		Incinerated Daily
Solid Waste	Paper, non-treated wood, food waste, domestic garbage			Incinerated Daily
Hazardous	Used aerosol cans, used oil filters			Properly sorted and stored for future transport to an approved facility
Bulky Items/ Scrap Metal				Sorted and stored for future transport to an approved facility
Waste Oil				Used in waste oil generators
Greywater	Shower, kitchen water	Up to 10 m ³ /day	Kitchen grease and food particles removed inline	Discharged into low lying depression
Drill Cuttings (non-mineralized)	Uranium concentration <0.05%			Pumped to a natural low-lying depression
Drill Cuttings (mineralized)	Uranium concentration ≥0.05%			Collected and stored in radioactive storage compound

16. OTHER AUTHORIZATIONS

Does the proposed amendment change the need for other authorizations in addition to the sub-surface and surface land use authorizations provided in Block 6?

☐ Yes ☒ No

If Yes, indicate any additional authorizations required, which authorizations are no longer required, and which authorizations continue to be required.

For each provide the following:

Authorization: _____

Administering Agency: _____

Project Activity: _____

Date (expected date) of issuance: _____ Date of expiry: _____

17. PREDICTED ENVIRONMENTAL IMPACTS OF UNDERTAKING AND PROPOSED MITIGATION MEASURES

Does the proposed amendment change the predicted environmental impacts of the undertaking or the mitigation measures?

☐ Yes ☒ No

Describe direct, indirect, and cumulative impacts related to water and waste. Identify any changes.

18. WATER RIGHTS OF EXISTING AND OTHER WATER USERS

Was compensation paid and/or an agreement(s) for compensation been entered into with any existing or other users of water during consideration of the existing licence?

☐ Yes ☒ No

If Yes, provide the names, addresses and the nature of water use by those persons or properties.

Does the proposed amendment adversely affect any known persons or property including those that hold licences for water use in precedence to the application, domestic users, in-stream users, authorized waste depositors, owners of property, occupiers of property, and/or holders of outfitting concessions, registered trapline holders, and holders of other rights of a similar nature?

☐ Yes ☒ No

If Yes, provide the names, addresses and the nature of water use of those persons or properties.

Advise the Board if compensation has been paid and/or an agreement(s) for compensation has been reached with any existing or other water users with respect to the proposed amendment.

19. INUIT WATER RIGHTS

Was compensation paid/ or an agreement(s) for compensation been entered into with any Designated Inuit Organization (DIO) during consideration of the existing licence?

☐ Yes ☒ No

If Yes, which DIO(s) _____

Does the proposed amendment substantially affect the quality, quantity or flow of waters flowing through Inuit Owned Land (IOL)?

☐ Yes ☒ No

If Yes, advise the Board if negotiations have commenced or an agreement to pay compensation for any loss or damage has been reached with one or more DIO(s) with respect to the proposed amendment.

20. CONSULTATION - Provide a summary of any consultation meetings including when the meetings were held, where and with whom. Include a list of concerns expressed and measures to address concerns.

Consultations are carried out each year and reported in the Annual Reports but topics in this application were not discussed at the consultation sessions.

21. SECURITY INFORMATION

Does the proposed amendment change the financial security assessment?

☐ Yes ☐ No

Does the proposed amendment change the estimate of the total financial security for final reclamation?

☐ Yes ☐ No

An estimate of the total financial security for the final reclamation was not submitted with the original water licence application. AREVA is in the process of finalizing this estimate with approval from the Kivalliq Inuit Association (KIA) and Indian and Northern Affairs Canada (INAC). Once this estimate has been finalized AREVA can forward it to the NWB if required.

Provide an estimate of the total financial security for final reclamation equal to the total outstanding reclamation liability for land and water combined sufficient to cover the highest liability over the life of the undertaking. Estimates of reclamation costs must be based on the cost of having the necessary reclamation work done by a third party contractor if the operator defaults. The estimate must also include contingency factors appropriate to the particular work to be undertaken. Identify any changes in the financial security assessment resulting from the proposed amendment.

Where applicable, the financial security assessment should be prepared in a manner consistent with the principals respecting mine site reclamation and implementation found in the *Mine Site Reclamation Policy for Nunavut*, Indian and Northern Affairs Canada, 2002.

22. FINANCIAL INFORMATION

Is the statement of financial security the same as that considered in the existing water licence?

☐ Yes ☐ No

A statement of financial security was not included with the original licence application.

Provide an updated statement of financial security.

If the applicant is a business entity please answer the questions below:

Is the list of the officers of the company the same as those considered in the existing water licence?

☐ Yes ☒ No

Provide a list of the officers of the company.

Is the Certificate of Incorporation or evidence of registration of the company name the same?

☒ Yes ☐ No

Attach a copy of the Certificate of Incorporation or evidence of registration of the company name.

23. STUDIES UNDERTAKEN TO DATE

List and attach updated studies, reports, research etc.

Provide a compliance assessment and status report including a response to any inspector's reports. The licensee must contact the NWB for licence specific direction in completing the assessment and report.

If in non-compliance, a licence may not be issued until compliance is achieved. If in non-compliance, attach plans/reports for consideration. Application will not be processed if significant issues of non-compliance exist.

All license conditions and what AREVA is doing to be in compliance are included in each Annual Report. At this time AREVA has not yet received the NWB/AANDC inspection report from the 2011 field season, however it is our understanding that AREVA is in compliance with the conditions listed in the water use licence.

24. PROPOSED TIME SCHEDULE

Does the proposed amendment change the time schedule considered in the existing licence for any phase of development?

☐ Yes ☒ No

Indicate the start and completion dates for each applicable phase of development (construction, operation, closure, and post closure). Identify proposed changes.

Exploration activities run approximately May to September of each year.

Construction

Proposed Start Date: _____ Proposed Completion Date: _____
(month/year) (month/year)

Operation

Proposed Start Date: _____ Proposed Completion Date: _____
(month/year) (month/year)

Closure

Proposed Start Date: _____ Proposed Completion Date: _____
(month/year) (month/year)

Post - Closure

Proposed Start Date: _____ Proposed Completion Date: _____
(month/year) (month/year)

For each applicable phase of development indicate which season(s) activities occur.

Construction

☐ Winter ☐ Spring ☐ Summer ☐ Fall ☐ All season

Operation

☐ Winter ☐ Spring ☐ Summer ☐ Fall ☐ All season

Closure

☐ Winter ☐ Spring ☐ Summer ☐ Fall ☐ All season

Post - Closure

☐ Winter ☐ Spring ☐ Summer ☐ Fall ☐ All season

25. PROPOSED TERM OF LICENCE

On what date does the existing licence expire? December 31, 2012

Is the Licensee applying for a combined renewal and amendment of the existing licence?

☐ Yes ☒ No

If Yes, indicate the proposed term of the renewal (maximum of 25 years): _____

Requested date of renewal issuance: _____ Requested Expiry Date: _____
(month/year) (month/year)

(The requested date of renewal issuance must be at least three (3) months from the date of application for a type B water licence and at least one (1) year from the date of application for a type A water licence, to allow for processing of the water licence application. These timeframes are approximate and do not account for the time to complete any pre-licensing land use planning or development impact requirements, time for the applicant to prepare and submit a water licence application in accordance with any project specific guidelines issued by the NWB, or the time for the applicant to respond to requests for additional information. See the NWB's *Guide 5: Processing Water Licence Applications* for more information)

26. ANNUAL REPORTING

Will the proposed amendment change the content of annual reports or the annual report template?

☐ Yes ☒ No

AREVA will continue to list all artesian flows encountered along with dates and GPS coordinates within the annual report.

If Yes, provide details regarding the content of annual reports and a proposed outline or template of the annual report.

27. CHECKLIST

The following must be included with the application for Amendment for the water licensing process to begin.

Completed Application for Water Licence Amendment form.

☒ Yes ☐ No If no, date expected _____

Information addressing Supplement Information Guideline (SIG), where applicable (see Block 11)

☐ Yes ☐ No If no, date expected _____

Compliance Assessment / Status Report (see Block 23).

☒ Yes ☐ No If no, date expected _____

Indication of Renewal Requirement (see Block 26)

☒ Yes ☐ No If no, date expected _____

English Summary of Amendment Application.

☒ Yes ☐ No If no, date expected _____

Inuktitut and/or Inuinnaqtun Summary of Amendment Application.

☐ Yes ☒ No If no, date expected November 18, 2011

Application fee of \$30.00 CDN (Payee Receiver General for Canada).

☒ Yes ☐ No If no, date expected _____

Water Use Fee Deposit of \$30.00 CDN (Payee Receiver General for Canada). The actual water use fee will be calculated by the NWB based upon the amount of water authorized for use in accordance with the Regulations at the time of issuance of the licence.

☐ Yes ☒ No If no, date expected _____

28. SIGNATURE

Kim Jackson

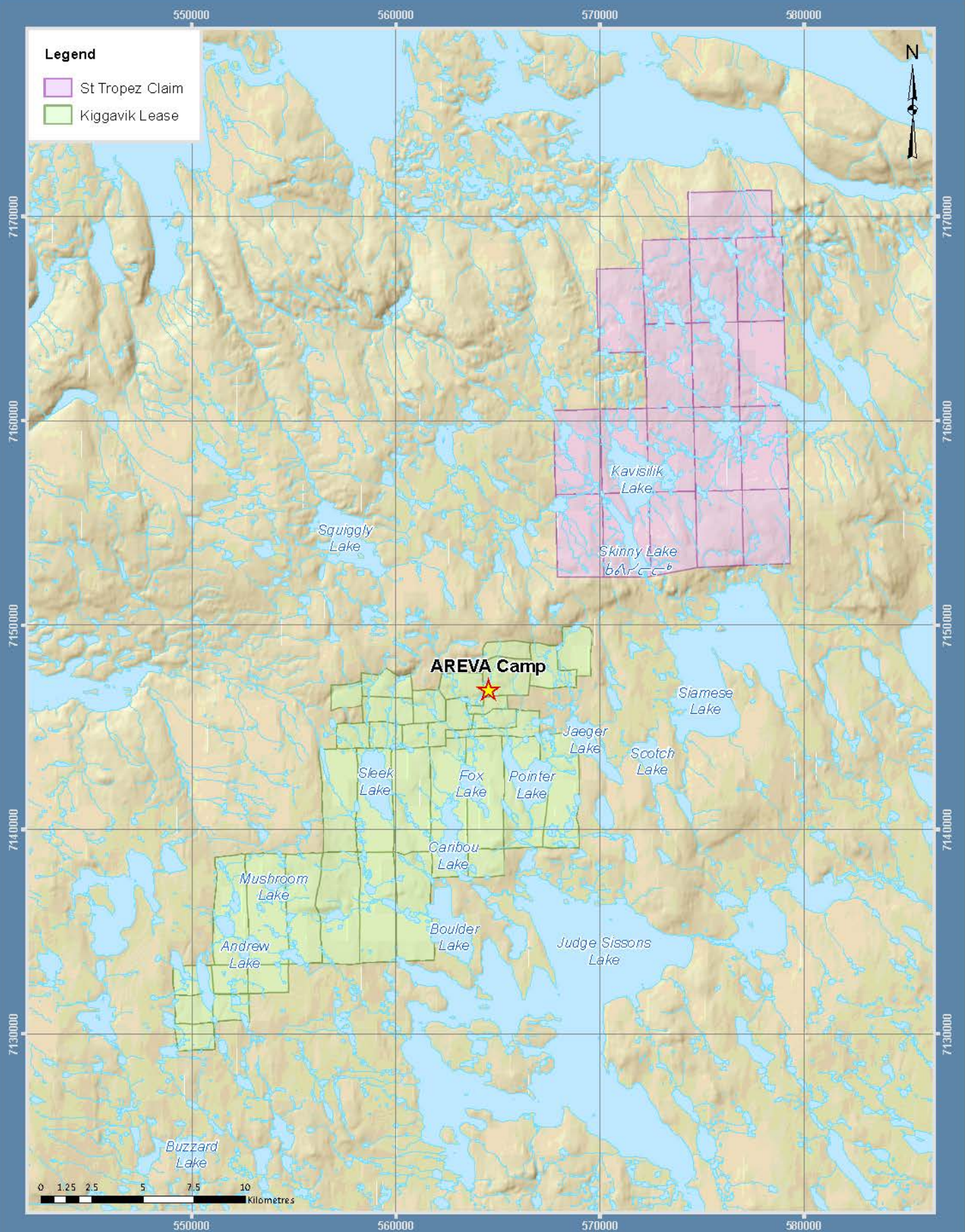
Name (Print)

Environment and
Radiation Protection
Supervisor

Title (Print)


Signature

Nov. 10, 2011
Date



Projection: NAD 1983 UTM Zone 14N
 Creator: CDC
 Date: 10/29/2010 Scale: 1:250,000
 File: K09A015

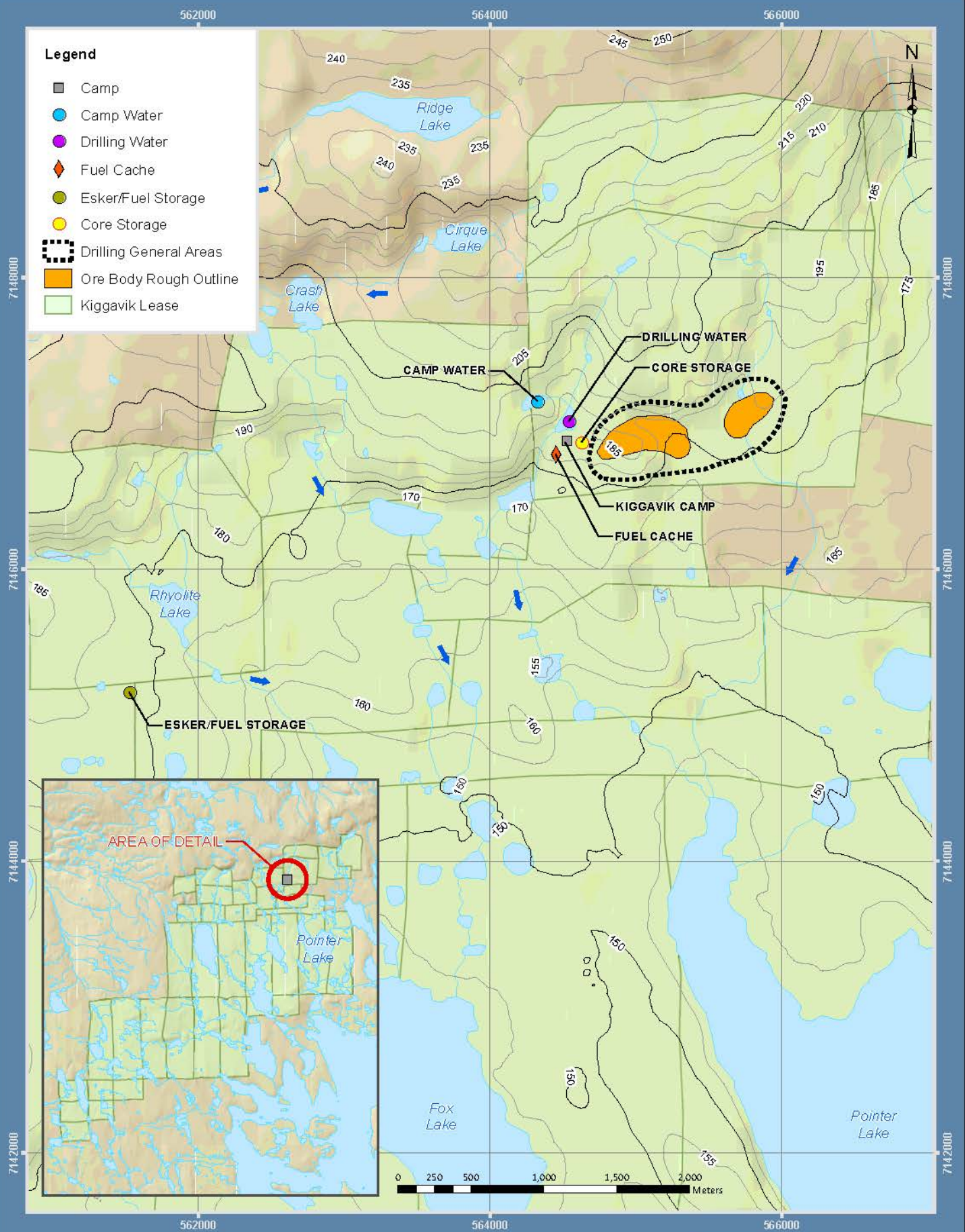
Data Sources: Natural Resources Canada, Geobase®, Notion
 Topographic Database, AREVA Resources Canada Inc.

FIGURE 1.0-1
 KIGGAVIK LEASES AND
 ST TROPEZ CLAIM BOUNDARIES

NWB AMENDMENT APPLICATION

**Kiggavik
 Project**





Projection: NAD 1983 UTM Zone 14N
 Creator: CDC
 Date: 02/18/2011 Scale: 1:35,000
 File: KIG9A017

Data Sources: Natural Resources Canada, Geobase®, Nation
 Topographic Database, AREVA Resources Canada Inc.

FIGURE 1.0-2
 KIGGAVIK MAIN AREA COMPONENTS

NWB AMENDMENT APPLICATION

**Kiggavik
 Project**



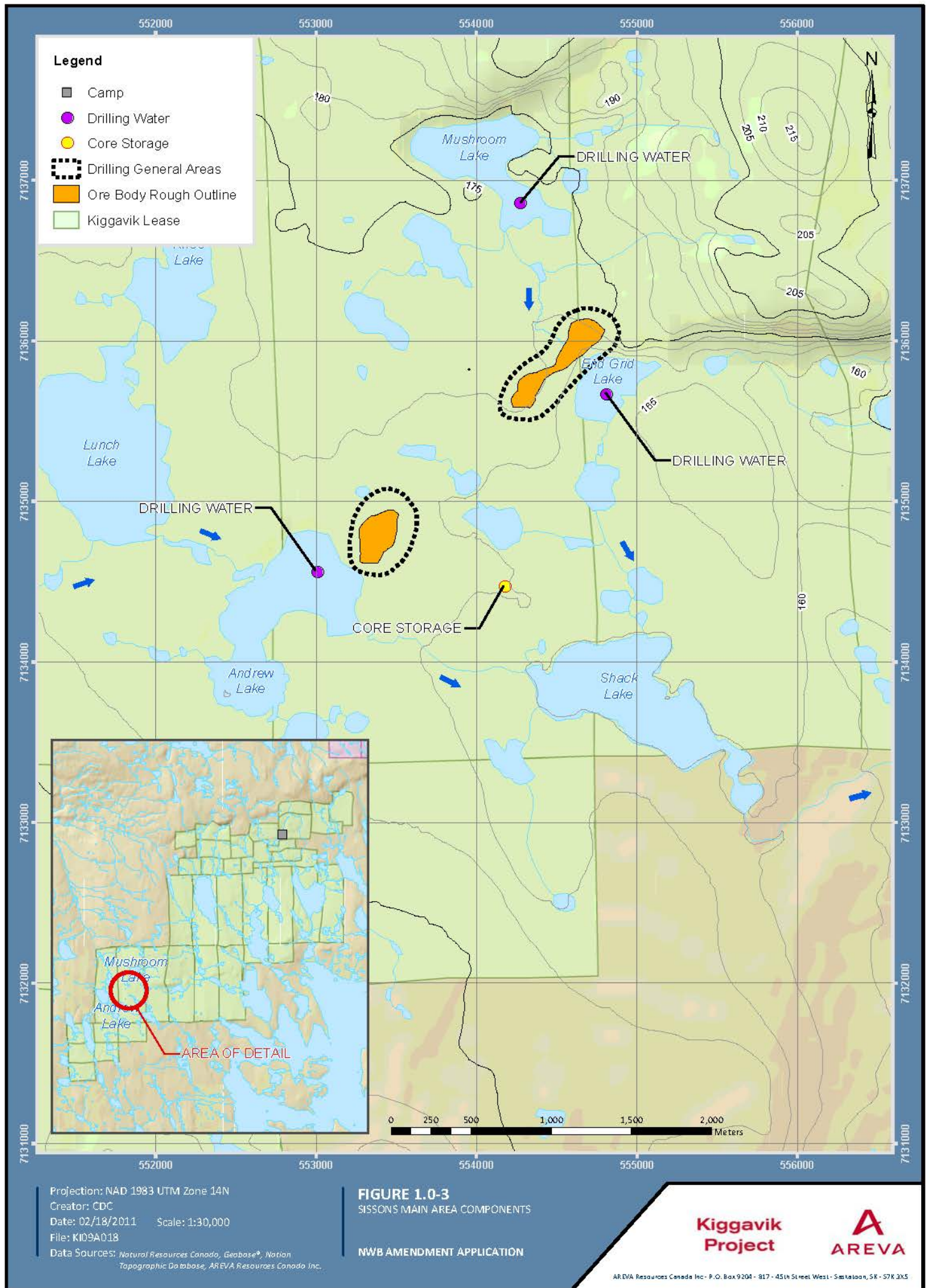
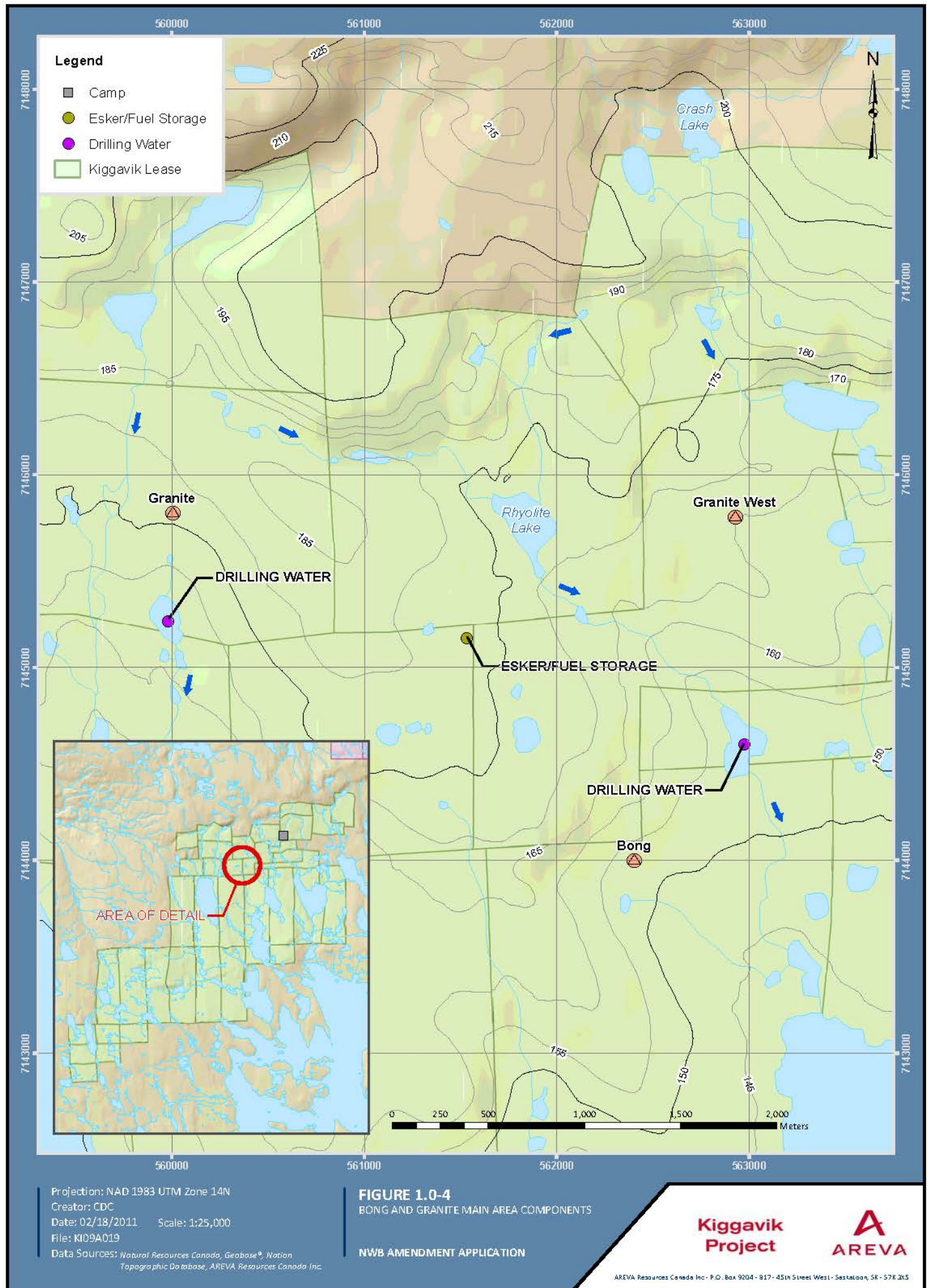


FIGURE 1.0-3
 SISSONS MAIN AREA COMPONENTS

NWB AMENDMENT APPLICATION

**Kiggavik
 Project**





**AREVA Resources Canada Inc.
Board of Directors
2011**

Name (Last name, First name)	Address (Street, City, Province, Country, Postal Code)	Position held as Officer (if any)
DE MONTESSUS, Sebastien	27 Avenue André Malraux 92300 Levallois Perret FRANCE	Chairman
CHABOT, Xavier	10 rue des Pavillons 92800 Puteaux FRANCE	
BELAND, Jean-François	925 Brock Road Pickering ON L1W 2X9 CANADA	
MARTIN, Vincent	817 45 th Street West Saskatoon SK S7K 3X5 CANADA	President & CEO
SCHERMAN, Gerald	523 Whitewood Crescent Saskatoon SK S7J 4L4 CANADA	Senior Vice President and Chief Financial Officer
VAN LAMBALGEN, Tammy	89 Harvard Crescent Saskatoon SK S7H 3R1 CANADA	Secretary
CORMAN, Jim	1013 McPherson Ave Saskatoon SK S7N 0Y4 CANADA	Vice President, Operations & Projects

Roger Alexander resigned November 16, 2010.

AREVA Resources Canada Inc.
List of Officers
2010

Current Officers

Name (Last name, First name)	Address (Street, City, Province, Country, Postal Code)	Position held as Officer (if any)
DE MONTESSUS, Sebastien	27 Avenue André Malraux 92300 Levallois Perret FRANCE	Chairman
MARTIN, Vincent	817 45 th Street West Saskatoon SK S7K 3X5	President & CEO
SCHERMAN, Gerald	523 Whitewood Crescent Saskatoon SK S7J 4L4	Sr. Vice President, CFO
VAN LAMBALGEN, Tammy	98 Harvard Crescent Saskatoon SK S7H 3R1	Secretary
HUFFMAN, Dale	817 45 th Street West Saskatoon SK S7K 3X5	Vice President, Science, Health, Environment and Quality
CORMAN, Jim	1013 McPherson Avenue Saskatoon SK S7N 0Y4	Vice President, Operations & Projects
WALLS, Bruce	347 Emerald Court Saskatoon SK S7J 4A5	Vice President, Human Resources and Industrial Relations
THOUMYRE, Olivier	AREVA Inc One Bethesda Center 4800 Hampden Lane Suite 1100 Bethesda MD 20814 USA	Treasurer
ROUX, Joseph	817 45 th Street West Saskatoon SK S7K 3X5	Vice President, Exploration
GLADUE, Richard	817 45 th Street West Saskatoon SK S7K 3X5	Vice President, Corporate Social Responsibility



Industry Canada

Industrie Canada

**Certificate
of Amendment**

**Canada Business
Corporations Act**

**Certificat
de modification**

**Loi canadienne sur
les sociétés par actions**

AREVA Resources Canada Inc.

333436-8

Name of corporation-Dénomination de la société

Corporation number-Numéro de la société

I hereby certify that the articles of the
above-named corporation were amended:

Je certifie que les statuts de la société
susmentionnée ont été modifiés:

- a) under section 13 of the *Canada Business Corporations Act* in accordance with the attached notice;
- b) under section 27 of the *Canada Business Corporations Act* as set out in the attached articles of amendment designating a series of shares;
- c) under section 179 of the *Canada Business Corporations Act* as set out in the attached articles of amendment;
- d) under section 191 of the *Canada Business Corporations Act* as set out in the attached articles of reorganization;

- ☐ a) en vertu de l'article 13 de la *Loi canadienne sur les sociétés par actions*, conformément à l'avis ci-joint;
- ☐ b) en vertu de l'article 27 de la *Loi canadienne sur les sociétés par actions*, tel qu'il est indiqué dans les clauses modificatrices ci-jointes désignant une série d'actions;
- ☒ c) en vertu de l'article 179 de la *Loi canadienne sur les sociétés par actions*, tel qu'il est indiqué dans les clauses modificatrices ci-jointes;
- ☐ d) en vertu de l'article 191 de la *Loi canadienne sur les sociétés par actions*, tel qu'il est indiqué dans les clauses de réorganisation ci-jointes;

Richard G. Shaw
Director - Directeur

May 30, 2006 / le 30 mai 2006

Date of Amendment - Date de modification



Nunavut Planning Commission
Keewatin Regional Land Use Plan
Conformity Determination
KIGGAVIK Project



Kiggavik Sissons Advanced Exploration Project
Mr. Barry McCallum
Manager Nunavut Affairs
AREVA Resources Canadian Inc. -
P.O. Box 9204
817 - 45th Street West
Saskatoon Saskatchewan S7K 3X5 Canada
Phone: (306) 343-4596
Fax: (306) 343-4640
Mobile: (306) 262-4636
E-mail: barry.mccallum@areva.ca
Camp & helicopter. Prospecting, geological mapping, geochemical and geological
surveys, airborne geophysics & diamond drilling. Environmental baseline work incl
surface hydrology, aquatic and terrestrial components.

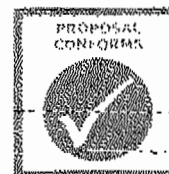
PROJECT CONFORMS TO ALL APPLICABLE TERMS OF THE ...
KEEWATIN REGIONAL LAND USE PLAN.

Please refer to the following eleven pages for details.

Signature of NPC Conformity Determination Officer

Dec. 15/06

Date

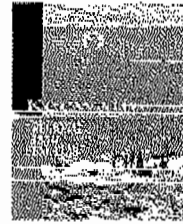


ES



Nunavut Planning Commission
Keewatin Regional Land Use Plan
Conformity Determination

KIGGAVIK Project



ARCHAEOLOGICAL SITES AND ARTIFACTS

*Tent ring. Land users must report the discovery of suspected archaeological sites to the Department of Culture, Language, Elders and Youth (Government of Nunavut).
Photo © Nunavut Planning Commission.*

Conformity Requirement 2.15.8 Artifacts must be left where they are found. All land users are responsible for reporting the location of, or any removal or disturbance of, artifacts to CLEY.

Conformity Requirement 4.3 The NPC and the CMC shall continue to hold a central registry of archaeological sites and continue to monitor land use activities to protect these sites. Information about the location and identity of archaeological sites in specific areas, and the measures necessary to protect them, shall be included in land use permits. Land users shall report the discovery of all suspected archaeological sites to CLEY.

DETERMINATION

The proponent will abide by conformity requirements 2.15.8 and 4.3 (conforms).



PS



Nunavut Planning Commission
Keewatin Regional Land Use Plan
Conformity Determination
KIGGAVIK Project



CARIBOU PROTECTION

*Caribou at a water crossing.
Land users shall follow the caribou protection measures.*

Conformity Requirement 2.6 Development activities shall be prohibited on all public lands and waters within all caribou calving areas during calving season and within caribou water crossings in the Keewatin, in accordance with the terms of DIAND caribou protection measures contained in Appendix H. Development activities shall be prohibited on IOL within all caribou calving areas during calving season and within caribou water crossings in the Keewatin, in accordance with the KIA caribou protection measures (an example of which is contained in Appendix H.) These measures shall be enforced throughout the region by DIAND, KIA and DSD, to the full extent of their respective jurisdictions.

Conformity Requirement 2.15.7 During the caribou calving, post-calving and migrating seasons, land use activities should be restricted to avoid disturbing caribou, in general, and activities will be governed more specifically by caribou protection measures such as those contained in Appendix H.

DETERMINATION

The proponent will abide by the Caribou Protection Measures (conferred).

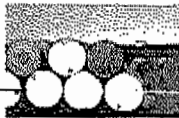


RS



Nunavut Planning Commission
Keewatin Regional Land Use Plan
Conformity Determination

KIGGAVIK Project



CLEANUP AND POLLUTION

*Fuel drums on the land. Project proponents must undertake to remove old fuel drums.
Photo by Luke Sulak*

Conformity Requirement 2.8

- b) Community residents in particular, and all land users in general, shall be actively involved in planning and conducting cleanup operations, whenever possible and practicable.
- c) Refuse, such as fuel drums and scrap metal, shall be recycled where possible.
- d) Sites containing toxic materials shall be given priority for cleanup, and the location of these sites shall be widely publicized to warn residents.
- e) Sites within or near caribou calving grounds, near water and near communities shall also be given priority for cleanup.

Conformity Requirement 2.9 New occurrences of pollution, garbage and contamination caused by anyone shall be prevented. Land users shall ensure that all drums are safely recovered.

Conformity Requirement 2.10 The principle of "the polluter pays" shall apply to a strategy for cleaning up the environment. Where it is possible to identify the person, company or agency responsible for creating an abandoned or inactive waste site, they shall be made responsible for the cleanup and restoration of the site.

Conformity Requirement 2.15.1 The landscape of each camp and other land use sites will be restored to its original condition to the greatest degree possible. When possible and feasible, old sites will be restored to the natural state. (Code of Good Conduct - Appendix G)

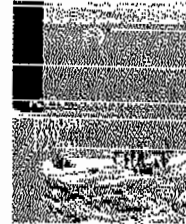
DETERMINATION

The proponent will abide by all conformity requirements (conforms).





Nunavut Planning Commission
Keewatin Regional Land Use Plan
Conformity Determination
KIGGAVIK Project



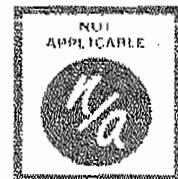
HYDROCARBON EXPLORATION

*Hydrocarbon exploration validity vs. cost.
Hydrocarbon exploration is restricted around Southampton and Coats Islands.
Graphic © PetroConsult Pty Ltd. ent. ring.*

Conformity Requirement 3.8 Hydrocarbon exploration shall continue to be restricted in the area encompassing southern Southampton Island and Coats Island, as at present.

DETERMINATION

The project proposal is not for hydrocarbon exploration in the area encompassing southern Southampton Island and Coats Island (Conformity Requirement 3.8 is not applicable).





Nunavut Planning Commission
Keewatin Regional Land Use Plan
Conformity Determination
KIGGAVIK Project



HYDROELECTRIC DEVELOPMENT

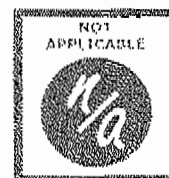
Hydro project in Québec.
Hydro projects in a number of provinces, as well as Nunavut, can have a cumulative effect on James Bay, Hudson Bay and Hudson Strait.

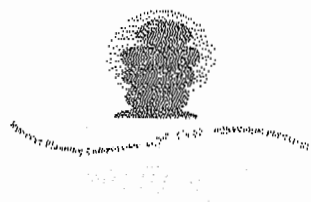
Photo by Michele Ernsting, Radio Netherlands.

Conformity Requirement **Conformity Requirement 2.13** The possible cumulative impacts of additional hydroelectric power development in Manitoba, Ontario and Quebec on the ecosystem of Hudson Bay, James Bay and Hudson Strait must be examined before more hydroelectric development proceeds.

DETERMINATION

The project proposal is not for hydroelectric development (conformity requirement 2.13 is not applicable).





Nunavut Planning Commission
Keewatin Regional Land Use Plan
Conformity Determination
KIGGAVIK Project



LOCAL PURCHASE OF SUPPLIES AND SERVICES

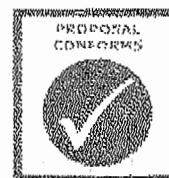
*Taxi at the West Meladine exploration camp.
Land users shall follow the practice of local purchase of supplies and services.*

Photo © WMC Limited.

Conformity Requirement 2.15.5 Whenever practicable, and consistent with sound procurement management, land users will follow the practice of local purchase of supplies and services. (Code of Good Conduct, Appendix G.)

DETERMINATION

The proponent will abide by conformity requirement 2.15.5 (conforms).





Nunavut Planning Commission
Keewatin Regional Land Use Plan
Conformity Determination
KIGGAVIK Project



LOW-LEVEL FLIGHTS

Beaver floatplane arriving at a camp.
Pilots shall avoid disturbance to people and wildlife wherever possible.
Photo © Luke Coady.

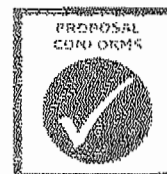
Conformity Requirement 2.15.3 Generally, low-level flights by aircraft at less than 300 metres should not occur where they will disturb wildlife or people. If such flights are necessary, they should only take place after consultation with the appropriate communities. All land users are responsible for reporting to the land managers any illegal or questionable low-level flight.

Conformity Requirement 5.4 Low level flights shall not take place unless absolutely necessary. Should they be necessary, pilots shall avoid disturbance to people and wildlife wherever possible.

DETERMINATION

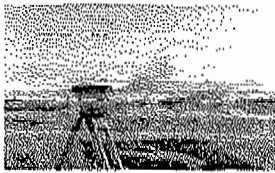
The project proposal does involve absolutely necessary low level flights, the proponent has or will consult with the communities, and pilots will avoid disturbance to wildlife and people (conforms).

Comment:
Reasonable comments on the necessity of low-level flight





Nunavut Planning Commission
Keewatin Regional Land Use Plan
Conformity Determination
KIGGAVIK Project



MINE CLOSURE AND RESTORATION

Blasting at a northern mine site.
The Keewatin Regional Land Use Plan requires restoration plans
for all proposed mining developments in the Region.

Photo © Nunavut Planning Commission.

Conformity Requirement 3.4 All proposals for mining developments shall include adequate plans for mine closure and restoration of the site.

DETERMINATION

The project proposal is not for mining development (conformity requirement 3.4 is not applicable).





Nunavut Planning Commission
 Keewatin Regional Land Use Plan
 Conformity Determination
 KIGGAVIK Project



ACADEMIC AND / OR SCIENTIFIC RESEARCH

*Successfully collaring a caribou.
 Local services and employment shall, whenever possible, be
 incorporated in scientific research programs in the Keewatin*

Photo © Robert Mulders

Conformity Requirement 6.2 Local and traditional knowledge shall be sought and, when available and relevant, shall be integrated with the scientific knowledge.

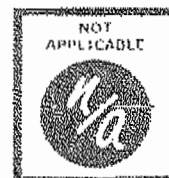
Conformity Requirement 6.3 Research programs conducted in the Keewatin shall, where possible, rely on local services and local employment.

Conformity Requirement 6.4 All scientific researchers shall communicate with the communities in clear, non-technical language in Inuktitut and English. Scientific researchers shall communicate the results of their research to the communities.

Conformity Requirement 6.5 Academic and scientific researchers shall make all reasonable efforts to consult the NRI concerning research topics or fields that would be of benefit and interest to local residents.

DETERMINATION

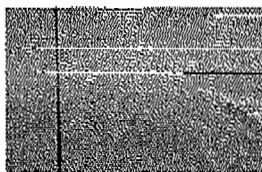
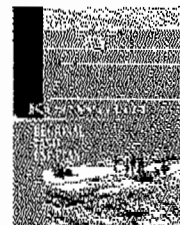
The project proposal does not involve academic and/or scientific research (conformity requirements are not applicable).





Nunavut Planning Commission
Keewatin Regional Land Use Plan
Conformity Determination

KIGGAVIK Project



TRANSPORTATION AND/OR COMMUNICATIONS CORRIDORS :

Proposals for transportation corridors shall be publicly reviewed, and may lead to amendment of the Plan.

Photo © Nunavut Planning Commission.

Conformity Requirement 5.6 All parties wishing to develop a transportation and/or communications corridor shall submit to the NPC a detailed application for an amendment. This application must include an assessment of alternative routes, plus the cumulative effects of the preferred route. It shall provide reasonable options for other identifiable transportation and utility facilities. In particular, this application must meet the information requirements set out in Appendix J.

Conformity Requirement 5.7 The NPC and either NRR or a panel acting under s. 12.4.7 of the NLCA shall publicly review the proposed corridor to determine whether the proposal adequately meets the requirements of Appendix J and the guidelines of Appendix J. Once it is determined that a proposal meets the guidelines, the NPC may request the Minister of DIAND to amend the plan to include the new transportation corridor.

DETERMINATION

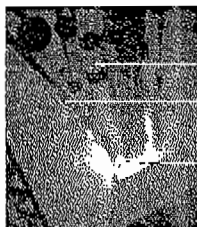
The project proposal is not for the development of a transportation and/or communications corridor (conformity requirements 5.6 and 5.7 are not applicable).





Nunavut Planning Commission
Keewatin Regional Land Use Plan
Conformity Determination

KIGGAVIK Project



URANIUM DEVELOPMENT

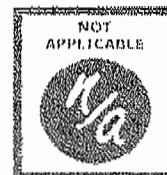
Uranium development is currently not permitted in the Keewatin Planning Region.

Conformity Requirement 3.5 Uranium development shall not take place until the NPC, NTRB, the NWB and the NWMB have reviewed all of the issues relevant to uranium exploration and mining. Any review of uranium exploration and mining shall pay particular attention to questions concerning health and environmental protection.

Conformity Requirement 3.6 Any future proposal to mine uranium must be approved by the people of the region.

DETERMINATION

The project proposal is not for uranium development (conformity requirements 3.5 and 3.6 are not applicable).



- c) the proposal is insufficiently developed to permit proper screening, and should be returned to the proponent for clarification; or
- d) the potential adverse impacts of the proposal are so unacceptable that it should be modified or abandoned.

NIRB Assessment and Decision

After a thorough assessment of all material provided to the Nunavut Impact Review Board (NIRB or Board) (see Appendix D), 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.

NIRB Recommendations and Recommended Conditions

Although this project proposal is not located within known calving grounds for the Beverly caribou herds, the Board recognizes that the project area may be used for spring-migration, post-calving, and late summer activities for the Beverly caribou herd. In addition, the Board also recognizes that the Thelon Heritage River is considered to be part of Canada's Heritage River System, and understands that some of the project activities, such as geophysical survey flying, will be taking place approximately 10km from the river. Therefore, the Board is recommending broader terms and conditions because of the sensitivities of the Beverly caribou herd and the importance of the Thelon Heritage River. They are the following:

1. As an overriding consideration, Indian and Northern Affairs Canada (INAC) impose strict mitigation measures, conditions and monitoring requirements pursuant to the Federal Land Use Permit, which require AREVA (the Proponent) to respect the sensitivities and importance of the area. These mitigation measures, conditions and monitoring requirements should be in regard to:
 - a. Location and Area
 - b. Time
 - c. Equipment
 - d. Methods and Techniques
 - e. Control or Prevention of Flooding, Erosion and Subsidence of Land
 - f. Use, Storage, Handling and Disposal of Chemical or Toxic Material
 - g. Wildlife and Fisheries Habitat
 - h. Objects and Places of Recreational, Scenic and Ecological Value
 - i. Petroleum Fuel Storage
 - j. Matters Not Consistent with the Regulations
2. INAC must 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 DIAND Caribou Protection Measures.
3. INAC recognize that any activity related to this application (INAC Land Use Permit application N2006C0037) outside the original scope of the project proposal **will** be considered a new project and must be submitted to NIRB for screening. In addition, NIRB recommends that any renewal requests for the project proposal should be forwarded to NIRB for re-screening.

4. The Kivalliq Inuit Association (KIA) impose strict mitigation measures and/or Environment Terms and Conditions pursuant to the Inuit Owned Lands License (KVK306C02) in regard to:
 - a. General Standards
 - b. Fuel and Chemical Storage
 - c. Campsites
 - d. Fisheries
 - e. Ground Disturbance
 - f. Wildlife
 - g. Any other conditions recommended by the appropriate Community Lands and Resource Committee (CLARC)
5. KIA recognize that any activity related to this application (KIA Inuit Owned Lands License KVL306C02) outside the original scope of the project proposal **will** be considered a new project and must be submitted to NIRB for screening. In addition, NIRB recommends that any renewal requests for the project proposal should be forwarded to NIRB for re-screening.
6. The Government of Nunavut – Department of Environment (GN-DOE) Conservation Officers should conduct random inspections of the project location during the months of May, June, July and August to ensure the Proponent is in compliance with the DIAND Caribou Protection Measures.
7. The GN-DOE should conduct on-going review of wildlife monitoring results submitted from the Proponent as required by the Wildlife Mitigation and Monitoring Plan. Following submission of the required annual report by January 31, 2008 to NIRB, INAC, the KIA and the GN-DOE, the GN-DOE should report to NIRB and INAC its findings regarding the possible impact of the project on the Beverly and Ahiak caribou herds. As noted in correspondence provided to NIRB, the GN recommended a one-year Land Use Approval to be issued, subject to the findings of the 2007 GN/GNWT Population Surveys of the Beverly and Ahiak Caribou Herds.

In addition, the Board is recommending the following or similar project-specific terms and conditions be imposed upon the Proponent through all relevant legislation pursuant to 12.4.4(a) of the NLCA:

1. The term of the permitted activities associated with Land Use Permit N2006C0037 and Inuit Owned Lands License KVL306C02 is subject to any findings, direction or advice received by INAC and the KIA from the GN-DOE as a result of the 2007 GN/GNWT Population Surveys of the Beverly and Ahiak Caribou Herds.
2. AREVA (the Proponent) shall maintain a copy of this Screening Decision at the site of operation at all times.
3. The Proponent shall forward copies to NIRB of all permits obtained and required for this project prior to the commencement of the project.
4. The Proponent shall operate in accordance with commitments stated in Appendix A and all Operation Plans provided to NIRB, namely:
 - a. Spill Contingency Plan
 - b. Abandonment and Restoration Plan
 - c. Noise Abatement Plan
 - d. Waste Management Plan

- e. Wildlife Mitigation and Monitoring Plan
 - f. Radiation Safety Plan
 - g. Environmental Code of Practice
5. The Proponent shall submit an annual report with copies provided to the NIRB, INAC, the KIA, and GN-DOE by January 31 each year that the project is in operation commencing January 31, 2008. The report must contain, but not be limited to, the following information:
 - a. A summary of activities undertaken for the year and a work plan for the following year;
 - b. The results of environmental studies undertaken and plans for future studies;
 - c. A discussion of the implementation of the Operational Plans, and analysis regarding the effectiveness of the Operational Plans to mitigate adverse environmental impacts;
 - d. Specific to the Wildlife Mitigation and Monitoring Plan: the results from the Caribou Monitoring Program, wildlife encounters and actions/mitigation taken, an analysis of the effectiveness of mitigation measures for wildlife and any anticipated follow-up monitoring program(s);
 - e. A discussion regarding the effects to human health from uranium exploration activities;
 - f. A summary of local hires and initiatives;
 - g. A summary of community consultations
 - h. A summary of site-visits by Land Use Inspectors with results and follow-up actions, including those approvals given by Land Use Inspectors regarding Caribou Protection Measures;
 - i. Site photos;
 - j. Progressive reclamation work undertaken;
 - k. Efforts made to achieve compliance with the *Canadian Wide Standards for Dioxins and Furans*, and the *Canadian Wide Standards for Mercury*; and
 - l. A summary of how the Proponent has complied with NIRB conditions contained within this Screening Decision, and the conditions associated with all authorizations for the project proposal.
 6. The Proponent shall abide by all DIAND Caribou Protection Measures and those mitigation measures outlined in the Wildlife Mitigation and Monitoring Plan.
 7. The Proponent shall be prohibited to allow aircraft take-offs and landings when groups of caribou are within 1km of the airstrip or helipad.
 8. The Proponent must immediately update its Wildlife Mitigation and Monitoring Plan to include the following requirement:
 - a. Section 2.1 *During June and July* – To avoid injuries to caribou and humans, if one or more caribou approach within **1km** of drilling operations, then activities will be suspended until caribou leave the area.

Any subsequent direction provided by the Government of Nunavut Department of Environment and/or the Kivalliq Inuit Association regarding the Caribou Monitoring Plan must be forwarded to NIRB.
 9. The Proponent shall ensure that there is no hunting or fishing by employees of the company or any contractors hired unless proper Nunavut authorizations have been obtained.
 10. The Proponent shall ensure that the disposal of combustible camp wastes comply with the *Canadian Wide Standards for Dioxins and Furans*, and the *Canadian Wide Standards for*

Mercury. Efforts made to achieve compliance shall be reported to the NIRB as part of the annual report.

11. The Proponent shall adhere to conditions stated in attached Appendix B *Archaeological and Palaeontological Resources – Terms and Conditions for Land Use Permit Holders*

12. The Proponent shall avoid the known archaeological and/or palaeontological sites listed in Appendix C.

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 ____April 3, 2007____ at Sanikiluaq, NU.



Lucassie Arragutainaq, A/Chairperson

Appendix A

Summary of Proponent Commitments

1. The disturbances to permafrost will be mitigated by insulating the floors of buildings, and keeping the sump area and incinerator area small, raising the incinerator above the ground.
2. Disturbance to soil and vegetation will be minimized by using walkways. After more than 20 years of camp operation at the site, there is very little sign of disturbance.
3. The impact of helicopter and airplane noise and presence on wildlife and people will be mitigated by avoiding wildlife during flights and avoiding low flying. This will require ongoing communication and diligence.
4. The presence of wildlife will be carefully monitored to ensure minimal disturbance. Daily wildlife sitting records will be maintained and these will be used to plan work so that wildlife disturbance will be minimized. The information will also be provided to management boards and regulatory authorities.
5. Water quality will be protected from spills and drilling by use of protective procedures and containments.
6. Greywater will be treated through sumps and carefully monitored to ensure containment. No garbage will remain onsite.
7. The camp will be decommissioned when no longer used.
8. No fuel, drill cuttings, chemicals, wastes or sediment will be deposited into any water body as per the *Fisheries Act*, Section 36(3).
9. Sumps, including those created for the disposal of drill cuttings will be located above the high water mark of any water body in such a manner as to prevent the contents from entering any water body frequented by fish.
10. Drilling additives or mud will not be used in connection with holes drilled through lake ice unless they are re-circulated or contained such that they do not enter the water or demonstrated to be non-toxic.
11. Land based drilling will not occur within 30 m of the high water mark of any water body.
12. Materials will not be stored on the surface ice of lakes or streams. Materials on the ice surface must be for immediate use.
13. If an artesian flow is encountered, the drill hole will be immediately plugged and permanently sealed.
14. In terms of the winter road:
 - a. Travel will not begin until the ground is sufficiently frozen to provide support and to avoid surface damage and rutting.
 - b. Stream crossings shall be located to minimize approach grades. Bank disturbance will be avoided and mechanized clearing will not be done immediately adjacent to any watercourse
 - c. Winter lake/stream crossings will be constructed entirely of ice and snow materials; stream crossings will be removed or notched prior to spring break-up

Appendix B



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]

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

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.

¹ s. 51(1)

² P.C. 2001-1111 14 June, 2001

“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.

Appendix C
Confidential Archaeological Sites

Appendix D File History

On November 29, 2006, the Nunavut Impact Review Board (NIRB) received a project proposal from AREVA for the Kiggavik-Sissons project proposal from the Kivalliq Inuit Association. On November 30, 2006 NIRB notified AREVA that an NPC conformity determination would be required for the project proposal, and also requested additional information from the Proponent. A positive conformity determination was received on December 15, 2006.

On February 1, 2007 NIRB received the requested information from the Proponent, and on February 5, 2007 commenced the Part 4 Screening. NIRB requested interested Parties provide comments to NIRB by February 26, 2007.

The project is located approximately 80km west of Baker Lake.

The project activities include:

- Satellite remote sensing
- Aircraft remote sensing to collect airborne geophysics data
- Soil sampling supported by helicopter
- Sediment sampling
- On-land drilling supported by helicopter
- Winter overland transportation of goods
- Construction of temporary wooden camp, and expansion of existing structures
- Fuel transportation and storage
- Chemical transportation and storage
- Core storage
- Environmental baseline work consisting of field surveys conducted on foot and supported by helicopter
- Ground geophysical surveys conducted on foot and supported by helicopter
- Geological mapping and prospecting conducted on foot and supported by helicopter
- Possible landing of aircraft with tundra tires on eskers
- Consumption of water and generation of waste

This application was distributed to Baker Lake and to interested Federal and Territorial Agencies.

On February 19, 2007 the Government of Nunavut – Department of Environment requested additional time to review the project information. Subsequently, NIRB granted all Parties until March 12, 2007 to provide comments to NIRB.

By March 12, 2007 NIRB received comments from the following interested Parties:

- Mr. Orin Durey of Baker Lake
- The Government of Nunavut Department of Environment
- The Government of Nunavut Department of Culture, Language, Elders and Youth
- The Beverly and Qamanirjuaq Caribou Management Board
- Environment Canada

Concerns regarding the project proposal were expressed by all interested Parties except for the Department of Culture, Language, Elders and Youth.

The main concerns related to:

- Project activities occurring in lands used by Beverly and Ahiak caribou herds for calving and post-calving
- Potential impacts to caribou from drilling, geophysical surveys, unavoidable low-level flights, and aircraft activity in general
- The necessity of a rigorous wildlife monitoring with particular emphasis on caribou
- Potential impacts to humans and wildlife, including grizzly bears, wolverines, wolves foxes, and raptor nesting areas from noise, human-carnivore interactions and general disruption
- Omissions regarding details about the winter road, including concerns related to use of winter trail prior to completion of the NIRB Part 4 Screening process
- Omissions in the Spill Contingency Plan
- Insufficient information contained within the Abandonment and Restoration Plan, such as details pertaining to the disposal of radioactive sediment, reclamation of the helicopter landing pad, testing for contaminated soils
- Potential for cumulative effects with other projects in the area
- Potential for impacts to air quality related to incineration of wastes
- Proximity of the project proposal to the Thelon Canadian Heritage River, and recognition of the Thelon Game Sanctuary Management Plan, the Thelon Wildlife Sanctuary, and the associated Special Management Areas
- Clarification regarding use of eskers to access project locations

One of the specific comments provided by GN-DOE was to limit the time period of the permit to one-year only (2007). This is to allow for additional review in the following year (2008) after completion of the 2007 GN/GNWT Population Surveys of the Beverly and Ahiak Caribou Herds related to herd population trends and the potential impact of exploration activities.

NIRB provided AREVA with the opportunity to respond to all the comments and concerns by March 20, 2007.

On March 20, 2007 NIRB received AREVA's response to Parties' comments, which included the following:

1. Revised NIRB Part 1 Screening Form in English and Inuktitut
2. Revised NIRB Part 2 Screening Form
3. Revised Spill Contingency Plan
4. Revised Abandonment and Restoration Plan
5. Noise Abatement Plan (new)
6. Waste Management Plan (new)
7. Wildlife Mitigation and Monitoring Plan (new)
8. Radiation Protection Plan (new)
9. Revised Figure 2: Project Location
10. Figure 11: Proposed Aerial Survey Blocks for Caribou Monitoring (new)
11. Figure 12: Winter Road Options for 2007 Exploration Program (new)

TECHNICAL SUPPORT

1 DRILLING IN LOW FLOW ARTESIAN CONDITIONS

1.1 Scope of Work

Planned drilling activities for the Kiggavik Project's 2012 field season includes exploration drilling in and around the End Grid, Bong Grid, Granite Grid, Sleet Lake and Andrew Lake areas. Artesian flows have been encountered in the End Grid, Bong Grid, and Main Zone (Kiggavik) areas during past field seasons. As uranium mineralization has been found at Bong Grid in past drilling programs, further drilling is required to gain knowledge of the extent of this deposit.

1.2 Overview of Artesian Flow Conditions

AREVA encountered one flowing artesian during the Kiggavik Project's 2011 field season at BONG052 on July 21 at a depth of 390 m. A water sample was collected immediately (see appendix I for results) and the hole was permanently capped and sealed. The target depth for this hole was ~500 m. As well, a packer test conducted on GW-11-02 identified ideal artesian conditions although there was no flowing water. This drill hole was drilled June 18 to 21 to a depth of 252 m. All holes were permanently capped and sealed.

Two flowing artesians were encountered during the 2010 field program: The first artesian flow was encountered on Friday June 18 at BONG045 at a depth of 320 m. A water sample was taken immediately (see appendix I for results) and the flow rate was estimated to be 12 L/min. The target depth for this hole was ~500 m. The second artesian was encountered on June 27^t at BONG047 at a depth of 282 m. An estimate of the water flow was not conducted; however upon visual inspection the drillers and project geologist on site noted that the flow was less than BONG045. No water sample was taken at BONG047 and the hole was immediately sealed and permanently capped. Additionally, one non-flowing artesian was noted while conducting a packer test on MZ-10-01 where the pressure response of the hydrogeological test interval (222.1 to 247.9 mbgs) was interpreted as artesian conditions. Although the static hydraulic head was estimated at 17.6 m above the borehole collar there was no water flowing from the hole. Packer testing takes approximately 2 to 4 hrs to complete and is conducted once drilling is completed on that hole. MZ-10-01 was permanently capped and sealed upon completion of the packer test.

In 2009, artesian flow conditions were experienced in the End Grid, Andrew Lake and Main Zone (Kiggavik) areas. The hydraulic head measured in drill holes END-09-01 in the End Grid area, AND-09-03 in the Andrew Lake area and MZ-09-04 in the Kiggavik Main Zone area were 175.5 masl (9.3 mags), 169.7 masl (3.5 mags) and 215.5 masl (25.2 mags), respectively. The artesian flow at Main Zone site was encountered at a

depth of 270 m with a flow rate of about 28L/min. Two water samples were collected at MZ-09-04 and the results of the laboratory analysis is included in Appendix I.

In 2008, artesian flow conditions were observed in the Bong and Kiggavik Main Zone areas. The first artesian flow was observed in drill hole BONG-041 at a depth of approximately 300 m with a flow rate of approximately 2.5 L/s (150L/min). The hydraulic head measured at BONG-041 was >1 mags. The second artesian flow was encountered in drill hole MZ-08-04 with a flow rate of 4.5 L/min. The hydraulic head measured at MZ-08-04 was the same as in the Bong area.

In 2007, the observation from pressure transducer at the bottom of the drill hole (near bottom of permafrost) was interpreted as artesian flow conditions in drill hole MZ-07-03 at the Kiggavik Main Zone site. Hydraulic head was estimated as 66 m above ground surface likely caused due to volume expansion in the drill hole cavity due to ice pressure in the deep permafrost zone.

1.3 Hydraulic Conductivity of Rock Formations

Some lakes in the vicinity of the Kiggavik Project area have melt zones (generally known as “Taliks”) below them and are believed to be hydraulically connected and they penetrate through the deep groundwater flow system. During the 2008 to 2011 field campaign, hydrogeological tests were conducted in the Kiggavik Main Zone area to obtain information to assess the deep groundwater flow regime beneath the continuous permafrost. Measured hydraulic conductivity values ranged from 1E-7 to 4E-8 m/s, which indicated the low permeability of granitic rock formations within the deep aquifer system in the area.

AREVA, with the help of the drilling contractor, has defined a low flow artesian as an artesian with a flow rate equal to or less than 95 L/min. At this flow rate water and cuttings management can be carried out in the same manner as all other drill holes. Water and cuttings management methods are described below. Due to the deep continuous permafrost condition and generally low permeability of the deeper rock formations, the only significant source of artesian flow conditions are likely to be geological structures hydraulically connected to taliks beneath nearby lakes. With the nearest major lakes (those supporting taliks) being approximately 2 km and more from the proposed drilling areas, it would be unlikely to find such highly permeable structural features (faults) so well hydraulically connected over the distance at a sub-permafrost depth of 200 m and deeper. Additionally, hydrogeological testing across several faults in the Kiggavik Project area has not indicated an increased permeability compared to the competent rock formations due to mineralization and gouge in the structures. Hence, the artesian flow rate is expected to be less than the defined low flow artesian criteria.

1.4 Environmental Protection Measures

Following is an explanation of the steps that will be taken; in addition to Kiggavik's pre-existing management plans in order to minimize any erosion, surface water contamination or salinization. Along with these measures AREVA will continue to communicate any artesian flow occurrences with the NWB and AANDC.

Drill Water and Cuttings Management:

Water and cuttings management when a low flow artesian is encountered will be carried out in such a way as to minimize erosion and surface water contamination. Two methods of drill water and cuttings management can be carried out depending on whether or not uranium mineralization is present.

When drilling through non-mineralized rock, drill water is collected at the base of the drill and pumped to a natural low lying depression located a minimum of 30 m away from the ordinary high water mark of any water body and where direct flow into a water body is not possible. Small trenches are also created near the edge of the drill in order to catch any excess water that may not have been collected at the base of the drill. An additional pump is placed in the trench and the water is pumped to the same natural low lying depression. Radiation measurements are taken at the natural low lying depression on a regular basis by AREVA personnel to ensure radiation levels are below 1 μSv at a distance of 1m from the ground. The frequency of the measurements will be determined by the presence of mineralization. This ensures that water from the artesian is managed in such a way as to prevent surface water contamination and minimize erosion.

When uranium mineralization (0.05% U) is present the drill water and cuttings are collected from both below the drill and from the trench in the same manner as above but are pumped to tubs where the water and cuttings are separated from each other. The water is then pumped to the natural low lying depression and the cuttings are bagged. The bagged cuttings are then placed in the radioactive storage compound.

All artesian conditions encountered which have flow rates greater than 95 L/min will be immediately capped and permanently sealed.

Water Analysis:

When an artesian flow is encountered a sample of the water will be collected and sent to the Saskatchewan Research Council (SRC) for analysis. The analysis results will be forwarded to the NWB as they are received.

Drill Hole Abandonment and Restoration:

Abandonment and restoration measures are conducted on all drill holes. All drill holes, independent of packer test results or whether or not they demonstrate artesian conditions, are permanently capped and sealed. This is done either by cementing the entire hole when mineralization is present or, when mineralization is not present in the drill hole, by putting a plug 20 m below the overburden and cementing above that.

Abandonment and restoration measures also includes conducting a gamma survey prior to and upon completion of drilling at each drill hole. The pre and post gamma surveys for each drill hole are then compared to one another. If any area is 1 μ Sv or more above background, material is collected until radiation levels are again below 1 μ Sv above background. Any material collected in this cleanup will be brought to the radioactive storage compound.

Appendix I – Water Sample Results

Sample Sample Collection Date Sample description	Parameter/ Units	Method Detection Limit	MZ09-04A	MZ09-04A Precision (+/-)	MZ09-04B	MZ09-04B Precision (+/-)
			08/12/2009		08/12/2009	
			Original		Duplicate	

Field pH	-	-	7.77	-	7.77	-
Field Temperature	oC	-	2.4	-	2.4	-
Field Total Dissolved Solids	mS	-	2	-	2	-
Field Conductivity	ppm	-	4.07	-	4.07	-

Inorganic Chemistry

Bicarbonate	mg/L	1	144	10	144	10
Calcium	mg/L	0.1	370	20	367	20
Carbonate	mg/L	1	<1	-	<1	-
Chloride	mg/L	5	1280	5	1280	5
Hydroxide	mg/L	1	<1	-	<1	-
Magnesium	mg/L	0.1	126	3	128	3
pH	pH units	0.07	7.63	0.1	7.66	0.1
Potassium	mg/L	0.1	7.3	1	7.3	1
Sodium	mg/L	0.1	129	4	128	4
Specific conductivity	uS/cm	1	3710	60	3720	60
Sulfate	mg/L	0.2	<0.2	-	<0.2	-
Sum of ions	mg/L	1	2060	40	2050	40
Total alkalinity	mg/L	1	118	4	118	4
Total hardness	mg/L	1	1440	30	1440	30
Nitrate	mg/L	0.04	0.13	0.07	0.13	0.07
Aluminum	mg/L	0.0005	0.0012	0.0008	0.0009	0.0007
Aluminum, dissolved	mg/L	0.0005	0.0008	0.0006	0.0018	0.0009
Antimony	mg/L	0.0002	<0.0002	-	<0.0002	-
Antimony, dissolved	mg/L	0.0002	<0.0002	-	<0.0002	-
Arsenic	ug/L	0.1	0.3	0.1	0.3	0.1
Arsenic, dissolved	ug/L	0.1	0.3	0.2	0.3	0.2
Barium	mg/L	0.0005	1.90	0.02	1.90	0.02
Barium, dissolved	mg/L	0.0005	1.88	0.02	1.92	0.02
Beryllium	mg/L	0.0001	0.0001	0.0001	0.0001	0.0001
Beryllium, dissolved	mg/L	0.0001	0.0001	0.0001	0.0001	0.0001
Boron	mg/L	0.01	0.17	0.04	0.17	0.04
Boron, dissolved	mg/L	0.01	0.17	0.04	0.17	0.04
Cadmium	mg/L	0.0001	<0.0001	-	<0.0001	-
Cadmium, dissolved	mg/L	0.0001	<0.0001	-	<0.0001	-
Chromium	mg/L	0.0005	<0.0005	-	<0.0005	-
Chromium, dissolved	mg/L	0.0005	<0.0005	-	<0.0005	-
Cobalt	mg/L	0.0001	0.0001	0.0001	0.0001	0.0001
Cobalt, dissolved	mg/L	0.0001	0.0001	0.0001	0.0001	0.0001
Copper	mg/L	0.0002	0.0004	0.0003	0.0004	0.0003
Copper, dissolved	mg/L	0.0002	0.0004	0.0003	0.0005	0.0003
Iron	mg/L	0.0005	0.52	0.01	0.52	0.01
Iron, dissolved	mg/L	0.0005	0.52	0.01	0.52	0.01
Lead	mg/L	0.0001	0.0001	0.0001	0.0001	0.0001
Lead, dissolved	mg/L	0.0001	0.0002	0.0001	0.0001	0.0001
Manganese	mg/L	0.0005	1.56	0.002	1.56	0.002
Manganese, dissolved	mg/L	0.0005	1.55	0.02	1.57	0.02
Molybdenum	mg/L	0.0001	0.0094	0.001	0.0094	0.001
Molybdenum, dissolved	mg/L	0.0001	0.0089	0.0008	0.0090	0.0008
Nickel	mg/L	0.0001	0.0005	0.0003	0.0005	0.0003
Nickel, dissolved	mg/L	0.0001	0.0006	0.0002	0.0006	0.0002
Selenium	mg/L	0.0001	<0.0001	-	<0.0001	-
Selenium, dissolved	mg/L	0.0001	<0.0001	-	<0.0001	-
Silver	mg/L	0.0001	<0.0001	-	<0.0001	-
Silver, dissolved	mg/L	0.0001	<0.0001	-	<0.0001	-

Strontium	mg/L	0.005	9.5	0.2	9.5	0.2
Strontium, dissolved	mg/L	0.005	9.5	0.2	9.6	0.2
Thallium	mg/L	0.0002	<0.0002	-	<0.0002	-
Thallium, dissolved	mg/L	0.0002	<0.0002	-	<0.0002	-
Tin	mg/L	0.0001	<0.0001	-	<0.0001	-
Tin, dissolved	mg/L	0.0001	<0.0001	-	<0.0001	-
Titanium	mg/L	0.0002	<0.0002	-	<0.0002	-
Titanium, dissolved	mg/L	0.0002	<0.0002	-	0.0002	0.0002
Uranium	ug/L	0.1	3.4	0.4	3.3	0.4
Uranium, dissolved	ug/L	0.1	3.2	0.2	3.3	0.2
Vanadium	mg/L	0.0001	0.0002	0.0001	0.0002	0.0001
Vanadium, dissolved	mg/L	0.0001	0.0002	0.0001	0.0002	0.0001
Zinc	mg/L	0.0005	0.018	0.005	0.016	0.004
Zinc, dissolved	mg/L	0.0005	0.018	0.003	0.029	0.003
Fluoride	mg/L	0.01	1.15	0.1	1.16	0.1
Total dissolved solids	mg/L	5	3500	100	3310	100

Radio Chemistry

Deuterium	--	0	-184.9	-	-186.5	-
Oxygen-18	--	0	-22.69	-	-23.38	-
Radium-226	Bq/L	0.005	9.9	0.7	8.6	0.6
Radon-222	Bq/L	3	3000	3	3100	3

SRC ANALYTICAL

Aug 10, 2011

422 Downey Road
 Saskatoon, Saskatchewan, Canada
 S7N 4N1
 (306) 933-6932 or 1-800-240-8808
 Fax: (306) 933-7922

AREVA
 Baker Lake
 817 45th Street West
 Box 9204
 Saskatoon, SK S7L 5X2
 Attn: Kim Sarauer

Page 1 of 2

Sample # **23232**
 Date Sampled: **Jul 21, 2011 08:43**
 Sample Matrix: **WATER**
 Description: **BONG05221072011**

Client PO #: **6500-021-488**
 Date Received: **Jul 22, 2011**

Analyte	Units	Result
Inorganic Chemistry		
Bicarbonate	mg/L	41
Carbonate	mg/L	<1
Chloride	mg/L	1670
Hydroxide	mg/L	<1
P. alkalinity	mg/L	<1
pH	pH units	7.20
Specific conductivity	uS/cm	4740
Sum of ions	mg/L	2530
Total alkalinity	mg/L	34
Total hardness	mg/L	1760
Nitrate	mg/L	<0.04
Fluoride	mg/L	0.19
Total dissolved solids	mg/L	3130
ICP		
Calcium	mg/L	461
Magnesium	mg/L	148
Potassium	mg/L	25
Sodium	mg/L	182
Sulfate	mg/L	2.8
Aluminum	mg/L	55
Antimony	mg/L	0.004
Arsenic	ug/L	29
Barium	mg/L	3.7
Beryllium	mg/L	0.003
Boron	mg/L	0.4
Cadmium	mg/L	0.0005
Chromium	mg/L	0.088
Cobalt	mg/L	0.11
Copper	mg/L	0.061
Iron	mg/L	13.3
Lead	mg/L	0.048
Manganese	mg/L	0.24
Molybdenum	mg/L	0.57
Nickel	mg/L	0.11

SRC ANALYTICAL

Aug 10, 2011

AREVA, Baker Lake

Page 2 of 2

Sample # **23232 (Continued)**
Date Sampled: **Jul 21, 2011 08:43**
Sample Matrix: **WATER**
Description: **BONG05221072011**

Client PO #: **6500-021-488**
Date Received: **Jul 22, 2011**

Analyte	Units	Result
ICP		
Selenium	mg/L	0.015
Silver	mg/L	0.0045
Strontium	mg/L	22.7
Thallium	mg/L	<0.002
Tin	mg/L	<0.001
Titanium	mg/L	0.22
Uranium	ug/L	500
Vanadium	mg/L	0.25
Zinc	mg/L	0.070
Radio Chemistry		
Lead-210	Bq/L	0.47
Polonium-210	Bq/L	0.47
Radium-226	Bq/L	2.7
Thorium-228	Bq/L	0.07
Thorium-230	Bq/L	0.46
Thorium-232	Bq/L	0.03

"<": not detected at level stated above.

SRC ANALYTICAL

Jul 02, 2010

422 Downey Road
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 Fax: (306) 933-7922

AREVA
 Baker Lake
 P.O. Box 9204
 817 45th Street West
 Saskatoon, Saskatchewan S7L 5X2
 Attn: Kim Sarauer

Page 1 of 1

Sample # **19514**
 Date Sampled: **Jun 18, 2010 15:00**
 Sample Matrix: **WATER**
 Description: **BONG-045 ARTESIAN**

Client PO #: **7900 000 788**
 Date Received: **Jun 22, 2010**

Analyte	Units	Result	DL
Inorganic Chemistry			
pH	pH units	6.93	0.07
Specific conductivity	uS/cm	23	1
Total suspended solids	mg/L	<1	1
ICP			
Aluminum, dissolved	mg/L	0.034	0.0005
Antimony, dissolved	mg/L	<0.0002	0.0002
Arsenic, dissolved	ug/L	0.2	0.1
Barium, dissolved	mg/L	0.032	0.0005
Beryllium, dissolved	mg/L	<0.0001	0.0001
Boron, dissolved	mg/L	<0.01	0.01
Cadmium, dissolved	mg/L	0.00001	0.00001
Chromium, dissolved	mg/L	<0.0005	0.0005
Cobalt, dissolved	mg/L	<0.0001	0.0001
Copper, dissolved	mg/L	0.0031	0.0002
Iron, dissolved	mg/L	0.074	0.0005
Lead, dissolved	mg/L	0.0006	0.0001
Manganese, dissolved	mg/L	0.010	0.0005
Molybdenum, dissolved	mg/L	<0.0001	0.0001
Nickel, dissolved	mg/L	0.0007	0.0001
Selenium, dissolved	mg/L	<0.0001	0.0001
Silver, dissolved	mg/L	0.00001	0.00001
Strontium, dissolved	mg/L	0.013	0.0005
Thallium, dissolved	mg/L	<0.0002	0.0002
Tin, dissolved	mg/L	0.0001	0.0001
Titanium, dissolved	mg/L	<0.0002	0.0002
Uranium, dissolved	ug/L	<0.1	0.1
Vanadium, dissolved	mg/L	<0.0001	0.0001
Zinc, dissolved	mg/L	0.012	0.0005

"<": not detected at level stated above.