

Land and Water Boards of the Mackenzie Valley



Draft

Type B Water Licence MV2023L1-0009

KBL Environmental Ltd. – Yellowknife Soil Treatment Facility

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Part A: Scope and Defined Terms		
	Scope:	Condition Title
1.	This Licence entitles the Licensee to deposit Waste for Industrial activities at the Yellowknife Soil Treatment Facility The scope of this Licence includes the following: a) Deposit of Wastewater from the Yellowknife Soil Treatment Facility to the Quarry Sump b) Construction, operation, and maintenance of the Yellowknife Soil Treatment Facility; and c) Progressive Reclamation and associated Closure and Reclamation activities.	SCOPE
2.	The scope of the Project is as described in the Preliminary Screening Determination for MV2014L1-0005, dated September 9, 2024	SCOPE – PRELIMINARY SCREENING
3.	This Licence is issued subject to the conditions contained herein with respect to the use of Water and the Deposit of Waste in any Waters or in any place under any conditions where such Waste or any other Waste that results from the Deposit of such Waste may enter any Waters. Any change made to the <i>Waters Act</i> and/or Waters Regulations that affects licence conditions and defined terms will be deemed to have amended this Licence.	LEGISLATION SUBJECT TO CHANGE
4.	Compliance with this Licence does not relieve the Licensee from responsibility for compliance with the requirements of any applicable federal, territorial, Tlicho, or municipal legislation.	LEGISLATIVE COMPLIANCE

Defined Terms:¹
Above Ground Storage Tanks – water tanks on site for storing excess water from the Retention Pond.
Action Level – a predetermined qualitative or quantitative trigger which, if exceeded, requires the Licensee to take appropriate actions.
Analyst – an Analyst designated by the Minister under subsection 65(1) of the <i>Waters Act</i> .
Board – the Mackenzie Valley Land and Water Board established under subsection 99(1) of the <i>Mackenzie Valley Resource Management Act</i> .
Closure Cost Estimate - an estimate of the cost to close and reclaim the Project.
Closure Criteria - standards that measure the success of selected closure activities in meeting closure objectives. Closure criteria may have a temporal component (e.g., a standard may need to be met for a pre-defined number of years). Closure criteria can be site-specific or adopted from territorial/federal or other standards and can be narrative statements or numerical values.
Closure Objectives - statements that describe what the selected closure activities are aiming to achieve; they are guided by the closure principles. Closure objectives are typically specific to project components, are measurable and achievable, and allow for the development of closure criteria.
Closure and Reclamation – the process and activities that facilitate the return of areas affected by the Project to viable and, wherever practicable, self-sustaining ecosystems that are compatible with a healthy environment and human activities.
Closure and Reclamation Plan (CRP) – a document, developed in accordance with this Licence, that clearly describes the Closure and Reclamation for the Project.
Construction – any activities undertaken during any phase of the Project to construct, build, upgrade, or replace any structures, facilities, or components of, or associated with, the Project.

¹ Defined terms are capitalized throughout the License, including when used in other definitions.
 MV2023L1-0009 – KBL Environmental Ltd. – Industrial – Draft

Defined Terms:¹
Deposit of Waste – a deposit of Waste in any Water or in any other place under conditions in which the Waste, or any other Waste that results from the deposit of that Waste, may enter any Waters.
Discharge – a direct or indirect deposit or release of any Water or Wastewater to Water in the Receiving Environment.
Effluent – a Wastewater Discharge.
Effluent Quality Criteria (EQC) – numerical or narrative limits on the quality or quantity of the Effluent authorized for deposit to Receiving Environment.
Engagement Plan – a document, developed in accordance with the LWB <i>Engagement and Consultation Policy</i> and the <i>Engagement Guidelines for Applicants and Holders of Water Licences and Land Use Permits</i> , that clearly describes how, when, and which engagement activities will occur with an affected party during the life of the Project.
Engineered Structure – any structure or facility related to Water Use or the disposal or Deposit of Waste that is designed by a Professional Engineer, including but not limited to biotreatment pads and Retention Pond associated with the Project.
Freeboard – the vertical distance between the still Water or Wastewater line and the lowest elevation of the effective Water or Wastewater containment crest on the upstream slope of a containment structure.
Groundwater – as defined in section 1 of the Waters Regulations: all water in a zone of saturation below the land surface, regardless of its origin.
Hazardous Waste - a Waste which, because of its quantity, concentration, or characteristics, may be harmful to human health or the environment when improperly treated, stored, transported, or disposed of.
Inspector – an Inspector designated by the Minister under subsection 65(1) of the <i>Waters Act</i> .
Licensee – the holder of this Licence.

Defined Terms:¹
Maximum Average Concentration – the concentration of a parameter that cannot be exceeded by the running average of any four consecutive analytical results.
Maximum Grab Concentration – the concentration of a parameter that cannot be exceeded in any one analytical result.
Minister – the Minister of the Government of the Northwest Territories (GNWT) – Environment and Natural Resources.
Ordinary High-Water Mark – the usual or average level to which a Watercourse rises at its highest point and remains for sufficient time so as to change the characteristics of the land. In flowing Watercourses (rivers, streams), this refers to an active channel/bank-full level, which is often the 1:2-year flood flow return level. In inland lakes, wetlands or marine environments, it refers to those parts of the Watercourse bed and banks that are frequently flooded by Water so as to leave a mark on the land and where the natural vegetation changes from predominantly aquatic vegetation to terrestrial vegetation (excepting Water tolerant species). For reservoirs, this refers to normal high operating levels (full supply level).
Professional Engineer – a person registered with the Northwest Territories and Nunavut Association of Professional Engineers and Geoscientists to practice as a Professional Engineer in the Northwest Territories as per the territorial <i>Engineering and Geoscience Professions Act</i> and whose professional field of specialization is appropriate to address the components of the Project at hand.
Progressive Reclamation – Closure and Reclamation activities conducted during the operating phase of the Project.
Project – the undertaking described in Part A, Conditions 1 and 2.
Quarry Sump – a human-made pit, trench, hollow, or natural depression used for the purpose of depositing Wastewater.
Receiving Environment – the natural environment that, directly or indirectly, receives any Waste from the Project.
RECLAIM – the Government of the Northwest Territories’ model for estimating Closure and Reclamation costs.
Retention Pond – the engineered collection pond of surface water Runoff, leachate, and the containment of contaminated waste and snow.
Runoff – the overland flow of Water or Wastewater that occurs when precipitation, meltwater, or other Water is not absorbed by the land.

Defined Terms:¹

Seepage – any Water or Waste that drains, passes through, or escapes from any structure designed to contain, withhold, divert, or retain Water or Waste.

Spill Contingency Plan (SCP) – a document developed for the Project in accordance with INAC's *Guidelines for Spill Contingency Planning*.

Surveillance Network Program (SNP) – a monitoring program required by this Licence and detailed in Schedule 1.

Temporary Closure – a state of care and maintenance, with the intent of resuming Project activities in the near future.

Traditional Knowledge – the cumulative, collective body of knowledge, experience and values built up by a group of people through generations of living in close contact with nature. It builds upon the historic experiences of a people and adapts to social, economic, environmental, spiritual, and political change.

Unauthorized Release – a release to the Receiving Environment of any Water or Waste not authorized under this Licence.

Waste – as defined in section 1 of the *Waters Act*:

- a) a substance that, if added to water, would degrade or alter or form part of a process of degradation or alteration of the quality of the water to an extent that is detrimental to its use by people or by an animal, fish or plant, or
- b) water that contains a substance in such a quantity or concentration, or that has been so treated, processed or changed, by heat or other means, that it would, if added to other water, degrade or alter or form part of a process of degradation or alteration of the quality of that water to the extent described in paragraph (a),
and includes
- c) a substance or water that, for the purposes of the *Canada Water Act*, is deemed to be waste,
- d) a substance or class of substances prescribed by regulations made under subparagraph 63(1)(b)(i),
- e) water that contains a substance or class of substances in a quantity or concentration that is equal to or greater than a quantity or concentration prescribed in respect of that substance or class of substances by regulations made under subparagraph 63(1)(b)(ii), and
- f) water that has been subjected to a treatment, process or change prescribed by regulations made under subparagraph 63(1)(b)(iii).

Defined Terms:¹

Waste Management Plan (WMP) – a document, developed in accordance with the MVLWB *Guidelines for Developing a Waste Management Plan*, that describes the methods of Waste management for the Project from Waste generation to final disposal.

Wastewater – any Water that is generated by Project activities or originates on-site, and which contains Waste, and may include, but is not limited to, Runoff, Seepage, Sewage, Minewater, and Effluent.

Water – as defined in section 1 of the *Waters Act*: water under the administration and control of the Commissioner, whether in a liquid or frozen state, on or below the surface of land.

Watercourse – as defined in section 1 of the Waters Regulations: a natural watercourse, body of Water or Water supply, whether usually containing Water or not, and includes, but is not limited to, Groundwater, springs, swamps, and gulches.

Water Management Area – a geographical area of the Northwest Territories established by section 2 and Schedule A of the Waters Regulations.

Waters Regulations – the regulations proclaimed pursuant to section 63 of the *Waters Act*.

Water Use – as defined in section 1 of the *Waters Act*: a direct or indirect use of any kind, including, but not limited to,

- a) a diversion or obstruction of waters,
- b) an alteration of the flow of waters, and
- c) an alteration of the bed or banks of a river, stream, lake or other body of water, whether or not the body of water is seasonal, but does not include a use connected with shipping activities that are governed by the *Canada Shipping Act, 2001*.

Yellowknife Soil Treatment Facility – the area(s) and Engineered Structures designated to contain and treat hydrocarbon-contaminated sediments, soil, and Water.

	Condition	Condition Title
	Part B: General Conditions	
1.	The Licensee shall ensure a copy of this Licence is maintained on site at all times.	COPY OF LICENCE
2.	The Licensee shall take every reasonable precaution to protect the environment.	PRECAUTION TO PROTECT ENVIRONMENT
3.	In conducting its activities under this Licence, the Licensee shall make every reasonable effort to consider and incorporate any scientific information and Traditional Knowledge that is made available to the Licensee.	INCORPORATE SCIENTIFIC INFORMATION AND TRADITIONAL KNOWLEDGE
4.	In each submission required by this Licence or by any directive from the Board, the Licensee shall identify all recommendations based on Traditional Knowledge received, describe how the recommendations were incorporated into the submission, and provide justification for any recommendation not adopted.	IDENTIFY TRADITIONAL KNOWLEDGE
5.	All references to policies, guidelines, codes of practice, statutes, regulations, or other authorities shall be read as a reference to the most recent versions, unless otherwise noted.	REFERENCES
6.	The Licensee shall ensure all submissions to the Board: <ul style="list-style-type: none"> a) Are in accordance with the LWB <i>Document Submission Standards</i> and, if applicable, <i>Geospatial Data Submissions Standards</i>; and b) Include any additional information requested by the Board. 	SUBMISSION FORMAT

	Condition	Condition Title
7.	The Licensee shall ensure management plans are submitted to the Board in a format consistent with the LWB <i>Standard Outline for Management Plans</i> , unless otherwise specified.	MANAGEMENT PLAN FORMAT
8.	The Licensee shall comply with all: plans, programs, manuals, studies , including revisions, approved pursuant to the conditions of this Licence.	COMPLY WITH SUBMISSIONS AND REVISIONS
9.	The Licensee shall conduct an annual review of all: plans, programs, manuals, studies and make any revisions necessary to reflect changes in operations, contact information, or other details. No later than [insert date] each year, the Licensee shall send a notification letter to the Board, listing the documents that have been reviewed and do not require revisions.	ANNUAL REVIEW
10.	The Licensee may propose changes at any time by submitting revised: plans, programs, manuals, or studies that require Board approval to the Board, for approval, a minimum of 90 days prior to the proposed implementation date for the changes. The Licensee shall not implement the changes until approved by the Board.	REVISIONS
11.	The Licensee shall revise any submission and submit it as per the Board's directive.	REVISE AND SUBMIT
12.	If any date for any submission falls on a weekend or holiday, the Licensee may submit the item on the following business day.	SUBMISSION DATE
13.	The Licensee shall comply with the Schedules , which form part of this Licence, and any updates to the Schedules as may be made by the Board.	COMPLY WITH SCHEDULE(S)
14.	The Licensee shall comply with the Surveillance Network Program set out in Schedule 1, and any updates to the Surveillance Network Program as may be made by the Board.	COMPLY WITH SURVEILLANCE NETWORK PROGRAM
15.	The Licensee shall comply with the Annexes, which form part of this Licence.	COMPLY WITH ANNEX(ES)
16.	The Schedules and any compliance dates specified in this Licence may be updated at the discretion of the Board.	UPDATES TO SCHEDULES AND

	Condition	Condition Title
		COMPLIANCE DATE(S)
17.	The Licensee shall comply with all directives issued by the Board in respect of the implementation of the conditions of this Licence.	COMPLY WITH BOARD DIRECTIVES
18.	The Licensee shall ensure signs are posted for all active Surveillance Network Program stations. All sign(s) shall be located and maintained to the satisfaction of an Inspector.	POST SURVEILLANCE NETWORK PROGRAM SIGN(S)
19.	The Licensee shall install, operate, and maintain meters, devices, or other such methods for measuring the volumes of Water used and Waste disposed of to the satisfaction of an Inspector.	MEASURE WATER USE AND WASTE DISCHARGED
20.	Beginning March 31, 2024, and no later than every March 31 thereafter, the Licensee shall submit an Annual Water Licence Report to the Board and an Inspector. The Report shall be in accordance with the requirements of Schedule 2, Condition 1.	ANNUAL WATER LICENCE REPORT
21.	The Licensee shall comply with the Engagement Plan, once approved.	ENGAGEMENT PLAN
22.	<p><u>Option 1:</u> Within 90 days following the effective date of this Licence, the Licensee shall submit to the Board, for approval, a revised Engagement Plan. The Licensee shall not commence Project activities prior to Board approval of the Plan.</p> <p>OR</p> <p><u>Option 2:</u> A minimum of 90 days prior to commencement of activities, the Licensee shall submit to the Board, for approval, a revised Engagement Plan. The Licensee shall not commence Project activities prior to Board approval of the Plan.</p>	ENGAGEMENT PLAN – REVISED
23.	A minimum of ten days prior to re-commencement of Project activities following a temporary shut-down period, the Licensee shall provide written notification to the Board and an Inspector. Notification shall include the commencement	NOTIFICATION – RE-COMMENCEMENT

	Condition	Condition Title
	date, and the name and contact information for the individual responsible for overseeing the Project. Written notification shall be provided to the Board and an Inspector if any changes occur.	
24.	The Licensee shall immediately provide written notification to the Board and an Inspector of any non-compliance with the conditions of this Licence.	NOTIFICATION – NON-COMPLIANCE WITH CONDITIONS
25.	The Licensee shall immediately provide written notification to the Board of any non-compliance with a Board directive issued in respect of the implementation of the conditions of this Licence.	NOTIFICATION – NON-COMPLIANCE WITH DIRECTIVES
26.	The Licensee shall ensure that a copy of any written authorization issued to the Licensee by an Inspector is provided to the Board.	COPY – WRITTEN AUTHORIZATION
27.	The Licensee shall submit a current Project schedule to the Board and an Inspector upon request.	SUBMIT CURRENT PROJECT SCHEDULE
Part C: Security		
1.	The Licensee shall post and maintain a security deposit with the Minister in accordance with Schedule 3, Condition 1 . The Licensee shall not commence activities until the security deposit has been accepted by the Minister.	POST SECURITY DEPOSIT
2.	Upon request of the Board, the Licensee shall submit an updated Closure Cost Estimate using the current version of RECLAIM or another method acceptable to the Board.	UPDATE CLOSURE COST ESTIMATE
3.	The amount of the security deposit required by Part C, Condition 1 (POST SECURITY DEPOSIT) may be adjusted by the Board: a) Based on an updated Closure Cost Estimate as per Part C, Condition 2 (UPDATE CLOSURE COST ESTIMATE); or b) Based on such other information as may become available to the Board.	ADJUSTED SECURITY AMOUNT
4.	If the amount of the security deposit is adjusted by the Board as per Part C, Condition 3 (ADJUSTED SECURITY AMOUNT), the Licensee shall post the adjusted amount with the Minister within the timeframe set by the Board. The Licensee shall not	POST ADJUSTED SECURITY AMOUNT

	Condition	Condition Title
	commence any new activities associated with a security adjustment until the additional security deposit has been accepted by the Minister.	
5.	Unless otherwise approved by the Board, the Licensee may not submit security adjustment requests except with any of the following submissions: a) Closure and Reclamation Plans; b) Closure and Reclamation Completion Reports; or c) Performance Assessment Reports.	SECURITY ADJUSTMENT REQUESTS
Part D: Water Use		
1.	The Licensee may use Wastewater that meets the Effluent Quality Criteria established in Part F, Condition 24 (EFFLUENT QUALITY CRITERIA) of this Licence as described in the approved Operations and Maintenance Plan .	WASTEWATER MEETS EQC - USE
2.	Wastewater that does not meet the Effluent Quality Criteria established in Part F, Condition 24 (EFFLUENT QUALITY CRITERIA) of this Licence may be reused within the Hydrocarbon Contaminated Soil Treatment Facility as described in the approved Operations and Maintenance Plan .	WASTEWATER EXCEEDS EQC - REUSE
Part E: Construction		
1.	The Licensee shall ensure that all structures intended to contain, withhold, divert, or retain Water or Waste are designed, constructed, and maintained to minimize the escape of Waste to the Receiving Environment.	OBJECTIVE – CONSTRUCTION
2.	The Licensee shall ensure that the Yellowknife Soil Treatment Facility is designed, constructed, maintained, monitored, and closed to meet or exceed the LWB/IWB/GNWT <i>Guideline for Design, Operation, Maintenance, and Closure of Petroleum Hydrocarbon-Contaminated Soil Treatment Facilities in the Northwest Territories</i> .	YELLOWKNIFE SOIL TREATMENT FACILITY – GENERAL
3.	The Licensee shall ensure that all Engineered Structures are constructed and maintained in accordance with the recommendations of the Professional Engineer responsible for the design, including, but not limited to, recommendations regarding field supervision and inspection requirements.	ENGINEERED STRUCTURES – GENERAL

	Condition	Condition Title
4.	The Licensee shall only use material that is clean and free of contaminants and has been authorized in writing by an Inspector.	CONSTRUCTION MATERIAL – SOURCE(S)
5.	The Licensee shall maintain records of Construction materials for all structures and make them available at the request of the Board or an Inspector.	CONSTRUCTION RECORDS
6.	A minimum of 90 days prior to the commencement of Construction of any Engineered Structures not previously approved by the Board, the Licensee shall submit to the Board, for approval, a Design and Construction Plan . The Plan shall be in accordance with the requirements of Schedule 4, Condition 1 . The Licensee shall not commence Construction of the Engineered Structure(s) prior to Board approval of the Plan.	DESIGN AND CONSTRUCTION PLAN
7.	A minimum of 90 days prior to the commencement of Construction of any Engineered Structures not previously approved by the Board, the Licensee shall submit to the Board, Design Drawings stamped and signed by a Professional Engineer. A minimum of 90 days prior to implementing any proposed changes to the Design Drawings, the Licensee shall submit revised Design Drawings to the Board.	DESIGN DRAWINGS
8.	A minimum of ten days prior to the commencement of Construction of any Engineered Structure(s), the Licensee shall provide written notification to the Board and an Inspector. Notification shall include the Construction commencement date, and the name and contact information for the individual responsible for overseeing Construction. Written notification shall be provided to the Board and an Inspector if any changes occur.	NOTIFICATION – CONSTRUCTION – ENGINEERED STRUCTURES
9.	A minimum of ten days prior to the commencement of Construction of any structure(s) intended to contain, withhold, divert, or retain Water or Wastes, the Licensee shall provide written notification to the Board and an Inspector. Notification shall include the Construction commencement date, and the name and contact information for the individual responsible for overseeing the Construction. Written notification shall be provided to the Board and an Inspector if any changes occur.	NOTIFICATION – CONSTRUCTION
10.	The Licensee shall ensure that all Engineered Structures are constructed in accordance with the Design Drawings and/or approved Design and Construction Plan(s) .	CONSTRUCT AS DESIGNED – ENGINEERED STRUCTURE(S)

	Condition	Condition Title
11.	<p>Within 90 days of the completion of the Construction of each Engineered Structure, the Licensee shall submit to the Board, an As-Built Report stamped and signed by a Professional Engineer, which shall include, but not be limited to, the following information:</p> <p>a) final as-built drawings of the Engineered Structure(s), stamped and signed by a Professional Engineer;</p> <p>b) documentation, with rationale, of field decisions that deviate from the Design and Construction Plans and/or Design Drawings; and</p> <p>c) any data used to support these decisions.</p>	AS-BUILT REPORT – ENGINEERED STRUCTURE(S)
Part F: Waste and Water Management		
1.	The Licensee shall manage Waste and Water with the objective of minimizing the impacts of the Project on the quantity and quality of Water in the Receiving Environment through the use of appropriate mitigation measures, monitoring, and follow-up actions.	OBJECTIVE – WASTE AND WATER MANAGEMENT
2.	The Licensee shall minimize erosion by implementing suitable erosion control measures that shall be located and maintained to the satisfaction of an Inspector.	EROSION CONTROL
Management and Monitoring Plans		
3.	The Licensee shall comply with the Waste Management Plan , once approved.	WASTE MANAGEMENT PLAN
4.	Within 90 days following the effective date of this Licence, the Licensee shall submit to the Board, for approval, a revised Waste Management Plan .	WASTE MANAGEMENT PLAN – REVISED
1.	The Licensee shall comply with the Operations and Maintenance Plan, once approved. The Plan shall be in accordance with the requirements of Schedule 5, Condition 1.	OPERATIONS AND MAINTENANCE PLAN
2.	Within 90 days following the effective date of this Licence, the Licensee shall submit to the Board, for approval, a revised Operations and Maintenance Plan. The Plan shall be in accordance with the requirements of Schedule X, Condition Y.	OPERATIONS AND MAINTENANCE PLAN – REVISED

	Condition	Condition Title
3.	The Licensee shall comply with the Groundwater Monitoring Plan , once approved. The Plan shall be in accordance with the requirements of Schedule 5, Condition 2 .	GROUNDWATER MONITORING PLAN
4.	Within 90 days following the effective date of this Licence, the Licensee shall submit to the Board, for approval, a revised Groundwater Monitoring Plan . The Plan shall be in accordance with the requirements of Schedule 5, Condition 2 .	GROUNDWATER MONITORING PLAN – REVISED
Operation of Structures and Facilities		
5.	<p>The Licensee shall construct, operate, and maintain the Yellowknife Soil Treatment Facility to the design specifications and engineering standards, such that:</p> <ul style="list-style-type: none"> a) Any constructed structures/facilities are maintained and operated so as to prevent structural failure and to the satisfaction of an Inspector; b) Any Seepage or Wastewater from the facility that does not meet Effluent Quality Criteria, as specified in Part F, Condition 24 (EFFLUENT QUALITY CRITERIA) shall be collected and returned to the Yellowknife Soil Treatment Facility; c) Any deterioration or erosion of constructed structures/facilities shall be reported immediately to an Inspector; d) Any deterioration or erosion of constructed structures/facilities that requires repair shall be reported to an Inspector and the Board, and repaired immediately; e) Monitoring of the facility is sufficient to ensure that: <ul style="list-style-type: none"> i. Performance design criteria, as described in the Design and Construction Plan Plan, referred to in Part E, Condition 6 are being met; and ii. Necessary changes in operation of the facility, including any additional mitigations, are identified. 	YELLOWKNIFE SOIL TREATMENT FACILITY
6.	The Licensee shall maintain a Freeboard limit of 0.3 metre at the Retention Pond, or as recommended by a Professional Engineer and as approved by the Board	FREEBOARD LIMIT
Inspection of Structures and Facilities		
7.	The Licensee shall conduct inspections of the Yellowknife Soil Treatment Facility monthly from April to September or as otherwise directed by an Inspector or the Board. Records of these inspections shall be made available to the Board or an Inspector upon request.	MONTHLY INSPECTION OF YELLOWKNIFE SOIL

	Condition	Condition Title
		TREATMENT FACILITY
8.	The Licensee shall conduct daily erosion inspections of Discharge locations during periods of Discharge, or more frequently as directed by an Inspector. Records of these inspections shall be made available to the Board or an Inspector upon request.	DAILY INSPECTIONS OF DISCHARGE LOCATIONS
Acceptance Criteria		
9.	The Licensee shall only accept soil that meets the criteria of Schedule 5, Condition 3.	SOIL CRITERIA - ACCEPTANCE
10.	The Licensee shall only accept Water and snow that meets the criteria of Schedule 5, Condition 4.	WATER AND SNOW CRITERIA - ACCEPTANCE
11.	The Licensee shall ensure that representative samples of soil for the purpose of acceptance meet the requirements of Schedule 5, Condition 5.	SOIL SAMPLE QUANTITY - ACCEPTANCE
12.	The Licensee shall ensure that any representative samples of snow and Water for the purpose of acceptance meet the requirements of Schedule 5, Condition 6.	SNOW AND WATER SAMPLE QUANTITY - ACCEPTANCE
13.	Prior to accepting soil, Water, and snow the Licensee shall submit analytical results as described in the approved Operation and Maintenance Plan, to an Inspector, unless otherwise authorized by an Inspector.	SUBMIT RESULTS - ACCEPTANCE
Soil Removal Criteria		
14.	Prior to removing treated soil from the Yellowknife Treatment Facility for reuse, the Licensee shall ensure the soil meets the remediation criteria in the most current version of the <i>Government of the Northwest Territories' Environmental Guideline for Contaminated Site Remediation.</i>	SOIL CRITERIA - REMOVAL

Condition	Condition Title																		
15. The Licensee shall ensure that representative samples of soil for the purpose of removal from the Yellowknife Soil Treatment Facility meet the requirements of Schedule 5, Condition 5.	SOIL SAMPLE QUANTITY - REMOVAL																		
Discharge and Disposal Locations and Rates																			
16. The Licensee shall dispose of all Waste as described in the approved Waste Management Plan.	ALL WASTE – WASTE MANAGEMENT PLAN																		
17. The Licensee shall discharge all Effluent from the Yellowknife Soil Treatment Facility to Quarry Sump as described in the approved Operations and Maintenance Plan.	EFFLUENT DISCHARGE – YELLOWKNIFE SOIL TREATMENT FACILITY																		
18. A minimum of ten days prior to disposing of any Waste into a licenced municipal facility, the Licensee shall provide written notification to the Board and an Inspector.	NOTIFICATION – WASTE DISPOSAL																		
19. The Licensee shall not dispose of Waste, including Wastewater, to any Watercourse, or to the ground surface within 100 metres of the Ordinary High-Water Mark of any Watercourse.	DISPOSAL LOCATION – ORDINARY HIGH-WATER MARK																		
Effluent Quality Criteria																			
20. The Licensee shall ensure that Wastewater from the Yellowknife Soil Treatment Facility at Surveillance Network Program station SNP 05-1 and 05-2 has a pH value between x and y and meets the following Effluent Quality Criteria (EQC):	EFFLUENT QUALITY CRITERIA																		
<table border="1"> <thead> <tr> <th rowspan="3">Parameter</th> <th colspan="3">EQC</th> </tr> <tr> <th colspan="2">mg/L</th> <th>mg</th> </tr> <tr> <th>Maximum Average Concentration</th> <th>Maximum Grab Concentration</th> <th>Annual Loading Limit</th> </tr> </thead> <tbody> <tr> <td> </td> <td> </td> <td> </td> <td> </td> </tr> <tr> <td> </td> <td> </td> <td> </td> <td> </td> </tr> </tbody> </table>	Parameter	EQC			mg/L		mg	Maximum Average Concentration	Maximum Grab Concentration	Annual Loading Limit									
Parameter		EQC																	
		mg/L		mg															
	Maximum Average Concentration	Maximum Grab Concentration	Annual Loading Limit																

Commented [HS1]: Board staff are soliciting input on the parameters and concentrations for EQC at SNP 05-1 and SNP 05-2.

In response to review comments on the Applications, KBL proposed updated EQC based on the Federal Interim Groundwater Quality Guidelines for Federal Contaminated Sites (FIGQG). See KBL response to MVLWB 15.

<https://new.onlinereviewssystem.ca/review/3BE995CC-7585-EE11-8925-0022483C4492>

	Condition	Condition Title
21.	The Licensee shall ensure that representative samples of Water for the purpose of removal from the Yellowknife Soil Treatment Facility meet the requirements of Schedule 5, Condition 6 .	WATER SAMPLE QUANTITY – REMOVAL
22.	<p>The Licensee shall submit Water quality data for samples collected from Surveillance Network Program station SNP 05-01 (Retention Pond) or the Above Ground Storage Tanks (SNP 05-2) to the Board and an Inspector as follows:</p> <p>a) A minimum of five days prior to commencing or resuming Discharge of Effluent to the Quarry Sump; and</p> <p>b) A minimum of five days prior to commencing or resuming Discharge of Effluent to Quarry Sump following an exceedance of the EQC specified in Part F, Condition 24 (EFFLUENT QUALITY CRITERIA).</p> <p>The Licensee shall not commence or resume the Discharge until the EQC are met and an Inspector has provided written authorization.</p>	TESTING BEFORE DISCHARGE – YELLOWKNIFE SOIL TREATMENT FACILITY
23.	<p>If Water quality data from any sample collected at Surveillance Network Program stations 05-1 or 05-2 exceeds the EQC specified in Part F, Condition 24 (EFFLUENT QUALITY CRITERIA), the Licensee shall:</p> <p>a) Cease the Discharge;</p> <p>b) Notify the Board and an Inspector immediately;</p> <p>c) Report the spill immediately in accordance with the Spill Contingency Plan referred to in Part H, Condition X;</p> <p>d) Comply with the approved Spill Contingency Plan referred to in Part F, Condition x; and</p> <p>e) Within 30 days of initially reporting the incident, or within a timeframe authorized by an Inspector, submit a detailed report on the occurrence, including a summary of corrective actions taken, to the Board and an Inspector.</p>	EFFLUENT QUALITY CRITERIA – EXCEEDANCE – YELLOWKNIFE SOIL TREATMENT FACILITY
Part G: Aquatic Effects Monitoring		
<i>Intentionally left blank.</i>		
Part H: Spill Contingency Planning		
1.	The Licensee shall ensure that Unauthorized Releases associated with the Project do not enter any Water.	OBJECTIVE – PREVENT WASTE INTO WATER

	Condition	Condition Title
2.	The Licensee shall comply with the Spill Contingency Plan , once approved.	SPILL CONTINGENCY PLAN
3.	Within 90 days following the effective date of this Licence, the Licensee shall submit to the Board, for approval, a revised Spill Contingency Plan .	SPILL CONTINGENCY PLAN – REVISED
4.	<p>If a spill or an Unauthorized Release occurs or is foreseeable, the Licensee shall:</p> <p>a) Implement the approved Spill Contingency Plan referred to in Part H, Condition x;</p> <p>b) Report it immediately using the NU-NT Spill Report Form by one of the following methods:</p> <ul style="list-style-type: none"> • Telephone: (867) 920-8130 • Fax: (867) 873-6924 • E-mail: spills@gov.nt.ca • Online: Spill Reporting and Tracking Database <p>c) Notify the Board and an Inspector immediately; and</p> <p>d) Within 30 days of initially reporting the incident, or within a timeframe authorized by an Inspector, submit a detailed report to the Board and an Inspector, including descriptions of causes, response actions, and any changes to procedures to prevent similar occurrences in the future. Written notification shall be provided to the Board and an Inspector if any changes occur.</p>	REPORT SPILLS
5.	The Licensee shall ensure that spill prevention infrastructure and spill response equipment is in place prior to commencement of the Project.	SPILL PREVENTION AND RESPONSE EQUIPMENT
6.	The Licensee shall restore all areas affected by spills and Unauthorized Releases to the satisfaction of an Inspector.	CLEAN UP SPILLS
7.	The Licensee shall not establish any fuel storage facilities or refueling stations, or store chemicals or Wastes within 100 metres of the Ordinary High-Water Mark of any Watercourse.	MATERIAL STORAGE – ORDINARY HIGH-WATER MARK

	Condition	Condition Title
Part I: Closure and Reclamation		
1.	Every three years following the previous approval, or as directed by the Board, the Licensee shall submit to the Board, for approval, a revised Closure and Reclamation Plan , in accordance with Schedule 6, Condition 1 .	CLOSURE AND RECLAMATION PLAN – REVISED
2.	Three years prior to the expiry date of this Licence, or a minimum of two years prior to the end of operations, whichever occurs first, the Licensee shall submit to the Board, for approval, a final Closure and Reclamation Plan , in accordance with Schedule 6, Condition 1 .	CLOSURE AND RECLAMATION PLAN – FINAL
3.	The Licensee shall endeavor to carry out approved Progressive Reclamation as soon as is reasonably practicable.	PROGRESSIVE RECLAMATION
4.	The Licensee shall not conduct Progressive Reclamation except as approved by the Board.	PROGRESSIVE RECLAMATION – CARRY OUT AS APPROVED
5.	Beginning March 31, 2024 and no later than every March 31 thereafter, the Licensee shall provide written notification to the Board and an Inspector of any approved Progressive Reclamation that will be conducted in the upcoming year. Notification shall include the name and contact information for the individual responsible for overseeing the Progressive Reclamation. Written notification shall be provided to the Board and an Inspector if any changes occur.	PROGRESSIVE RECLAMATION – NOTIFICATION
6.	Within 90 days of completing Closure and Reclamation of any specific component of the Project, the Licensee shall submit to the Board a Closure and Reclamation Completion Report . The Report shall be in accordance with the MVLWB/AANDC <i>Guidelines for the Closure and Reclamation of Advanced Mineral Exploration and Mine Sites in the Northwest Territories</i> .	CLOSURE AND RECLAMATION COMPLETION REPORT

Schedule 1: Surveillance Network Program (SNP)

Surveillance Network Station Descriptions and Sampling Requirements

1. SNP Station information is set out below. The location of each Station is approximate and subject to approval from an Inspector.
2. More frequent sample collection may be required at the request of an Inspector.
3. All sample collection, preservation, and analyses shall be conducted in accordance with methods prescribed in the current edition of American Public Health Association's (APHA) *Standard Methods for the Examination of Water and Wastewater* at the time of analysis, or by other such methods approved by an Analyst.
4. All analyses shall be performed in a laboratory accredited by the Canadian Association for Laboratory Accreditation (CALA) for the specific analyses to be performed or as approved by an Analyst.

SNP Station Quick Reference Guide

Station #	Description	Status
SNP 05-1	Water in Retention Pond	Active prior to discharge to Quarry Sump
SNP 05-2	Water in Above Ground Storage Tanks	Active prior to discharge to Quarry Sump
SNP 05-4	Groundwater around the Yellowknife Soil Treatment Facility	Active following spring freshet and before freeze-up
SNP 05-5	Groundwater around the Yellowknife Soil Treatment Facility	Active following spring freshet and before freeze-up
SNP 05-6	Groundwater around the Yellowknife Soil Treatment Facility	Active following spring freshet and before freeze-up
SNP 05-7	Groundwater around the Yellowknife Soil Treatment Facility	Active following spring freshet and before freeze-up

SNP Station 05-1 and 05-2

Description:	Water monitoring prior to Discharge
Location:	Within the Retention Pond and within the Above Ground Storage Tanks
Sampling Frequency:	Prior to discharge
Sampling Parameters:	<ul style="list-style-type: none"> • Field parameters¹ • Total Suspended Solids (TSS) • Oil and Grease • pH • Chemical Oxygen Demand (COD) • Total Petroleum Hydrocarbons (F1, F2, F3, F4 CCME Fractions) • Benzene, Toluene, Ethylbenzene, and Xylene (BTEX)

	<ul style="list-style-type: none"> • Polycyclic Aromatic Hydrocarbons (PAHs) • Polychlorinated Biphenyls (PCBs) • Total Phenols • Styrene • Total metals²
Rationale:	Site of compliance. To monitoring Effluent before discharge to Quarry Sump.
Status:	Active prior to Discharge

SNP Station 05-4, 05-5, 05-6, 05-7

Description:	Groundwater monitoring wells
Location:	As described in the approved Groundwater Monitoring Plan
Sampling Frequency:	Twice per year. Once following spring freshet, and again prior to freeze-up
Sampling Parameters:	<ul style="list-style-type: none"> • Field parameters¹ • Total Suspended Solids (TSS) • Oil and Grease • pH • COD • Total Petroleum Hydrocarbons (F1, F2, F3, F4 CCME Fractions) • BTEX • Dissolved metals²
Monitoring Parameters	<ul style="list-style-type: none"> • Depth of groundwater well (meters below ground) • Height of groundwater well (meters above ground) • Water elevation (meters below ground)
Rationale:	To monitor Groundwater quality around the Yellowknife Soil Treatment Facility
Status:	Active following spring freshet and before freeze-up

Notes

¹Field parameters shall include the following measurements:

pH	Temperature
Conductivity	Dissolved Oxygen

²By Inductively Coupled Plasma Metal Scan, and shall include, at a minimum, the following parameters:

Aluminum	Arsenic
Beryllium	Boron
Cadmium	Chromium
Cobalt	Copper
Iron	Lead
Manganese	Mercury
Molybdenum	Nickel
Selenium	Silver
Strontium	Vanadium
Zinc	

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Schedule 2: Annual Water Licence Report

	Condition
1.	The Annual Water Licence Report referred to in Part B, Condition X of this Licence shall include, but not be limited to, the following information about activities conducted during the previous calendar year:
	a) A brief summary of Project activities;
	b) An updated Project schedule;
	c) A map depicting the facility, including the biotreatment pad, Retention Pond, and Quarry Sump ;
	d) A summary of the calibration and status of the meters and devices referred to in Part B, Condition x (MEASURE WATER USE AND WASTE DISPOSAL) of this Licence;
	e) A summary of engagement activities conducted in accordance with the approved Engagement Plan , referred to in Part B, Condition x of this Licence;
	f) A summary of how Traditional Knowledge was incorporated into decision making;
	g) A summary of Construction activities conducted in accordance with Part E of this Licence;
	h) A summary of major maintenance activities conducted in accordance with this Licence;
	i) A summary of activities conducted in accordance with the approved Waste Management Plan , referred to in Part F, Condition x and the approved Operations and Maintenance Plan , required in Part F, Condition x of this Licence, including: <ul style="list-style-type: none"> i. A summary of approved updates or changes to the process or facilities required for the management of Waste; ii. A summary of how contaminated soil and water were managed during the previous calendar year, including relevant operational details and dates of treatment; iii. A summary of material accepted into the facility, including: <ul style="list-style-type: none"> a. Quantity from each source, in cubic meters, of soil, water, and snow; b. Sources of each material; c. Analytical results for each material accepted; d. Calculated monthly and annual quantities, in cubic meters, of all soil, water, and snow; iv. A summary of material removed from the facility, including: <ul style="list-style-type: none"> a. Quantity of successfully treated soil in cubic meters; b. Analytical results of successfully treated soil; c. Identification of the site which received successfully treated soil; d. Annual quantity of soil, in cubic meters, sent for disposal;

Condition	
	<ul style="list-style-type: none"> e. Quantity of Effluent, for each discharge event by location, discharged to the Quarry Sump; f. Monthly and annual quantities, in cubic metres, of all Effluent discharged to the Quarry Sump; g. Annual quantities of water, in cubic meters, sent for disposal h. Monthly and annual quantities of precipitated solids removed from the Retention Pond; i. Types of Hazardous Waste generated and removed; j. Annual quantity of each Hazardous Waste generated and removed. v. Record of inspections of the facility.
	<p>j) A summary of activities conducted in accordance with the approved Groundwater Monitoring Plan, referred to in Part F, Condition x of this Licence, including:</p> <ul style="list-style-type: none"> i. A summary of approved updates or changes to the Plan ii. A list of any Action Level exceedances; and iii. A description of actions taken in response to any Action level exceedances.
	<p>k) A summary of the results and any actions taken as a result of the following inspections:</p> <ul style="list-style-type: none"> i. Inspections conducted to fulfill Part F of this Licence; and ii. Inspections conducted under the Operations and Maintenance Plan, required under Part F of this Licence;
	<p>l) A summary of activities conducted in accordance with the approved Spill Contingency Plan, referred to in Part H, Condition x of this Licence, including:</p> <ul style="list-style-type: none"> i. A list and description for all Spills and Unauthorized Releases, including the date, NWT spill number, volume, location, summary of the circumstances and follow-up actions taken, and status (i.e., open or closed), in accordance with the reporting requirements in Part H, Condition X of this Licence; and ii. An outline of any spill training carried out.
	<p>m) A summary of activities conducted in accordance with the Closure and Reclamation Plan, referred to in Part I, Condition x of this Licence, including:</p> <ul style="list-style-type: none"> i. Details of any Progressive Reclamation undertaken; ii. A discussion on whether there are any changes to the closure schedule; iv. A summary of engagement conducted regarding Closure and Reclamation; v. A list of any factors that would increase or decrease the Closure Cost Estimate the next time the Estimate is updated.

Condition	
	<p>n) Information generated under the SNP in Schedule 1 of this Licence, including:</p> <ul style="list-style-type: none"> i. Electronic and tabular summaries of all data and information generated under Schedule 1 of this Licence for the month being reported, with comparisons to Effluent Quality Criteria, including water licence criteria, rationale for SNP stations where samples were not collected and results and interpretation of quality assurance/quality control procedures; ii. Graphical summaries and interpretation of the analytical results from the SNP samples collected at the points of compliance compared to the Effluent Quality Criteria under Part F of this Licence, for the previous three (3) consecutive years; iii. Discussion on data trends for the graphical summaries presented in n) ii. above; iv. An explanation of any actions taken in response to any exceedances of the Effluent Quality Criteria; v. Inferred groundwater flow direction; and vi. A tabular summary of cumulative water use vii. Information regarding the calibration and status of the meters and devices referred to in Part B, Condition x of this Licence; viii. Coordinates of all SNP stations which were established within the year being reported, including an updated map identifying the locations of all the SNP stations; and ix. A copy of all data in Excel format.
	<p>o) A list of any non-compliance(s) with the conditions of this Licence or any directive from the Board pursuant to the conditions of this Licence;</p>
	<p>p) A summary of actions taken to address concerns, non-conformances, or deficiencies in any reports filed by an Inspector; and</p>
	<p>q) Any other details requested by the Board by October 31, 2023 of the year being reported.</p>

Schedule 3: Conditions Applying to Security

	Condition
1.	The amount of security referred to in Part C, Condition X (POST SECURITY DEPOSIT), shall total \$, as per the following schedule: a) Following issuance of this Licence, \$; and b) 60 days prior to the commencement of Construction of the additional Biotreatment Pad, an additional \$.

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Schedule 4: Conditions Applying to Construction

	Condition
1.	The Design and Construction Plans referred to in Part E, Condition X shall include, but not be limited to, the following:
	<p>a) Information regarding the design of the facilities:</p> <ul style="list-style-type: none"> i. A description of the facilities to be constructed; ii. The proposed location(s) of the facilities, with GPS coordinates and a map to scale; iii. Relevant background information for the area beneath the footprint of the facilities, as deemed adequate by the Professional Engineer responsible for the design, including: <ul style="list-style-type: none"> a. the results and data from geotechnical and geochemical investigations; hydrogeological investigations; and programs to characterize soil, rock, Groundwater, ground ice, and ground temperature conditions to the depth expected to be affected by the facilities; and b. any other relevant information. iv. A design alternatives analysis; v. Design specifications and performance parameters; vi. Stability analyses; vii. A description of how the design has been optimized for Closure and Reclamation; viii. A description of how climate change projections and considerations have been incorporated into the design; ix. A description of any instrumentation that will be installed as part of the facilities, including locations and rationale; and x. A description of any operations and maintenance requirements associated with the design of the facilities.
	<p>b) Information regarding the Construction of the facilities:</p> <ul style="list-style-type: none"> i. A Construction schedule, including sequencing information; ii. A description of the materials required for Construction, including, but not limited to: <ul style="list-style-type: none"> a. sources; b. quantities; c. physical characteristics; and d. geochemical characteristics. iii. A description of any potential effects on the Receiving Environment associated with Construction of the facilities; and iv. A description of any mitigation measures that will be undertaken to minimize the potential impacts identified above.

	Condition
	<p>c) Information regarding monitoring during Construction [and operation], including:</p> <ul style="list-style-type: none"> i. A description of any monitoring that will be conducted to detect potential impacts to the Receiving Environment and evaluate the effectiveness of the mitigation measures described above, including, but not limited to: <ul style="list-style-type: none"> a. locations; b. parameters; c. frequencies; and d. rationale. ii. Linkages to other monitoring programs required in this Licence
	<p>d) Information regarding responses to monitoring results during Construction, including:</p> <ul style="list-style-type: none"> i. Definitions, with rationale, for Action Levels applicable to the performance of the mitigation measures; and ii. For each Action Level, a description of how exceedances of the Action Level will be assessed and, generally, which types of actions may be taken by the Licensee if the Action Level is exceeded.
	<p>e) A Quality Control Plan stamped by a Professional Engineer, a component of which includes a plan for a Professional Engineer to supervise and field check Construction activities.</p>

Schedule 5: Conditions Applying to Waste and Water Management

	Condition
1.	The Operations and Maintenance Plan referred to in Part F, Condition X of this Licence shall include, but not be limited to, the following:
	<p>a) Information regarding the facilities and operations, including:</p> <ul style="list-style-type: none"> i. A description of the Yellowknife Soil Treatment Facility and associated infrastructure; ii. A description of the operation of the Yellowknife Soil Treatment Facility; iii. A description of the maintenance procedures for the Yellowknife Soil Treatment Facility; and iv. A description of how climate change will be considered as part of ongoing operations. v. A description of soil acceptance procedures; vi. A description of soil management, including parameters, treatment standards, methods of treatment, frequency of treatment, and any soil augmentation to promote treatment; vii. A description of soil removal procedures; viii. A description of water acceptance procedures; ix. A description of snow acceptance procedures; x. A description of water management, including parameters, treatment standards, methods of treatment, Effluent discharge procedures, Effluent discharge locations, and wastewater reuse; xi. A description of soil and water sampling QA/QC; xii. An inspection schedule; and xiii. A description of inspection documentation and reporting.
	<p>b) Information regarding surveillance and monitoring, including:</p> <ul style="list-style-type: none"> i. A description of the surveillance procedures and schedules for the Yellowknife Soil Treatment; ii. Details of the monitoring, including rationale, that will be undertaken for Yellowknife Soil Treatment Facility, including: <ul style="list-style-type: none"> a. monitoring locations, parameters, frequencies, methods, and types of instrumentation; b. a map to scale, with monitoring locations; and iii. Linkages to other monitoring programs and inspections required under this Licence.
	<p>c) Information regarding responses to monitoring, including:</p>

	Condition
	<ul style="list-style-type: none"> i. A description of how the Licensee will link the results of monitoring to those corrective actions necessary to ensure that the objectives listed in Part F, Condition 1 are met. This description shall include: <ul style="list-style-type: none"> a. Definitions, with rationale, for Action Levels applicable to the performance of the Yellowknife Soil Treatment Facility; and b. For each Action Level, a description of how exceedances of the Action Level will be assessed and, generally, which types of actions will be taken for the Action Levels exceeded.
	<ul style="list-style-type: none"> d) Information regarding contingency planning, including: <ul style="list-style-type: none"> i. A description of reasonably foreseeable scenarios; and ii. For each scenario identified in (d)(i) above: <ul style="list-style-type: none"> a. A description of response action options; and b. A risk-based analysis of response action options, identifying preferred options and alternate options.
2.	<p>The Groundwater Monitoring Plan, referred to in Part F, Condition X of this Licence shall include, but not be limited to, the following information:</p>
	<ul style="list-style-type: none"> a) Information regarding Groundwater conditions: <ul style="list-style-type: none"> i. A description of the underlying and surrounding hydrogeology, including appropriate maps and flow diagrams, as assessed by a hydrologist, hydrogeologist, or equivalent professional; and ii. A summary of baseline data including: <ul style="list-style-type: none"> a. Baseline data collected to date; b. Identification of baseline data gaps; and c. A description of methods for filling in baseline data gaps or methods for approximating baseline conditions if necessary.
	<ul style="list-style-type: none"> b) Information regarding monitoring: <ul style="list-style-type: none"> i. Identification, with rationale, of parameters of concern that should be used as indicators of potential impacts from Project-related activities on Receiving Environment; ii. A description, including detailed rationale, of the site-specific Groundwater monitoring activities required to identify Project-related impacts on Groundwater quality and quantity; iii. The location and purpose, with rationale, of all existing and proposed Groundwater monitoring stations, including a map, as provided by Professional Engineer, hydrologist, hydrogeologist, or equivalent professional;

Condition																					
	<ul style="list-style-type: none"> iv. A description of monitoring protocols, methodologies, parameters, and frequencies specific to each type of monitoring identified in item (b)(i) above; and v. A description of the quality assurance and quality control measures followed for each monitoring type; vi. Linkages to other monitoring programs required under this Licence; and vii. Any other information about the monitoring that will be performed to meet the objectives in Part F, Condition 1. 																				
	<p>c) Information regarding responses to monitoring results:</p> <ul style="list-style-type: none"> i. A description of how the results of Groundwater monitoring will be compared to quantity and quality predictions, and used to update predictions as required; ii. A description of how the Licensee will link the results of monitoring to those corrective actions necessary to ensure that the objectives listed in Part F, Condition 1 are met. This description shall include: <ul style="list-style-type: none"> a. Definitions, with rationale, for Action Levels applicable to groundwater quality and quantity; and b. For each Action Level, a description of how exceedances of the Action Level will be assessed and generally, which types of actions will be taken for the Action Level exceeded. 																				
3.	As per Part F Condition 13 YELLOWKNIFE SOIL TREATMENT FACILITIES – SOIL ACCEPTANCE CRITERIA of this Licence, all soil accepted into the Yellowknife Soil Treatment Facilities shall meet the following criteria:																				
	<table border="1" style="margin-left: auto; margin-right: auto;"> <thead> <tr> <th style="text-align: center;">Parameter</th> <th style="text-align: center;">Soil Maximum Grab pH Units</th> </tr> </thead> <tbody> <tr> <td style="text-align: center;">pH</td> <td style="text-align: center;">Between 6 to 8</td> </tr> <tr> <th style="text-align: center;">Parameter</th> <th style="text-align: center;">Soil Maximum Grab Concentration (mg/kg)</th> </tr> <tr> <td style="text-align: center;">Antimony</td> <td style="text-align: center;">40</td> </tr> <tr> <td style="text-align: center;">Arsenic (inorganic)</td> <td style="text-align: center;">340</td> </tr> <tr> <td style="text-align: center;">Barium</td> <td style="text-align: center;">2000</td> </tr> <tr> <td style="text-align: center;">Beryllium</td> <td style="text-align: center;">8</td> </tr> <tr> <td style="text-align: center;">Cadmium</td> <td style="text-align: center;">22</td> </tr> <tr> <td style="text-align: center;">Chromium (total)</td> <td style="text-align: center;">87</td> </tr> <tr> <td style="text-align: center;">Cobalt</td> <td style="text-align: center;">300</td> </tr> </tbody> </table>	Parameter	Soil Maximum Grab pH Units	pH	Between 6 to 8	Parameter	Soil Maximum Grab Concentration (mg/kg)	Antimony	40	Arsenic (inorganic)	340	Barium	2000	Beryllium	8	Cadmium	22	Chromium (total)	87	Cobalt	300
Parameter	Soil Maximum Grab pH Units																				
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Cadmium	22																				
Chromium (total)	87																				
Cobalt	300																				

		Condition															
		Copper	91														
		Lead	600														
		Mercury	50														
		Molybdenum	40														
		Nickel	89														
		Selenium	2.9														
		Silver	40														
		Thallium	1														
		Tin	300														
		Uranium	300														
		Vanadium	130														
		Zinc	360														
		F1 (C6 - C10)	<3% dry weight														
		F2 (>C10 - C16)	<3% dry weight														
		F3 (>C16 - C34)	<3% dry weight														
		F4 (>C34)	<3% dry weight														
4.	As per Part F Condition 13 YELLOWKNIFE SOIL TREATMENT FACILITIES – WATER AND SNOW ACCEPTANCE CRITERIA of this Licence, all water and snow accepted into the Yellowknife Soil Treatment Facilities shall meet the following criteria:																
		<table border="1"> <thead> <tr> <th>Parameter</th> <th>Snow and Water Maximum Grab pH Units</th> </tr> </thead> <tbody> <tr> <td>pH</td> <td>Between 6 to 8</td> </tr> <tr> <th>Parameter</th> <th>Snow and Water Maximum Grab Concentration (mg/kg)</th> </tr> <tr> <td>F1 (C6 - C10)</td> <td>No Free Phase Hydrocarbon Product</td> </tr> <tr> <td>F2 (>C10 - C16)</td> <td>No Free Phase Hydrocarbon Product</td> </tr> <tr> <td>F3 (>C16 - C34)</td> <td>No Free Phase Hydrocarbon Product</td> </tr> <tr> <td>F4 (>C34)</td> <td>No Free Phase Hydrocarbon Product</td> </tr> </tbody> </table>		Parameter	Snow and Water Maximum Grab pH Units	pH	Between 6 to 8	Parameter	Snow and Water Maximum Grab Concentration (mg/kg)	F1 (C6 - C10)	No Free Phase Hydrocarbon Product	F2 (>C10 - C16)	No Free Phase Hydrocarbon Product	F3 (>C16 - C34)	No Free Phase Hydrocarbon Product	F4 (>C34)	No Free Phase Hydrocarbon Product
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F3 (>C16 - C34)	No Free Phase Hydrocarbon Product																
F4 (>C34)	No Free Phase Hydrocarbon Product																

Condition			
5.	As per Part F Condition 16 of this Licence, all soil accepted or removed from the Yellowknife Soil Treatment Facilities shall meet the following criteria:		
		Soil Volume (m3)	Sample Quantity
		1-50	1
		51-100	2
		101-1,000	3
		1,001 – 2,000	4
		2,001 – 4,000	5
6.	As per Part F Condition 16 of this Licence, all snow and Water accepted or removed from the Yellowknife Soil Treatment Facilities shall meet the following criteria:		
		Snow or Water Volume (m3)	Sample Quantity
		1-50	1
		51-275	2

Schedule 6: Conditions Applying to Closure and Reclamation

	Condition
1.	The Closure and Reclamation Plan referred to in Part I, Condition x of this Licence shall include, but not be limited to the following information:
	a) A plain language summary of the Plan;
	b) A description of the overall goals for Closure and Reclamation of the Project, including expected future land use;
	c) A description of engagement related to Closure and Reclamation planning, including a summary of completed and planned engagement, and links to the Engagement Plan referred to in Part B, Condition x for the Project;
	d) A description of the Project, including, but not limited to: <ul style="list-style-type: none"> i. site history; ii. Project development; iii. current status of the Project; iv. map of the Project identifying all aspects of the facility; and v. photographs.
	e) A description of each Project component, including, but not limited to: <ul style="list-style-type: none"> i. biotreatment pads; ii. Water Retention Ponds; iii. Quarry Sump; iv. infrastructure, including above ground storage tank and storage shed; ii. areas affected by spills or Unauthorized Releases; and iii. any other areas affected by Project activities.
	f) A description of any planned Progressive Reclamation;
	g) A description of Closure and Reclamation plans, including, but not limited to: <ul style="list-style-type: none"> i. Closure Objectives and Criteria for soil beneath the facility and groundwater; ii. how the components identified in f) above and any areas affected by the project will be closed and reclaimed;

	Condition
	<ul style="list-style-type: none"> iii. a schedule, including sequencing, for the closure and reclamation of components identified in f) above and any areas affected by the project; iv. how any accumulated water within the biotreatment pad and Retention Pond will be managed as part of closure and reclamation; v. future land use of the site; vi. post-closure monitoring, maintenance, and reporting; and vii. uncertainties and contingencies.
	<ul style="list-style-type: none"> h) A plan for Temporary Closure, including, but not limited to the following information: <ul style="list-style-type: none"> i. Temporary Closure goals and objectives; ii. a description of activities and methods; iii. a description of monitoring, maintenance, and reporting; iv. contingencies; and v. an implementation schedule.

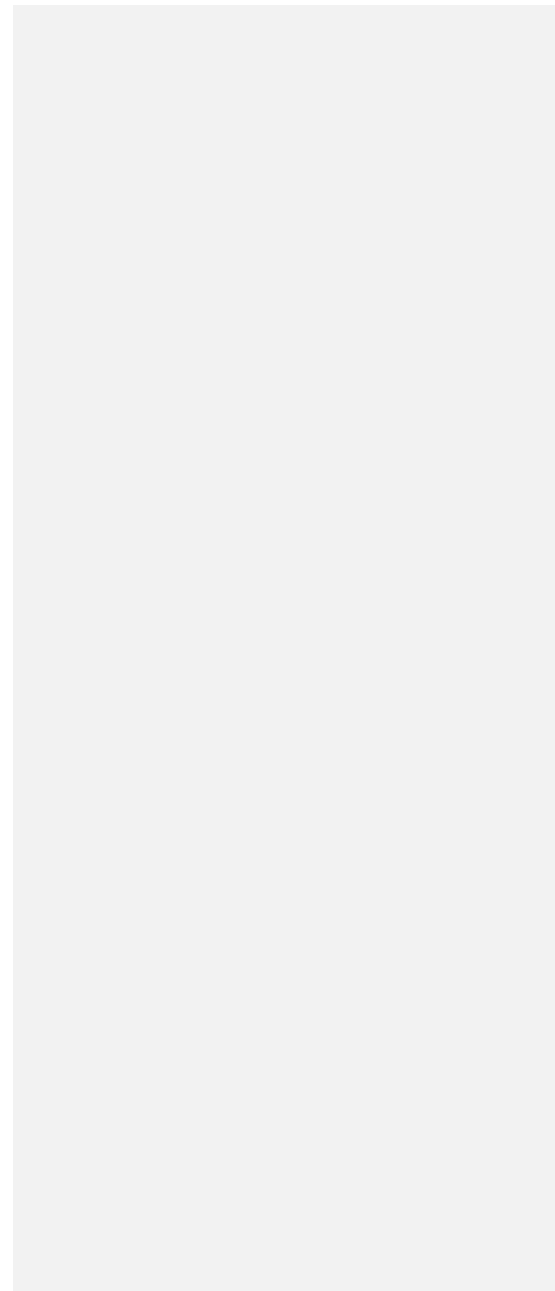
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Signed on behalf of the **[Enter Name of BOARD]**

[Enter NAME of Chair], Chair

[Enter NAME of Witness], Witness

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Attachments

Attachment A – Concordance Table of Items Requiring Submission

The table below summarizes the items the Licensee is required to submit as per the Licence conditions. In the event of a discrepancy between this table and the Licence conditions, the Licence conditions shall prevail.

Condition Location	Item	Date
Part X, Condition Y	[name of report, plan, notification, etc.]	[due date]

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Attachment B – Revision History Table

The table below summarizes revisions made to the Licence since its effective date (as set out on the Cover Page).

Date	Location of Change	Description of Change
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