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NUNAVUT WATER BOARD  
NUNAVUT IMALIRIYIN KATIMAYINGI  
OFFICE DES EAUX DU NUNAVUT

File No: **2BE-CHI2333**

May 18, 2023

Chad Corson  
Permitting Coordinator  
Peregrine Diamonds Ltd.  
De Beers Canada Inc.  
Suite 300 - 1601 Airport Rd NE  
Calgary, Alberta T2E 6Z8

Phone: (867) 679-6463 / (289) 377-4445  
Email: [chad.corson@debeersgroup.com](mailto:chad.corson@debeersgroup.com)

**RE: NWB Renewal/Amendment Water Licence No: 2BE-CHI2333, Type “B”, Chidliak Project, Peregrine Diamonds Ltd. (Peregrine)**

Dear Mr. Corson:

Please find attached Licence No: **2BE-CHI2333** issued to Peregrine Diamonds Ltd. by the Nunavut Water Board (NWB or Board) pursuant to its authority under Article 13 of the *Agreement between the Inuit of the Nunavut Settlement Area and Her Majesty the Queen in Right of Canada (Nunavut Agreement)*. The terms and conditions of the attached Licence related to the use of Water and the deposit of Waste are an integral part of this approval.

If the Licensee contemplates the renewal of this Licence, it is the responsibility of the Licensee to apply to the NWB for its renewal. The past performance of the Licensee, new documentation and information, and issues raised during a public hearing, if the NWB is required to hold one, will be used to determine the terms and conditions of the Licence renewal. Note that if the Licence expires before the NWB issues a new one, then the use of Water and the deposit of Waste must cease, or the Licensee may be in contravention of the *Nunavut Agreement* and the *Nunavut Waters and Nunavut Surface Rights Tribunal Act (NWNSRTA)*. However, the expiry or cancellation of a licence does not relieve the holder from any obligations imposed by the licence. The NWB recommends that an application for the renewal of this Licence be filed at least **three (3) months** prior to the Licence expiry date. It should be noted that in accordance with s. 75(1)(a) of the *Nunavut Planning and Project Assessment Act (NuPPAA)*, the Board is not allowed to issue a permit or authorization for any project proposal that has not been submitted to the Nunavut Planning Commission (NPC) in accordance with s. 76 of *NuPPAA*.

If the Licensee contemplates or requires an amendment to this Licence, the NWB may decide, in the public's interest, to hold a public hearing. The Licensee should submit applications for amendment as soon as possible to give the NWB sufficient time to go through the amendment

process. The process and timing may vary depending on the scope of the amendment, however, a minimum of **sixty (60) days** is required from time of acceptance by the NWB. It is the responsibility of the Licensee to ensure that all application materials have been received and are acknowledged by the Manager of Licensing.

The NWB strongly recommends that the Licensee consult the comments received by CIRNA and ECCC on issues identified. This information is attached for your consideration.<sup>1</sup>

Sincerely,

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Lootie Toomasie  
Nunavut Water Board,  
Chair

LT/as/rh

Enclosure: Licence No: **2BE-CHI2333**  
Comments – CIRNA, ECCC

Cc: Distribution List – Qikiqtani

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<sup>1</sup> Crown-Indigenous Relations and Northern Affairs Canada (CIRNA), March 31, 2023 and Environment and Climate Change Canada (ECCC), March 30, 2023.

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## DECISION

### LICENCE NUMBER: 2BE-CHI2333

This is the decision of the Nunavut Water Board (NWB) with respect to an application dated February 27, 2023 for the renewal/amendment of a Water Licence made by:

#### PEREGRINE DIAMONDS LTD.

to allow for the use of waters and the deposit of waste during camp and exploration operations and related activities at the at the Chidliak Project, located within the Qikiqtani Region, Nunavut, generally located at the following geographical coordinates:

##### Project Extents:

Latitude: 64° 23' 50'' N	Longitude: 66° 51' 55'' W
Latitude: 64° 08' 41'' N	Longitude: 65° 56' 29'' W

##### Camp Location(s):

Latitude: 64° 14' 25'' N	Longitude: 66° 20' 45'' W (Discovery Camp)
Latitude: 64° 14' 17'' N	Longitude: 66° 07' 45'' W (Sunrise Camp)
Latitude: 64° 36' 32'' N	Longitude: 66° 34' 43'' W (Aurora Camp)
Latitude: 64° 19' 24'' N	Longitude: 66° 31' 30'' W (CH-6 Camp)

## DECISION

After having been satisfied that the Application is for a proposal that falls outside of an area with an approved land use plan in place, exempt from section 235 of *Nunavut Planning and Project Assessment Act* (NuPPAA), and exempt from screening in accordance with section 12.4.3 of the Nunavut Agreement, and subject to the Nunavut Impact Review Board's (NIRB's) previous Screening Decisions (NIRB File No: 08AN008 & 11EA050 as determined by the Nunavut Planning Commission (NPC)<sup>1</sup>, the NWB decided that the Application could proceed through the regulatory process. In accordance with s. 55.1 of the *Nunavut Waters and Nunavut Surface Rights Tribunal Act* (Act) and Article 13 of the *Nunavut Agreement*, public notice of the Application was given and interested persons were invited to make representations to the NWB.

After reviewing the submission of the Applicant and considering the representations made by interested persons, the NWB, having given due regard to the facts and circumstances, the merits of the submissions made to it and to the purpose, scope, and intent of the *Nunavut Agreement* and of the *Act*, waived the requirement to hold a public hearing, and determined that:

**Licence No: 2BE-CHI1823 be renewed as Licence No: 2BE-CHI2333 subject to the terms and conditions contained therein. (Motion #: 2023-B1-004)**

Signed this 18<sup>th</sup> day of May, 2023 at Gjoa Haven, NU.

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Lootie Toomasie  
Nunavut Water Board, Chair

LT/as/rh

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<sup>1</sup> Nunavut Planning Commission, Determination, dated, February 24, 2023.

## **I. BACKGROUND**

Peregrine Diamonds Ltd. (Peregrine or Applicant) is a wholly-owned subsidiary of De Beers Canada Inc. (De Beers). Peregrine first began diamond exploration activities at its Chidliak Project (Project) in 2008. The Project is located on the Hall Peninsula of South Baffin Island between Cumberland Sound and Frobisher Bay. The two closest communities are Pangnirtung, 200 kilometers to the northeast, and Iqaluit, 120 kilometers to the southwest.

Kimberlites are diamond bearing rock formations created by ancient volcanoes. Since 2008 Peregrine has discovered 71 kimberlites in the Chidliak area. These kimberlites were discovered using a variety of exploration techniques including heavy mineral sampling, geophysics and drilling. At present, six of these 71 kimberlites are considered to have economic potential and will undergo further geological evaluation.

The current Chidliak Project area consists of 41 mining leases, covering a total of 42,578 hectares, and located exclusively on crown land. De Beers is aspiring to eventually build a diamond mine at the Chidliak exploration site. This proposed diamond mine is currently in the early stages of planning.

Exploration field work is currently seasonal. Winter field programs typically operate from late February to early May and summer programs from late June to early September. Four field camps are established on the project. Discovery Camp is used as the primary base of operations and the other three camps (Aurora Camp, CH-6 Camp and Sunrise Camp) are occasionally used for logistics support or emergency refuge.

The Licensee has not requested changes to the uses or locations of water currently held under the existing Water Licence 2BE-CHI1823.

## **II. PROCEDURAL HISTORY**

On February 27, 2023, the NWB received from Peregrine a water licence Amendment Application (the Application), consisting of the following documents:

Water Licence Amendment Application  
Chidliak Exploration Project 2023 Table of Contents  
Letter of Authority January 3, 2023  
Renewal Amendment Cover Letter  
Schedule 1 - Map 1 - Dec-2022  
Schedule 1 - Map 2 - Dec-2022 - Chidliak Project  
Schedule 1 - Map 3 - Dec-2022 - Water Sources & Important Locations  
Schedule 1 - Map 4 - Dec-2022 - Box Coordinates  
Schedule 2 - 2023-02-24 NPC Letter, Re. 149954  
Schedule 3 - Chidliak NWB Licence History  
Schedule 4 - List of Authorized Activities  
Schedule 5 - Chidliak Exploration Waste Management Plan  
Schedule 6 - Potential Environmental Impacts

Schedule 7 - CHI Consultation Catalogue  
Schedule 8 - Security Information  
Schedule 9 (B) - ET8412 29-Nov-2022 Letter Search  
Schedule 9 - ET8329 29-Nov-2022 Letter Search  
Schedule 10 - Corporate Certificates  
Schedule 11 - Environmental Baseline Studies  
Schedule 11B - Environmental Baseline Studies  
Schedule 12 - English Summary  
Schedule 13 - Plain Language Summary Inuktitut  
Schedule 14 - 2022-12 CHI Revised Spill Plan  
Schedule 15 - Chidliak Exploration Project - Abandonment and Restoration Plan  
Schedule 16 - Exploration-Remote Camp Questionnaire  
Application Renewal Licensee Response to NWB Review  
Bulk Sample Monitoring Plan  
Chidliak Exploration Project Permitted Locations

#### Application Scope

The scope of the Application remains the same as that of the existing licence, the only change from the existing Licence conditions includes an increase of the water use allowed, from 246 m<sup>3</sup> per day to 299 m<sup>3</sup> per day. The scope includes the following:

- Trenching/bulk sampling, blasting, drilling, cuttings disposal, airstrips and winter trails;
- Operation of four (4) camps;
- Total water use of two hundred (299) cubic metres per day;
- Deposit of waste; and
- Requested Term of fifteen (15) years.

#### Procedural History

Following receipt and an internal preliminary review, the NWB distributed the application on March 3, 2023 for a thirty (30) day review and comment period with the deadline for submission set for April 3, 2023. Prior to the comment deadline, the NWB received submissions from the Crown-Indigenous Relations and Northern Affairs Canada (CIRNA) and Environment and Climate Change Canada (ECCC). Peregrine provided a response to the intervenors' comments on April 14, 2023. All intervenors confirmed, by May 16, 2023, that their concerns had been addressed.

With respect to pre-licensing requirements, the NWB received the Nunavut Planning Commission's (NPC) Land Use Conformity Determination<sup>2</sup> for the Undertaking indicating that the project proposal falls outside of the areas with applicable land use plans in place and that a screening by Nunavut Impact Review Board (NIRB) is not required as the previous Screening Decisions issued to the Project on March 28, 2008 and February 20, 2012 remains applicable.

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<sup>2</sup> Nunavut Planning Commission, determination, February 24, 2023.

The NWB has placed in its Public Registry copies of the Application and all comments received from Interveners. This information can be accessed on the NWB's FTP site using the following link:

<ftp://ftp.nwb-oen.ca/registry/2%20MINING%20MILLING/2B/2BE%20-%20Exploration/2BE-CHI2333%20Peregrine/1%20APPLICATION/2023%20Renewal>

### III. FILE HISTORY

The NWB issued three licences and multiple amendments to this Project in the past, they are summarized below:

- Licence No: 2BE-CHI0813 was issued on May 7, 2008 and had an expiration date of June 1, 2013. The Licence allowed for the use of sixty (60) cubic metres of water per day and the deposit of waste in support of a mining exploration program. The Discovery camp was included in this Licence.
  - Amendment #1 was issued on April 17, 2009 to increase the amount of water use from sixty (60) to ninety-five (95) cubic metres of water per day. To allow the construction of a second exploration camp called Sunrise.
  - Amendment #2 was issued on July 22, 2010 to allow Peregrine to use water while drilling on IOL parcel PA-28.
  - Amendment #3 was issued on December 14, 2010 to allow the construction of a third exploration camp Aurora.
  - Amendment #4 was issued on March 9, 2012 to allow the construction of a fourth exploration camp CH-6. This amendment also included the expansion of existing camps and winter trail network, temporary shelters, fueling station, heavy equipment, large diameter drilling, bulk sampling and additional water sources.
- Licence No: 2BE-CHI1218 was issued on December 24, 2012 and had an expiration date of June 1, 2018. The Licence allowed for the use of ninety-five (95) cubic metres of water per day and the deposit of waste in support of a mining exploration program.
  - Amendment #1 was issued on November 13, 2014 to increase the amount of water use from ninety-five (95) to two hundred and forty-six (246) cubic metres of water per day.
  - Amendment #2 was issued on March 10, 2017 to add a new water source and an on-ice landing strip for small fixed wing aircraft.
- Licence No: 2BE-CHI1823 was issued on April 30, 2018 and has an expiration date of May 31, 2023. The Licence allows for the use of two hundred and forty-six (246) cubic metres of water per day and the deposit of waste in support of a mining exploration program.

#### IV. GENERAL CONSIDERATIONS

The following sections provide general overviews of the rationale for some of the main terms and conditions included under this Renewal Licence.

##### Term of the Licence

In accordance with s. 45 of the *Nunavut Waters and Nunavut Surface Rights Tribunal Act* (NWNSRTA or Act), the NWB may issue a licence for a term not exceeding twenty-five (25) years. In determining an appropriate term for a renewal licence, the Board generally takes into consideration several factors including Interveners' comments, the Licensee's compliance history, as well as the rationale contained in the Application.

In their Application, the Licensee has requested a fifteen (15) year term. No concerns were expressed regarding the requested term. The Board, in examining the factors stated above, felt that the requested term was longer than what is normally issued for this type of Undertaking. For exploration licences, related to the nature and duration of exploration activities generally the NWB usually grants licences with a term between 5 and 10 years.

The Board notes generally good compliance history of existing licence and has therefore granted a ten (10) year term for the Renewal Licence. In so doing, the Board believes and expects that the ten-year term will provide the Licensee with significant opportunities to consistently abide by the terms and conditions in the Licence over time and provide ongoing compliance record prior to a need for renewal. The existing Licence No: 2BE-CHI1823 will be renewed as Licence No: 2BE-CHI2333.

##### Annual Report

Under Part B, Item 1 of the Licence, the Licensee is required to submit Annual Reports for the purpose of ensuring that the NWB has an accurate annual update of activities related to Water use and Waste disposal during each calendar year. This information is maintained on the Public Registry and is available to interested parties upon request. A "Standardized Form for Annual Reporting" is to be used by the Licensee and is available from the NWB file transfer protocol (FTP) site under the Public Registry link at the NWB Website:

<ftp://ftp.nwb-oen.ca/other documents/Standardized Forms/>

##### Water Use

The quantity of water requested by the Applicant increases from two hundred and forty-six (246) cubic metres of water per day to two hundred and ninety-nine (299) cubic metres per day. The Licensee shall obtain Water, up to a maximum of twenty-five (25) cubic metres per day for domestic camp use, and to a maximum of two hundred and seventy-four (274) cubic metres per day for drilling. Water for drilling shall be obtained from the following five (5) sources listed below and also from local sources proximal to the drilling targets:

1. Deep Hole – McKeand River



2. Contingency Lake 1
3. Contingency Lake 2
4. Lake west of Sunrise camp, and
5. Unnamed Water source located 12 kilometers west of the CH-6 Camp and Ch-6 Kimberlite

### Camp

The Licensee is authorized to operate four (4) camps to support exploration activities under this Licence. These camps are Discovery, Sunrise, Aurora and CH-6. There are no changes to camp operations under this Licence.

Discovery camp was established in 2008 and is the only location in the Chidliak Exploration Project area that has a natural landing area capable of handling fixed wing aircraft on wheels during the summer months.

The Sunrise Camp was established in 2009. The location was selected because it is adjacent to an eight (8) kilometer long lake upon which fixed wing aircraft can land in the winter. This lake is the closest lake to the main Discovery Camp.

The Aurora Camp is approximately 41 kilometers northwest of the Discovery camp and was established in 2011. The location was selected because it is adjacent to a three (3) kilometer long lake upon which fixed wing aircraft can land in the winter and the camp is also close to geophysical anomalies which required exploratory drilling.

The CH-6 Camp was established in 2013. The location was selected due to its proximity to the CH-6 kimberlite which is the subject of drilling and trenching campaigns. There are no local potable water sources and water must be hauled to the camp. CH-6 Camp has only been occupied in the winter. Since 2013 the camp has been used as an emergency safety refuge during summer drill programs at the CH6 kimberlite.

No concerns were expressed by the Interveners with respect to authorizing Camp operations to support exploration activities. Terms and conditions for Camp operations are included in Part E of the Licence.

### Deposit of Waste

The Licensee indicated in their Application that all hazardous waste (empty fuel drums, waste fuel, waste oil, batteries) will be flown to Iqaluit and disposed by Nunatta Environmental Services Inc.

Combustible, non-hazardous materials will be burned in the incinerator. Combustible waste will be incinerated in an incinerator, in accordance with the Canada-Wide Standards (“CWS”) for Dioxins and Furans by the Canadian Council of Ministers of the Environment (CCME).

Non-combustible waste will be stored in appropriate containers until they can be removed from

site for treatment and/or disposal at an accredited facility (flown periodically to Iqaluit).

Peregrine will utilize pacto toilets, whereby the blackwater waste will be collected in pacto bags and will be incinerated in an A400 incinerator. Ash generated from black water incineration will be stored in designated, sealed and labelled drums and flown to Iqaluit for proper disposal.

The Licensee has submitted the document titled “*Chidliak Exploration Project, Waste Management Plan V1.1*” dated April, 2023, along with the Application package. This document is being approved by the NWB with the issuance of the Licence.

### *Spill Contingency Plan*

The Plan named “*Chidliak Exploration Project, Spill Contingency Plan V1.1*” dated April 2023 that was submitted with the application is to be approved with the issuance of the Licence. Conditions for spill contingency planning are included in Part H of the Licence.

### *Closure and Reclamation*

Conditions for Closure and Reclamation are included in Part I of the Licence.

The Plan named “*Chidliak Exploration Project, Abandonment and Restoration Plan LUP# N2018C0002*” dated April, 2023 that was submitted with the application is to be approved with the issuance of the Licence.

### *Monitoring*

Part J of the Licence details the environmental monitoring requirements. Requirements are similar to the existing Licence.

It should also be noted that additional sampling may be imposed by the Inspector.

### *Summary of Comments*

#### **Crown-Indigenous Relations and Northern Affairs (CIRNA) March 31, 2023:**

1. CIRNA expressed concerns regarding the waste management activities mentioned in the Waste Management Plan and requested the Applicant for clarifications.
  - a. The Applicant submitted an updated Waste Management Plan including revisions to resolve CIRNA’s concerns.
2. CIRNA expressed concerns regarding missing information in the Abandonment and Restoration Plan and requested the Applicant for clarifications.
  - a. The Applicant submitted an updated Abandonment and Restoration Plan including revisions to resolve CIRNA’s concerns.

3. CIRNA expressed concerns regarding missing information in the Spill Plan and requested the Applicant for clarifications.
  - a. The Applicant submitted an updated Spill Plan including revisions to resolve CIRNA's concerns.

**Environment and Climate Change Canada (ECCC) March 30, 2023:**

1. ECCC advised the Applicant to update the external contact for the 24h spill line to the Government of Nunavut.
  - a. The Applicant made the update and submitted a revised Spill Plan.
2. ECCC recommended updates to the Bulk Sample Monitoring Plan and to include details on sampling, analysis, and disposal of trench water.
  - a. The Applicant stated that trenching is not expected to be a component of the Bulk Sample program for winter 2024. If it is determined trenching will be required, an update to this document will be provided.
3. ECCC recommended updates to the Bulk Sample Monitoring Plan to include how bulk sampling waste rock is tested to determine whether it is free of contaminants and is non-acid generating and non-metal leaching, in alignment with Part D, Item 10 of the water licence.
  - a. The Applicant included the recommended update in the revised Bulk Sample Monitoring Plan.
4. ECCC recommended including mitigation measures, used to prevent the transport of sediments, blasting residuals and other contaminants from trench areas to nearby waterbodies, in the Bulk Sample Monitoring Plan.
  - a. The Applicant stated that they... *“will not be taking a bulk sample in 2023. Bulk sampling will be done in the winter when ground conditions frozen. The next bulk sample is planned for the winter 2024. There will be no water flow during the sampling season. Trenching is not currently being considered.”* The Bulk Sample Monitoring Plan was updated to include mitigation measures.

**Environment and Climate Change Canada (ECCC) May 15, 2023:**

5. ECCC recommends that the Bulk Sample Monitoring Plan be updated to include visual inspection of the Kimberlites to monitor for the presence of any sulphides.
  - a. Condition is included in the Licence to submit an updated Bulk Sample Monitoring Plan within 60 days of issuance of the Licence.



## NUNAVUT WATER BOARD WATER LICENCE

Licence No: 2BE-CHE2333

Pursuant to the *Nunavut Waters and Nunavut Surface Rights Tribunal Act* and the *Agreement Between the Inuit of the Nunavut Settlement Area and Her Majesty the Queen in right of Canada*, the Nunavut Water Board, hereinafter referred to as the Board, hereby grants to

**PEREGRINE DIAMONDS LTD.**

(Licensee)

**DE BEERS CANADA INC.**

**SUITE 300 – 1601 AIRPORT RD NE, CALGARY, AB T2E 6Z8**

(Mailing Address)

hereinafter called the Licensee, the right to alter, divert or otherwise use water or dispose of Waste for a period subject to restrictions and conditions contained within this Licence Renewal:

Licence Number/Type: **2BE-CHI2333 / TYPE “B”**

Water Management Area: **SOUTHERN CUMBERLAND SOUND WATERSHED**

Project / Location: **CHIDLIAK PROJECT / QIKIQTANI REGION, NUNAVUT**

Classification: **MINING UNDERTAKING (EXPLORATION)**

Purpose: **DIRECT USE OF WATER AND DEPOSIT OF WASTE**

Quantity of Water use not to Exceed: **TWO HUNDRED AND NINETY-NINE (299) CUBIC METRES PER DAY**

Effective Date: **JUNE 1, 2023**

Expiry of Licence: **MAY 31, 2033**

This Licence renewal, issued and recorded at Gjoa Haven, Nunavut, includes and is subject to the annexed conditions.

**Lootie Toomasie**  
**Nunavut Water Board, Chair**

## **PART A: SCOPE, DEFINITIONS AND ENFORCEMENT**

### **1. Scope**

This Licence allows for the use of Water and the deposit of Waste for a Mining undertaking classified as per Schedule 1 of the *Regulations* at the Chidliak Project (Chidliak and Qilaq Claims), located on the Hall Peninsula of South Baffin Island approximately 120 km Northeast of Iqaluit and 200 km South of Pangnirtung within the Qikiqtani Region, Nunavut.

The activities authorized under this Licence include camp operations (Discovery Camp, Sunrise Camp, Aurora Camp, and CH-6 Camp) and activities related to exploration including:

- Trenching
  - Blasting
  - Core drilling (on land and on ice)
  - Reverse circulation drilling (on land)
  - Percussion drilling (on land; does not use water)
  - Large diameter reverse circulation drilling
  - Airstrips (ice and land)
  - Winter trails (inter-camp and Iqaluit-camp)
  - Bulk sampling
  - Cuttings disposal
- a. This Licence is issued subject to the conditions contained herein with respect to the taking of Water and the deposit of Waste of any type in any Waters or in any place under any conditions where such Waste or any other Waste that results from the deposits of such Waste may enter any Waters. Whenever new *Regulations* are made or existing *Regulations* are amended by the Governor in Council under the *Nunavut Waters and Nunavut Surface Rights Tribunal Act*, or other statutes imposing more stringent conditions relating to the quantity or type of Waste that may be so deposited or under which any such Waste may be so deposited, this Licence shall be deemed, upon promulgation of such *Regulations*, to be subject to such requirements; and
- b. Compliance with the terms and conditions of this Licence does not absolve the Licensee from responsibility for compliance with the requirements of all applicable Federal, Territorial and Municipal legislation.

### **2. Definitions**

“**Act**” means the *Nunavut Waters and Nunavut Surface Rights Tribunal Act*;

“**Addendum**” means the supplemental text that is added to a full plan or report usually included at the end of the document and is not intended to require a full resubmission of the revised report;

“**Amendment**” means a change to original terms and conditions of this Licence requiring correction, addition or deletion of specific terms and conditions of the Licence; modifications inconsistent with the terms of the set terms and conditions of the Licence;

“**Applicant**” means the Licensee;

“**Appurtenant Undertaking**” means an undertaking in relation to which a use of water or a deposit of Waste is permitted by a licence issued by the Board;

“**Board**” means the Nunavut Water Board established under the *Nunavut Agreement* and the *Nunavut Waters and Nunavut Surface Rights Tribunal Act*;

“**Closure and Reclamation Plan**” means a Plan developed to reach the closure goal and taking in account the “Guidelines for the Closure and Reclamation of Advanced Mineral Exploration and Mine Sites in the Northwest Territories” 2013;

“**Effluent**” means treated or untreated liquid Waste material that is discharged into the environment from a structure such as a settling pond, landfarm or a treatment plant;

“**Engineer**” means a professional engineer registered to practice in Nunavut in accordance with the *Consolidation of Engineers and Geoscientists Act S. Nu 2008, c.2* and the *Engineering and Geoscience Professions Act S.N.W.T. 2006, c.16 Amended by S.N.W.T. 2009, c.12*;

“**Greywater**” means all liquid Wastes from showers, baths, sinks, kitchens and domestic washing facilities, but does not include toilet Wastes;

“**High Water Mark**” means the usual or average level to which a body of water rises at its highest point and remains for sufficient time so as to change the characteristics of the land (ref. Department of Fisheries and Oceans Canada, Operational Statement: Mineral Exploration Activities);

“**ICP Scan**” means the laboratory method for determining trace metals in water through Emission Spectroscopy using inductively coupled plasma (including from approximately 22 to 32 elements, depending on the laboratory performing the analysis);

“**Inspector**” means an Inspector designated by the Minister under Section 85 (1) of the *Act*;

“**Licensee**” means the holder of this Licence;

“**Modification**” means an alteration to a physical work that introduces a new structure or eliminates an existing structure and does not alter the purpose or function of the work, but does not include an expansion;

“**Nunavut Agreement**” means the “*Agreement Between the Inuit of the Nunavut Settlement Area and Her Majesty the Queen in right of Canada*”, including its preamble and schedules, and any amendments to that agreement made pursuant to it;

**“Regulations”** means the *Nunavut Waters Regulations* SOR/2013-69 18<sup>th</sup> April, 2013;

**“Secondary Containment”** means an impermeable structure, external to and separate from primary containment, which prevents unplanned spills of hazardous materials and provides a minimum capacity of 110% of the original vessel. Where multiple vessels are stored within the containment, it must provide a minimum capacity equal to the sum of the largest vessel and 10% of the aggregate volume of all other vessels located in the containment. This structure shall also provide containment and control of hoses and nozzles;

**“Sewage”** means all toilet Wastes and greywater;

**“Spill Contingency Plan”** means a Plan developed to deal with unforeseen petroleum and hazardous materials events that may occur during the operations conducted under the Licence;

**“Sump or Sumps”** A structure or depression that collects, controls, and filters liquid Waste before it is released to the environment. This structure should be designed to prevent erosion while allowing percolation of liquid Waste;

**“Toilet Wastes”** means all human excreta and associated products, but does not include greywater;

**“Waste”** means, as defined in s. 4 of the *Act*, any substance that, by itself or in combination with other substances found in water, would have the effect of altering the quality of any water to which the substance is added to an extent that is detrimental to its use by people or by any animal, fish or plant, or any water that would have that effect because of the quantity or concentration of the substances contained in it or because it has been treated or changed, by heat or other means;

**“Water” or “Waters”** means waters as defined in section 4 of the *Act*.

### 3. **Enforcement**

- a. Failure to comply with this Licence will be a violation of the *Act*, subjecting the Licensee to the enforcement measures and the penalties provided for in the *Act*;
- b. All inspection and enforcement services regarding this Licence will be provided by Inspectors appointed under the *Act*; and
- c. For the purpose of enforcing this Licence and with respect to the use of water and deposit or discharge of Waste by the Licensee, Inspectors appointed under the *Act*, hold all powers, privileges and protections that are conferred upon them by the *Act* or by other applicable law.

## **PART B: GENERAL CONDITIONS**

1. The water use fees, for the right to use Waters shall be paid annually in accordance with Section 12 of the *Regulations*.
2. The Licensee shall file an Annual Report on the Appurtenant Undertaking with the Board no later than March 31<sup>st</sup> of the year following the calendar year being reported, containing the following information:
  - a. A summary report of Water use and Waste disposal activities;
  - b. Quantity of Water (in cubic metres/day) obtained for domestic and other purposes from sources on, in or flowing through Inuit-owned lands for the reporting period;
  - c. Quantity of Water (in cubic metres/day) obtained for domestic and other purposes from sources on, in or flowing through Crown Lands reporting period;
  - d. Quantity of Waste disposed of on on-site Waste disposal facility;
  - e. Quantity of Waste backhauled to approved facility for disposal;
  - f. A list of unauthorized discharges and a summary of follow-up actions taken;
  - g. Any revisions to the Spill Contingency Plan and Closure and Reclamation Plan, as required by Part B, Item 7, submitted in the form of an Addendum;
  - h. A description of all progressive and or final reclamation work undertaken, including photographic records of site conditions before, during and after completion of operations;
  - i. Report all artesian flow occurrences as required under Part F, Item 3;
  - j. A summary of all information requested and results of the Monitoring Program;
  - k. Details pertaining to locations of sump(s) and drill holes;
  - l. GPS co-ordinates (in degrees, minutes and seconds of latitude and longitude) for the locations of all temporary camps established in support of the project if the actual coordinates differ from that provided in the application;
  - m. A summary, including photographic records before, during and after any relevant construction activities or Modifications and/or major maintenance work carried out on facilities under this Licence and an outline of any work anticipated for the next year;
  - n. Detailed discussion on the performance, installation, and evaluation, including the use of photographic record, of the primary and secondary containment functions used in fuel storage to safeguard impacts to freshwaters;
  - o. A summary of public consultation/participation, describing consultation with local organizations and residents of the nearby communities, if any were conducted;
  - p. Any other details on Water use or Waste disposal requested by the Board by the 1<sup>st</sup> November of the year being reported.
3. The Licensee shall notify the NWB of any changes in operating plans or conditions associated with this project at least thirty (30) days prior to any such change.
4. The Licensee shall install flow meters or other such devices, or implement suitable methods required for the measuring of Water volumes as required under Part J, Item 1.
5. The Licensee shall, for all Plans submitted under this Licence, include a proposed



timetable for implementation. Plans submitted, cannot be undertaken without subsequent written Board approval and direction. The Board may alter or modify a Plan if necessary to achieve the legislative objectives and will notify the Licensee in writing of acceptance, rejection or alteration of the Plan.

6. The Licensee shall, for all Plans submitted under this Licence, implement the Plan as approved by the Board in writing.
7. The Licensee shall review the Plans referred to in this Licence, as required by changes in operation and/or technology, and modify the Plan accordingly. Revisions to the Plans shall be submitted in the form of an Addendum to be included with the Annual Report.
8. Every Plan to be carried out pursuant to the terms and conditions of this Licence shall become a part of this Licence, and any additional terms and conditions imposed upon approval of a Plan by the Board become part of this Licence. All terms and conditions of the Licence should be contemplated in the development of a Plan where appropriate.
9. The Licensee shall ensure a copy of this Licence is maintained at the site of operations at all times. Any communication with respect to this Licence shall be made in writing to the attention of:

**(a) Manager of Licensing:**

Nunavut Water Board  
P.O. Box 119  
Gjoa Haven, NU X0B 1J0  
Telephone: (867) 360-6338  
Fax: (867) 360-6369  
Email: [licensing@nwb-oen.ca](mailto:licensing@nwb-oen.ca)

**(b) Inspector Contact:**

Manager of Field Operations, INAC  
Nunavut District, Nunavut Region  
P.O. Box 100  
Iqaluit, NU X0A 0H0  
Telephone: (867) 975-4284  
Fax: (867) 979-6445

10. The Licensee shall submit an electronic copy of all reports, studies, and plans to the Board. Reports or studies submitted to the Board by the Licensee shall include a detailed executive summary in Inuktitut.
11. The Licensee shall ensure that all documents or correspondence submitted by the Licensee to the NWB are received and acknowledged by the Manager of Licensing.
12. This Licence is assignable as provided for in Section 44 of the *Act*.
13. The expiry or cancellation of this Licence does not relieve the Licensee from any obligation imposed by the Licence, or any other regulatory requirement.

## **PART C: CONDITIONS APPLYING TO WATER USE**

1. The Licensee shall obtain Water, up to a maximum of twenty-five (25) cubic metres per day for domestic camp use, and to a maximum of two hundred and seventy-four (274) cubic metres per day for drilling. Water shall be obtained from the “*Deep Hole*”-*McKeand River*, from “*Contingency Lake 1*”, from “*Lake west of Sunrise Camp*”, from “*Contingency Lake 2*”, from the “*Unnamed Water source located 12 kilometers west of the CH-6 Camp and Ch-6 Kimberlite*”, and also from local sources proximal to the drilling targets as outlined in the Application. The total volume of water for the purposes of this Licence shall not exceed two hundred and ninety-nine (299) cubic meters per day.
2. The use of Water from streams or any water bodies not identified in Part C, Item 1, is prohibited unless authorized and approved by the Board in writing.
3. The withdrawal of Water from any stream shall not exceed ten (10) per cent of the low flow of that stream unless approved by the Board in writing.
4. If the Licensee requires Water in sufficient volume that the source water body may be drawn down the Licensee shall, at least thirty (30) days prior to commencement of use of Water, submit to the Board for approval in writing the following: volume required, hydrological overview of the water body, details of impacts, and proposed mitigation measures.
5. The Licensee shall provide a notice to an Inspector and the Board that includes the coordinates of each water source to be used for the purposes outlined in Part C, Item 1, at least ten (10) days prior to using the water source.
6. The Licensee shall equip all water intake hoses with a screen of an appropriate mesh size to ensure that fish are not entrained and shall withdraw Water at a rate such that fish do not become impinged on the screen.
7. The Licensee shall not conduct any work below the ordinary High-Water Mark of any water body unless approved by the Board in writing.
8. The Licensee shall not cause erosion to the banks of any water body and shall provide necessary controls to prevent such erosion.
9. Sediment and erosion control measures shall be implemented prior to and maintained during the undertaking to prevent entry of sediment into Water.

## **PART D: CONDITIONS APPLYING TO WASTE DISPOSAL**

1. The Licensee shall locate areas designated for Waste disposal at a minimum distance of thirty-one (31) metres from the ordinary High-Water Mark of any water body such that the quality, quantity or flow of Water is not impaired, unless otherwise approved by the Board in writing.

2. The Board has approved the Plan entitled *Chidliak Exploration Project, Waste Management Plan V1.1*, dated April, 2023 that was submitted as additional information with the Application.
3. The Licensee shall not practice on-site land filling of domestic Waste, unless otherwise approved by the Board in writing.
4. The Licensee is authorized to dispose of all acceptable food Waste, paper Waste and untreated wood products in an incinerator.
5. The Licensee shall not open burn plastics, wood treated with preservatives, electric wire, Styrofoam, asbestos or painted wood to prevent the deposition of Waste materials of incomplete combustion and/or leachate from contaminated ash residual, from impacting any surrounding Waters, unless otherwise approved by the Board in writing.
6. The Licensee shall provide to the Board, documented authorization from the City of Iqaluit prior to the backhauling and disposal of any Waste.
7. The Licensee shall backhaul and dispose of all hazardous Wastes, Waste oil and non-combustible Waste generated through the course of the operation at a licensed Waste disposal site.
8. The Licensee shall maintain records of all Waste backhauled and records of confirmation of proper disposal of backhauled Waste. These records shall be made available to an Inspector upon request.
9. The Licensee shall contain all greywater in a Sump located at a distance of at least thirty-one (31) metres above the ordinary High-Water Mark of any water body, at a site where direct flow into a water body is not possible and no additional impacts are created, unless otherwise approved by the Board in writing.
10. The Licensee shall contain all toilet wastes in latrine pits or use incineration, chemical, portable or composting toilets. Latrine pits shall be located at a distance of at least thirty-one (31) metres above the ordinary High-Water Mark of any water body, treated with lime and covered with native material to achieve the pre-existing natural contours of the land prior to abandonment.
11. The Licensee shall confirm through appropriate test methods, that the bulk sampling waste rock is free of contaminants, is non-acid generating and non-metal leaching prior to disposal in accordance with the approved bulk sampling plan, trenching plan or abandonment and restoration plan. Results shall be reported within the annual report.
12. The Licensee shall direct all Water accumulated in blasted or excavated trenches to a trench water containment to allow for sampling prior to release. Water collected in hand-dug trenches shall be directed to a natural depression sump, as required by Part D, Item 1.

13. The Licensee shall provide at least ten (10) days notification to an Inspector, prior to the release of effluent from the trench water containment. The notice shall include water quality results, an estimate of the volume of water to be released and the proposed receiving location.
14. All Effluent discharged from the trench water containment shall be carried out in accordance with Part D, Item 1, directed to a natural depression where direct flow into a water body is not possible and no additional impacts are created.
15. The Licensee shall confirm compliance with Effluent quality limits in Part D, Item 16, prior to the release of any effluent
16. All Effluent discharged from the trench water containment shall not exceed the following Effluent quality limits:

Parameter	Maximum Concentration of any Grab Sample (mg/L)
Total Arsenic	0.50
Total Copper	0.30
Total Lead	0.20
Total Nickel	0.50
Total Zinc	0.50
Total Suspended Solids	25.0
Oil and Grease	no visible sheen
pH	between 6 and 9.5

**PART E: CONDITIONS FOR CAMPS, ACCESS INFRASTRUCTURES AND OPERATIONS**

1. The Licensee shall not erect camps or store material on the surface of frozen streams or lakes including the immediate banks except what is for immediate use. Camps shall be located such as to minimize impacts on surface drainage.
2. All activities shall be conducted in such a way as to minimize impacts on surface drainage and the Licensee shall immediately undertake any corrective measures in the event of any impacts on surface drainage.
3. The Licensee shall construct all winter lake and stream crossings, including ice bridges, entirely of Water, ice or snow. The Licensee shall minimize disturbance by locating ice bridges in an area that requires the minimum approach grading and the shortest crossing route. Stream crossings shall be removed or the ice notched prior to spring break-up.
4. With respect to access road, pad construction or other earthworks, the deposition of debris or sediment into or onto any water body is prohibited. These materials shall be disposed a distance of at least thirty-one (31) metres from the ordinary High-Water Mark in such a fashion that they do not enter the Water.

5. The Licensee shall not mobilize heavy equipment or vehicles for trenching or other activities unless the ground surface is capable of fully supporting the equipment or vehicles without rutting or gouging. Overland travel of equipment or vehicles shall be suspended if rutting occurs.

**PART F: CONDITIONS APPLYING TO DRILLING AND TRENCHING OPERATIONS**

1. The Licensee shall not conduct any land-based drilling within thirty-one (31) metres of the ordinary High-Water Mark of any water body, unless otherwise approved by the Board in writing.
2. The Licensee shall dispose of all drill waste, including Water, chips, muds and salts (CaCl<sub>2</sub>) in any quantity or concentration, from land-based and on-ice drilling, in a properly constructed Sump or an appropriate natural depression located at a distance of at least thirty-one (31) metres from the ordinary High-Water Mark of any adjacent water body, where direct flow into a water body is not possible and no additional impacts are created.
3. 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 datum) and dates.
4. Drilling additives or mud shall 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 are demonstrated to be non-toxic.
5. For “on-ice” drilling where drill additives are not being used, return Water released must be nontoxic, and not result in an increase in total suspended solids in the immediate receiving Waters, above the Canadian Council of Ministers for the Environment, Guidelines for the Protection of Freshwater Aquatic Life (i.e. 10 mg/L for lakes with background levels under 100 mg/L, or 10% for those above 100 mg/L).
6. The Licensee shall establish water quality conditions prior to and upon completion of any drilling program through lake ice.
7. The Licensee shall, during trenching activities utilizing blasting, provide mitigation measures to prevent the transport of blast rock, explosives residues, sediment and other materials from entering water as required by Part C, Item 9 and Part E, Item 4.
8. The Licensee shall provide to the Board for approval, at least ninety (90) days prior to beginning any additional bulk sampling or trenching operations, update the Plan entitled *Chidliak Exploration Project, Bulk Sample Monitoring Plan*, to include recommendations received from intervenors during the Application.

9. The Licensee shall provide to the Board for approval in writing, at least ninety (90) days prior to beginning any additional bulk sampling or trenching operations, a revised Bulk Sampling Monitoring Plan, referred to in Part F, Item 8 or standalone trenching plan which shall include the following:
  - a. Size and location (including GPS coordinates and datum) of trenches;
  - b. Approximate dimensions (length, width and depth) of each trench;
  - c. Approximate mass of sample extracted from trenches for testing;
  - d. Proposed mitigation measures for the prevention of the transport of sediments, blasting residues, fly rock and other materials, from the trench area to nearby water bodies;
  - e. Plans for disposal of any waste rock or overburden generated from the activity;
  - f. Projected volume and quality of water discharged from each trench with potential treatment required; and
  - g. The proposed monitoring program to be carried out on trench wastewater prior to discharge.

#### **PART G: CONDITIONS APPLYING TO MODIFICATIONS**

1. The Licensee may, without written consent from the Board, carry out Modifications to the Water Supply Facilities and Waste Disposal Facilities provided that such Modifications are consistent with the terms of this Licence and the following requirements are met:
  - a. the Licensee has notified the Board in writing of such proposed Modifications at least sixty (60) days prior to beginning the Modifications;
  - b. such Modifications do not place the Licensee in contravention of the Licence or the *Act*;
  - c. such Modifications are consistent with the NIRB Screening Decision;
  - d. the Board has not, during the sixty (60) days following notification of the proposed Modifications, informed the Licensee that review of the proposal will require more than sixty (60) days; and
  - e. the Board has not rejected the proposed Modifications.
2. Modifications for which all of the conditions referred to in Part G, Item 1 have not been met can be carried out only with written approval from the Board.
3. The Licensee shall provide as-built plans and drawings of the Modifications referred to in this Licence within ninety (90) days of completion of the Modification. These plans and drawings shall be stamped by an Engineer.

#### **PART H: CONDITIONS APPLYING TO SPILL CONTINGENCY PLANNING**

1. The Board has approved the Plan entitled *Chidliak Exploration Project, Spill Contingency Plan VI.1* dated April, 2023 that was submitted as additional information with the Application.

2. The Licensee shall prevent any chemicals, petroleum products or Wastes associated with the project from entering Water. All Sumps and fuel caches shall be located at a distance of at least thirty-one (31) metres from the ordinary High-Water Mark of any adjacent water body and inspected on a regular basis.
3. The Licensee shall conduct any equipment maintenance and servicing in designated areas and shall implement special procedures (such as the use of drip pans) to manage motor fluids and other Waste and contain potential spills.
4. If during the term of this Licence, an unauthorized discharge of Waste occurs, or if such a discharge is foreseeable, the Licensee shall:
  - a. Employ the approved Spill Contingency Plan;
  - b. Report the spill immediately to the 24-Hour Spill Line at (867) 920-8130 and to the Inspector at (867) 975-4284; and
  - c. For each spill occurrence, submit to the Inspector and the NWB, no later than thirty (30) days after initially reporting the event, a detailed report that will include the amount and type of spilled product, the GPS location of the spill, and the measures taken to contain and clean up the spill site.
5. The Licensee shall, in addition to Part H, Item 4, regardless of the quantity of releases of harmful substances, report to the NWT/NU Spill Line if the release is near or into a water body.

**PART I: CONDITIONS APPLYING TO CLOSURE AND RECLAMATION OR TEMPORARY CLOSURE**

1. The Board has approved the Plan entitled *Chidliak Exploration Project, Abandonment and Restoration Plan LUP# N2018C0002* dated April, 2023, that was submitted as additional information with the Application.
2. The Licensee shall complete all restoration work prior to the expiry of this Licence.
3. The Licensee shall carry out progressive reclamation of any components of the project no longer required for the Licensee's operations.
4. The Licensee shall backfill and restore all sumps, sewage/ washwater pits to the pre-existing natural contours of the land.
5. The Licensee shall remove from the site, all infrastructure and site materials, including all fuel caches, drums, barrels, buildings and contents, docks, water intakes, pumps and lines, material and equipment prior to the expiry of this Licence.
6. All roads and airstrip, if any, shall be re-graded to match natural contour to reduce erosion.



7. The Licensee shall remove any culverts and restore the drainage to match the natural channel. Measures shall be implemented to minimize erosion and sedimentation.
8. In order to promote growth of vegetation and the needed microclimate for seed deposition, all disturbed surfaces shall be prepared by ripping, grading, or scarifying the surface to conform to the natural topography.
9. Areas that have been contaminated by hydrocarbons from normal fuel transfer procedures shall be reclaimed to meet objectives as outlined in the Government of Nunavut's Environmental Guideline for Site Remediation, 2010. The use of reclaimed soils for the purpose of back fill or general site grading may be carried out only upon consultation and approval by the Government of Nunavut, Department of Environment and an Inspector.
10. The Licensee shall restore all drill holes and disturbed areas to natural conditions immediately upon completion of the drilling. The restoration of drill holes must include the removal of any drill casing materials and if having encountered artesian flow, the capping of holes with a permanent seal. Where drill casings cannot be removed the Licensee shall cut off the casings at ground level and identify with signage.
11. The Licensee may leave the casings on site, if it intends to continue drilling in existing casings, but shall add signaling to keep the area safe for the other territory users. The drill casings left cannot stay on the field for more than 2 years after the drilling.
12. The Licensee may store drill core produced by the appurtenant undertaking in an appropriate manner and location at least thirty-one (31) metres above the ordinary High-Water Mark of any adjacent water body, where any direct flow into a water body is not possible and no additional impacts are created.
13. The Licensee shall stockpile all overburden and vegetation materials removed during trenching and bulk sampling activities for later use in reclamation/re-contouring once trenching and bulk sampling activities are completed. Erosion control measures shall be provided as required by Part C, Item 9.
14. The Licensee shall, upon completion of sampling activities, restore all exploration trenches and bulk sample large diameter drill holes prior to the closure of seasonal exploration programs and removal of equipment from site. Trenches are to be in-filled and covered with stockpiled overburden materials and re-contoured to the natural terrain, providing drainage away from nearby watercourses.
15. The Licensee shall contour and stabilize all disturbed areas to reduce erosion and sedimentation to Water, upon completion of work upon completion of the undertaking and as per Part I, Item 3.

**PART J: CONDITIONS APPLYING TO THE MONITORING PROGRAM**



1. The Licensee shall measure and record, in cubic metres, the daily quantities of water that is used from sources located on, in or flowing through Crown Land, utilized for camp, drilling and other purposes.
2. The Licensee shall provide the GPS co-ordinates (in degrees, minutes, and seconds of latitude and longitude) and datum of all locations where sources of Water are utilized for all purposes.
3. The Licensee shall determine the GPS co-ordinates (in degrees, minutes, and seconds of latitude and longitude) and datum of all locations where Wastes associated with camp operations and drilling operations are deposited.
4. The Licensee shall obtain representative samples of the Water column below any ice where required under Part F, Item 5 and 6. Monitoring shall include but not be limited to the following:
  - Total Suspended Solids
  - pH
  - Electrical Conductivity,
  - Total Trace Metals as determined by a standard ICP Scan (to include at a minimum, the following elements: Al, Sb, Ba, Be, Cd, Cr, Co, Cu, Fe, Pb, Li, Mn, Mo, Ni, Se, Sn, Sr, Tl, Ti, U, V, Zn), and
  - Trace Arsenic and Mercury
5. The Licensee shall sample, prior to the release of any Effluent from the trench water containment, in order to provide confirmation of Effluent quality as required by Part D, Item 16. Analysis shall include:
 

Total Suspended Solids	pH
Conductivity	Total Ammonia
Total Arsenic	Total Cadmium
Total Chromium	Total Cobalt
Total Copper	Total Iron
Total Lead	Total Manganese
Total Nickel	Total Zinc
6. All sampling, sample preservation, and analyses shall be conducted in accordance with methods prescribed in the current edition of *Standard Methods for the Examination of Water and Wastewater*, or by such other methods approved by the Board in writing.
7. All analyses shall be performed in a laboratory accredited according to ISO/IEC Standard 17025. The accreditation shall be current and in good standing.
8. The Licensee shall include in the Annual Report required under Part B, Item 2 all data, monitoring results and information required by this Part.