Appendix G: Updated Monitoring and Management Plans

APPENDIX G.5: QA/QC PLAN

AGNICO EAGLE

HOPE BAY PROJECT

Quality Assurance and Quality Control Plan

MARCH 2024

VERSION 14

DOCUMENT CONTROL

Revision #	Date	Section	Changes Summary	Author
0	Feb 2002	Original	Original Document	MHBL
1	Mar 2004	Throughout	Review	MHBL
2	Oct 2007	Throughout	Review to include NWB specific concerns	MHBL
3	Mar 2008	Throughout	Review to include changes	HBML
4	Feb 2009	Throughout	Annual Review	HBML
5	Jan 2011	Throughout	Annual Review	HBML
6	Jun 2011	Throughout	Added ST-6a and b, ST-11 to the required sampling stations; added ST-1, ST-2, ST-4, and ST-6a and b to the current sample stations; incorporated 2BE-HOP0712 and 2BB- BOS0712 within the document	HBML
7	Jun 2012	Throughout	Added ash characterization sampling, waste oil sampling, flow meter calibration and equipment blanks. Updated photos and samples lists to reflect camp status.	HBML
8	Nov 2012	Throughout	Minor edits, updated licence numbers. No technical content changes.	HBML
9	Jan 2017	Throughout	Updated to TMAC ownership and format; revision to section regarding soil sampling to expand beyond sampling hydrocarbon contaminated soils. Included subsequent Modules A, B and C to provide details for each site and the associated water licence.	TMAC
10	Mar 2019	Section 1.3 Section 1.4 Section 5 Section 6 Appendix D through F Module A, C, D and E	Revised Table 1-2 reference to management plans. Updated Roles and Responsibilities. Included Maxxam and Nautilus Labs in Section 5. Update to Section 6 with change from EQWin to MonitorPro database management software. Update to Appendix D (ALS CALA Certificates and Scope). Addition of Appendix E and F (Maxxam and Nautilus Labs CALA Certificates and Scope). Updated SNP Stations and Conformity tables in Modules A and C for amended 2AM-DOH1335 and renewed 2BB-BOS1727 licences. Added Modules D and E for 2BB-MAE1727 and 2AM-BOS1835.	TMAC

Revision #	Date	Section	Changes Summary	Author
11	Mar 2020	Section 1.3 Section 1.4 Section 2.1 Section 5 Section 6 Appendix B Appendix C Appendix D Appendix E Appendix F Module A Module B	Revised Table 1-2 reference to management plans. Updated Roles and Responsibilities. Additional of sampling Final Discharge Point as outlined in the Metal & Diamond Mining Regulations. Addition of reporting required under the Metal & Diamond Mining Regulations. Addition of Bureau Veritas Canada Inc. (formally Maxxam Analytics) in Section 5. Updated bottle/preservative requirements in Appendix B. Updated ALS QC Protocols in Appendix C. Updated ALS CALA Certificate/Scope for Vancouver and Yellowknife laboratories in Appendix D. Updated Bureau Veritas CALA Certificate/Scope in Appendix E. Updated Nautilus Environmental CALA Certificate in Appendix F. Updated sample location figures in Module A and Module B.	
12	Mar 2021	Throughout	Updated to Agnico Eagle Mines Ltd ownership and format. Updated Roles and Responsibilities. Updated Bureau Veritas SCC Certificate and Scope	Agnico Eagle
13	Mar 2022	Throughout	Update to ALS-Vancouver CALA certificate and removal of ALS – Yellowknife's certifications Update to SNP sampling station testing requirements	Agnico Eagle
14	Mar 2024	Throughout	Update to support 2022 NWB/NIRB Annual Report Comment Responses – added all sample location coordinates into Modules A through E respectively and updated laboratory accreditation certificates.	Agnico Eagle Permitting Department

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GLOSSARY

Term	Definition
Agnico Eagle	Agnico Eagle Mines Limited
Accuracy	A measure of the closeness of the analytical result to the true value
ALS	ALS Environmental Laboratories
CCME	Canadian Council of Ministers of the Environment
Composite Sample	Obtained by combining portions of multiple grab samples or by using specially designed automatic sampling devices. Provide a more representative sampling of heterogeneous matrices in which the concentration of the analytes of interest may vary over short periods of time and/or space
Grab Sample	An undiluted quantity of material collected at a particular time and place that may be representative of the total substance being sampled at the time and place it was collected
INAC	Indigenous and Northern Affairs Canada
NWB	Nunavut Water Board
Precision	A measure of the closeness with which multiple analyses of a given sample agree with each other
Quality Assurance (QA)	The system of activities designed to better ensure that quality control is done effectively
Quality Control (QC)	The use of established procedures to achieve standards of measurement for the three principal components of quality: precision, accuracy and reliability
Reliability	A measure of the frequency at which the standards of precision and accuracy are achieved

1.0 Introduction

This Hope Bay Quality Assurance and Quality Control Plan (the Plan) has been prepared by Agnico Eagle Mines Limited (Agnico Eagle) in accordance with various water licences held by Agnico Eagle associated with developments throughout the Hope Bay region.

The Plan is intended primarily for use by Agnico Eagle and its contractors to ensure that best practices with respect to conducting environmental sampling, analysis and reporting are followed, and that the conditions of water licences and associated regulations are met.

This Plan is structured in a manner such that one document pertaining to quality assurance and quality control is approved and implemented across all Agnico Eagle Hope Bay project sites, while still addressing site- and licence-specific needs: the main document outlines Agnico Eagle's approach to conducting environmental sampling, analysis and reporting as it pertains to all Agnico Eagle Hope Bay developments; subsequent modules provide details for each site and the associated water licence. In the event of a new water licence, or an existing licence amendment, only the specific modules pertaining to that licence and site will need to be revised. This is intended for consistency and efficiency across operations and for compliance management.

1.1 Overview

The main objective of this Plan is to outline a set of operating principles that, if strictly followed during sample collection and analysis, will produce data of known and legally defensible quality. Consistent with Agnico Eagle's intent to be a responsible operator, the following objectives will be applied to achieve a high level of quality assurance:

- Provide standard procedures for sample collection, preservation, documentation and transportation, to achieve precision, accuracy and reliability in data quality;
- Ensure personnel involved in sampling and analysis are trained and competent;
- Utilize high quality laboratory supplies and sampling equipment that are reliable and maintained in good working condition;
- Ensure that all chemical analyses are conducted at a certified external laboratory;
- Describe a standard process for managing analytical data results and completing internal and external reporting;
- Establish and review Data Quality Objectives (DQOs) to ensure that data required for environmental management is available;
- Implement quality control programs, based on recognized best operating practices, to assess the quality of analytical data, provide warning of unacceptable analytical or sample errors, and initiate prompt remedial action when deficiencies are identified;
- Apply these principals to all environmental samples, whether analyzed for the purpose of regulatory compliance monitoring, or for the purpose of internal environmental management.

1.2 Relevant Legislation and Guidance

Table 1-1 provides a summary of federal and territorial regulations governing this Plan and associated guidelines. Additional regulations and standards govern other Agnico Eagle plans which are implemented in conjunction with this Plan.

Table 1-1. List of federal and territorial regulations governing the Quality Assurance and Quality Control Plan

Regulation	Year	Governing Body	Relevance
Quality Assurance and Quality Control Guidelines For Use by Class "A" Licensees	1996	INAC Water Resources Division	Describes information to be included in the development of a QA/QC Plan
Standard Methods for the Examination of Water and Wastewater	1999		Provides procedures and methods of analysis for examination of water quality
Guidance Manual on Sampling, Analysis and Data Management for Contaminated Sites Volume I	1993	CCME	Technical support document which provides approach to sampling, analysis and data management.

1.1 Related Documents

The documents listed in Table 1-2 are expected to be referenced and utilized in conjunction with the QA/QC Plan.

Table 1-2. List of documents related to the Quality Assurance and Quality Control Plan

Document Title	Relevance
Hope Bay Project Aquatic Effects Monitoring Plan	Describes the monitoring schedule, sampling methods, analysis and determination of environmental effects, and the quality assurance and quality control procedures to be conducted in aquatic environments.
Hope Bay Project Doris-Madrid Water Management Plan	Describes effluent discharge quality, monitoring programs and sampling locations associated with water management at Doris and Madrid.
Hope Bay Project Boston Water Management Plan	Describes effluent discharge quality, monitoring programs and sampling locations associated with water management at Boston.
Hope Bay Project Groundwater Management Plan	Describes monitoring schedule and analysis procedures associated with monitoring of mine groundwater.
Hope Bay Project Incinerator and Composter Waste Management Plan	Describes characterization sampling of incinerator bottom ash.
Hope Bay Project Hydrocarbon Contaminated Material Management Plan	Describes sampling of soil and effluent placed in the Landfarm facility. Outlines remediation criteria for hydrocarbon contaminated soil.
Hope Bay Project Hazardous Waste Management Plan	Describes waste oil and bottom ash characterization sampling.

Document Title	Relevance
Hope Bay Project Waste Rock, Ore and Backfill Management Plan	Describes environmental monitoring required in pollution control ponds and seep sampling programs.
Hope Bay Project, Phase 2 Doris Tailings Impoundment Area – Operations, Maintenance and Surveillance Manual	Describes sample schedule, documentation and reporting required for confirmatory monitoring of tailings geochemical characterization and thermal monitoring of infrastructure associated with the TIA.
Hope Bay Project Boston Tailings Management Area – Operations, Maintenance and Surveillance Manual	Describes sample schedule, documentation and reporting required for confirmatory monitoring of tailings geochemical characterization and thermal monitoring of infrastructure associated with the TMA.

1.2 Plan Management

In accordance with the requirements of the General Conditions (Part B) of the applicable water licences, this plan will be immediately implemented following its submission, subject to any modifications proposed by the NWB as a result of the review and approval process.

This plan will be reviewed annually and updated as necessary. Personnel responsible for implementing and updating the QA/QC Plan are identified in Table 1-3.

Table 1-3. Roles and Responsibilities

Role	Responsibility
VP Environmental Affairs	Overall responsibility for and implementation of this management plan; Provide the on-site resources to operate and maintain environmental sampling in accordance with this plan.
Environmental Superintendent	Review and update this plan as required; Ensure Environmental staff are trained in monitoring and quality assurance and quality control procedures; Support implementation of this management plan.
Environmental Supervisor/Coordinator	Provide training and support to environmental staff on the procedures contained in this plan; Ensure that required sampling is carried out in accordance with this plan and licence/permit requirements; Conduct regular inspections of the monitoring stations and audits of the maintenance records; Manage analytical data in accordance with this plan; Assess whether samples have met applicable regulatory standards and guidelines; Ensure sampling gear is in good working order and calibrated; Prepare and submit compliance reports to regulatory agencies.

2 Sample Collection in the Field

Environmental sampling is conducted to provide information required by Agnico Eagle for effective environmental management of the site, to provide information on follow-up monitoring of previous spill sites, and to monitor regulatory compliance. It is necessary to ensure sample integrity is maintained for all samples collected whether for regulatory compliance or internal management decisions.

2.0 Sample Locations

The Surveillance Network Program (SNP) is required by each water licence. The SNP defines a specific water-sampling program for the site, including sampling locations, sampling frequency and analytical parameters.

The SNP samples must always be taken at the same location and these sampling stations must be clearly identified in the field by posted signs. The location of signs and the precise location of sampling will be approved by the designated Inspector for the site. Sampling locations will be relocated as required by the water use permits or as recommended by the designated site Inspector. The appended modules provide information on the SNP stations to be monitored for each of the water licence areas.

Additional sampling sites will be added on an as needed basis in response to regulatory requirements or an identified internal monitoring need. These include samples at Final Discharge Points required under the Metal & Diamond Mining Effluent Regulations, samples taken under ice to compare water quality before and after a drilling effort, sites of new or previous petroleum product or chemical spills, and spring runoffs associated with construction activities. GPS coordinates of all sampling sites will be recorded using a handheld GPS and maintained on file.

2.1 Sample Types

Different sample types, such as composites or grabs, can be collected at various sampling locations. Water and liquid effluent samples (ie., natural lakes, streams, treatment ponds, process streams, sumps, effluent discharges) will generally be grab samples. Solid material samples (i.e., soil, ash, tailings solids) will usually be composite samples, although the purpose of the sampling program will dictate whether grab samples or composite samples will be used (i.e., characterization, delineation). For example, monitoring of the remediation levels in the land treatment area will usually require a composite sample within a homogenized area. Sampling hydrocarbon contaminated sites may require grab samples from various locations within the area to delineate a zone of contamination.

2.2 Sample Bottles

The laboratory analytical method and the parameter of interest will dictate the size and type of bottle (i.e., glass, plastic, amber glass) to be used for the sample. All sample bottles will be prepared and supplied by the contracted laboratory. Only clean unused bottles will be used to collect all samples to limit field generated contamination or preservation errors. If there is a need for bacterial testing, the bottles must

be autoclaved (sterilized) by the contracted laboratory prior to use. New powder-free nitrile gloves will be worn at all times when handling sample bottles.

Some sampling bottle types require rinsing with the water to be sampled prior to collecting the sample. The contracted laboratory can provide instruction for the type of bottle and the rinsing requirements for each analytical parameter. If the sample bottle requires rinsing, the sample bottle should be partially filled with the water to be sampled and rinsed with the cap in place three times. Rinse water will be emptied away from the sampling point so that surface water is not contaminated and sediments are not disturbed. As a general rule:

- Plastic bottles require triple rinsing
- Glass bottles should not be triple rinsed because hydrocarbons can adsorb to the glass surface and increase sample concentrations during the rinsing process
- Sample bottles that are pre-charged with preservative must not be rinsed to prevent loss of the sample preservative

Bottles should be filled to near full capacity while allowing enough room for the preservative addition and mixing. Some bottles must be filled to the indicated fill-line on the bottle. Some analytical parameter samples must be collected without leaving head-space, which means that the bottle will be filled in such a way to prevent inclusion of air or bubbles. This is very important when sampling volatile parameters (e.g., volatile organic carbon or chlorine) which may evaporate out of solution if airspace is present. Typically, the easiest way to accomplish this is to place the cap on the bottle while the bottle is submerged. This can also be accomplished by filling the bottle to form a meniscus at the top and then carefully replacing the cap to ensure no water is lost. The contracted laboratory can provide instruction for the specific bottle filling requirements for each analytical parameter.

The sample bottles necessary for the different analyses required by the water licence SNPs are provided in the Appendix B.

2.3 Field Sampling Log Book

Details of all sampling activities are recorded in a field logbook. The sampler will record the sampling stations visited, the samples taken at each station, the date and time for each sample collected and the names of the individuals collecting the sample. The results of any field measurements (i.e., temperature, pH, etc.) will be recorded as well as information on sample preservation.

The sampler will also record any information that may influence the analytical results, such as weather conditions, stream flow rates, and unusual conditions at the site. Any necessary deviations from standard procedures or sampling location need to be documented and reasons for the change included in the field log book.

A scanned copy of the field log book pages should be made as soon as possible after sample collection and filed on the Environment server. This copy serves as backup in the event the log book were lost or destroyed, and as a reference for others who may need to review this data.

Field notes and the field log book are considered legal documents and should be kept legibly in permanent ink. In the event that an error is made it should be crossed out with a single line and initialled by the one making the correction. Pages should never be removed and space or pages being left blank should be labelled with a single diagonal line and the phrase “intentionally left blank”. When filled, the field log book should be filed and retained in case of future need.

The log book shall periodically be scanned and backed up to the company drive in order to preserve the previous records should the book be damaged or lost. Both electronic and paper copies of the book shall be filed and kept once the book is filled.

2.4 Sampling Methods

The following sections discuss methods that should be used to collect samples in different sampling locations. The bottle rinsing and filling techniques described in Section 2.3 will be incorporated into each of these methods.

2.4.1 Streams

The sample should be collected as close as practical to the middle of the stream, where water flows freely and is free of debris. If wading into the stream to collect the sample, the sampler should face upstream and wait to allow any sediment that may have been stirred up to settle or wash away. A sample pole may also be used to collect the sample from shoreline in situations where it is unsafe to enter the flowing stream. If a sample pole is used, the collection end of the pole will be cleaned prior to arriving at the sample location, transported to the sample site covered in a plastic bag and then rinsed in the water to be sampled prior to inserting the sample bottle into the collection end.

Ideally, the bottle will be submerged into the stream to a depth of approximately half the total stream depth to collect the sample. At minimum, the sample bottle will be submerged to approximately 10cm below the water surface. If the stream is too shallow to submerge the bottle to 10cm below the surface, care will be taken to prevent surface debris or sediments from contaminating the sample. If necessary, a smaller bottle or an individually-packaged sterile plastic syringe provided by the contract laboratory can be used to transfer water to the larger sample bottles, provided that these are rinsed as required.

2.4.2 Lakes and Ponds

Surface samples from lakes and ponds should be collected using the same procedures as above. Subsequent samples should always be taken at the same location. Sample bottles should be submerged to a depth of approximately 10cm below the water surface.

Water quality samples collected at depth in lakes or ponds will be collected with a clean discrete water sampler (e.g., Niskin sampler, Go-Flo sampler), which is lowered to the required depth and triggered to trap a sample of water by releasing a messenger weight from the surface down the rope used to lower the sampler. The sampler is lowered to depth three times and rinsed with the water to be sampled before collecting the sample the fourth time it is lowered to depth.

2.4.3 Process Streams (Pipes, Valves and Auto Samplers)

Some sampling of process streams may be required by the water licence SNP, MDMER and for environmental management purposes. These may be grab samples taken from a valve or pipe discharge, or composite samples collected by combining multiple grab samples or by an automated sampling system. The same principles used in natural stream sampling should be applied when collecting grab samples. Valves should be open for at least one minute before taking the sample to help ensure that the water is representative of the process stream.

2.4.4 Soil Sampling

The location, number and depth of soil samples will depend on the purpose of the sampling program (i.e., characterization, delineation) and nature of the parameters of interest. All sampling equipment (e.g. trowel, scoop, augers) will be made of stainless steel or high density polyethylene, and will be cleaned prior to and between sample events. Powder-free nitrile gloves will be worn and gloves will be changed before each new sample is collected. Samples should be gathered from freshly exposed soil and preserved as soon as possible.

2.4.5 Ash Sampling

The monitoring, characterization and disposal of bottom ash generated through incinerating or open burning appropriate waste streams is a requirement of the water licences associated with the project. Ash is collected at intervals to be representative of all the ash and the analysis is used to determine suitability for landfill placement.

During each incinerator ash cleaning an ash sample is collected. These samples are combined at month end into a composite which is then subsampled for analysis.

Each time ash is cleaned out of the burn pan an ash sample is collected. These samples are combined at month end into a composite which is then subsampled and sent for analysis.

Bottom ash is analyzed for flash point, paint filter test, leachable metals, leachable mercury and leachable BTEX. Sub-samples are packed tightly into glass jars with no headspace and submitted to the contract laboratory for analysis.

2.4.6 Waste Oil Sampling

Feedstock oil to be burned in a waste oil burner must be analyzed to determine the content of metals and other substances known to exist in used oil from the lubrication of machinery components and internal combustion engines. This is a requirement of territorial guidelines, federal regulations and the water licences issued to Agnico Eagle by the NWB.

An annual supply of waste oil totes is identified and a representative sample is collected from each of the totes to create a composite which is then sent for analysis.

The samples are analyzed for glycol, PCBs, ash, flashpoint, metals, sulphur, total chlorine, heating value, viscosity, and water.

2.4.7 Environmental Surveillance Monitoring

Some of the monitoring required under the water licences does not involve collection of samples or laboratory analysis. This may include monitoring shoreline erosion or ground temperatures around infrastructure facilities. The timely acquisition and preservation of this data provides documentation for aspects relating to how the camp is affecting the local environment. For example, if runoff from the site is not properly controlled permafrost degradation may be observed and documented. On the same note, a warming trend in a temperature monitoring station could be an early indicator of permafrost degradation. Field notes and measurements are collected for these programs and are an important part of the site environmental management.

2.4.8 Flow Measurements

Seametric TX-115 Flow meters are used to measure piped water movements and discharge within the water management facilities. The calibration procedure for the Seametric TX-115 Flow meters includes testing of the flow measurement reading against a known flow to determine accuracy, adjusting the K-factor to ensure the flowmeters are within 10% and recording the information in a flowmeter calibration log. This calibration is conducted prior to deployment in the field for water management related activities.

2.4.9 Field Measurements

Water temperature, electrical conductivity, oxidation-reduction potential, salinity and pH are typically measured and recorded in the field when the sample is taken. The calibration of the meters must be verified against a known standard solution and recalibrated if necessary prior to each day's sampling activities. The calibration data is recorded in a calibration log. Additionally, the calibration of the meter should be checked against a known standard at the end of the days sampling. Any issues with the meter calibration, or discrepancies with the end of day calibration check should be noted in the field log book along with that days sampling data. Calibration check data will not be used to alter any reading taken during the day. Instead, these results may be used to help explain anomalous data.

Field measurements should be taken directly from the water body being sampled. Where this is impractical, perhaps due to high velocity of a sample stream, the measurements can be taken from a triple rinsed sample jug or pail. All field measurement equipment is to be cleaned between sampling stations and rinsed in the sample stream/water body being sampled. It is important that field meters are never introduced into sample bottles that are destined for laboratory analysis to prevent sample contamination.

3 Sample Handling

3.0 Sample Identification

Prior to beginning a sample event, the required sample bottles and preservatives should be gathered, prepared and organized into sample sets inside a plastic bag which should be supplied by the contract laboratory.

When sampling and sample preservation is completed, the bottles should be clearly marked with all information that the laboratory analyst will need to report the result. The following information should be included:

- Sample location (or SNP station number)
- Date of sampling
- Parameters to be analyzed
- Preservation method used
- Filtering method used
- Name or initials of sampler
- Temperature and pH (where applicable)
- Company name, and
- Property name

Prior to taking the bottles to the field, each bottle will be labelled with as many of the items above as possible using waterproof pre-printed labels. The sampling time, temperature and pH (where applicable) will be recorded on the label in the field using permanent waterproof ink.

In some cases, permanent markers can be used to identify sample bottles, however these markings can be erased with wear and may not be clearly legible. Whenever possible pre-printed waterproof labels can be used to mark the sample bottles.

3.1 Chain of Custody Forms

A Chain-of-Custody (CoC) form must be completed for each sample collected. Template CoC forms are saved on the Environment server. The completed form is to be filed on the server in the Laboratory Data folder. A copy of this form must also be printed, signed and sent accompanying the samples.

3.2 Sample Preservation

As samples cannot be delivered to the analytical laboratory within two hours of sampling, preservation may be required for some parameters to prevent chemical reactions that may affect the concentration of the parameter of interest. The samples must be preserved within two hours of sampling. Preservative

must be analytical grade and must not be used after the expiry date. Expired preservative is returned to the laboratory for proper disposal. The contracted laboratory can provide instruction for the preservative requirements for each analytical parameter and will provide appropriate preservatives for parameters to be analyzed.

Samples must be kept dark and cool (~4°C), but not frozen unless otherwise specified by the laboratory. Samples will be packed in a cooler with ice packs for transport and for shipment to the laboratory. Samples will be stored in a refrigerator if they will not be shipped to the laboratory immediately after sampling. Samples should be delivered to the analytical laboratory as soon as possible after collection.

The sample preservatives necessary for the different analyses required by the water licence SNPs are provided in Appendix B.

3.3 Transportation

Care should be taken when packing samples for shipment. To help prevent leakage and cross contamination, sample bottles should be packed standing upright in the cooler. Sample bottles laid on their side are much more likely to leak, especially if they have other samples on top of them. When possible, samples known or suspected to have elevated contaminate levels should not be shipped together with samples expected to be clean (i.e. sewage samples not shipped in same cooler as potable water samples).

The contracted laboratory can provide details on the storage or holding time for each parameter to be analyzed (i.e. can be as little as 24 hours). Where possible, sample dates will be scheduled so that a flight is available to transport the sample to the lab within the specified holding time. In all cases, samples will be shipped to the laboratory as quickly as possible and will be labelled as “Time Sensitive, Keep Cool” to ensure proper handling during shipment.

4 Quality Control Samples

There are six types of QC samples that can be collected and analyzed to verify the quality of the sample collection and analysis methods. These are described in the section below. These QC samples are analyzed for the same suite of analytical parameters as the SNP sampling station samples.

4.0 Travel Blanks

Travel blanks are used to check for contamination during the movement process of samples and are subjected to the same potential sources of contamination as the samples to be analyzed. The travel blanks are prepared by the analytical laboratory with de-ionized water and appropriate preservative. The travel blank bottles are shipped to site, transported to the field, carried through the sample collection and shipped back to the laboratory with the field samples. Travel blank bottles should not be opened at any time.

4.1 Equipment Blanks

Equipment blanks are collected after cleaning of field equipment and prior to sampling. De-ionized water provided by the contract laboratory is used to rinse the equipment. The field equipment is then filled with de-ionized water, and then collected and preserved in new sample bottles for the same analysis as the field samples (de-ionized water expires within six months of being produced by the laboratory; expired de-ionized water will not be used). The results from this blank sample assure adequate decontamination of the field equipment. The Niskin or other sampling equipment used to collect samples will be decontaminated prior to use.

4.2 Field Blanks

Field blanks are samples of laboratory-grade de-ionized water that are subjected to the same procedures as routine field samples. Any measurement of the parameter of interest, above method detection limits, will indicate an analytical error, impurities in the laboratory distilled water supply, contaminated sample preservatives or contamination of the sample during the handling process.

Combined with the results of other QC procedures, analysis of field blanks can help identify sources of contamination and error.

A set of field blanks should be made up once each month and taken into the field when the SNP stations are sampled. New sample bottles will be rinsed as directed by the contract laboratory and filled using de-ionized water provided by the contracted laboratory (de-ionized water expires within six months of being produced by the laboratory; expired de-ionized water will not be used). The samples will be poured directly from the bottles provided by the laboratory into the sample bottles to replicate grab sample methods. The field blank set should represent all the parameters routinely analyzed at that sample location. The bottles should be preserved using the same protocol as the regular samples and submitted to the laboratory identified as field blanks.

4.3 Replicate Samples

Replicate samples (sometimes referred to as duplicate samples) test precision and assure that sample results are reproducible. They are prepared by collecting two separate samples for each given analytical parameter at a given sample location. The replicate samples are collected, handled and analyzed using the same procedures applied to routine samples. The samples are also analyzed by the same analytical method in the laboratory. Replicate samples are usually used to identify sampling procedure errors.

Once per operating season, for each active SNP station, a set of duplicate samples will be taken representing as many of the routine analyses as possible. Where possible, this should be carried out in conjunction with audit sampling conducted by the designated Inspector. Replicate sampling should rotate between prescribed SNP stations.

4.4 Split Samples

Two or more representative sub-samples are removed from one collected sample and analyzed separately at the laboratory. This data is used as a check of the precision of the analytical procedure employed by the laboratory and is a normal part of the laboratory QA/QC program. These can also be collected in the field by dividing a composite sample into two sets of samples. If field split samples are collected, it is common to label each sample with a different station name, to provide a blind assessment of the laboratory's analytical program.

4.5 Method "Spiked" Samples and Certified Standards

The recovery of "known additions" from "spiked" samples is used as a check on the recovery of the parameter to be analyzed using a given analytical procedure. It is periodically carried out at the laboratories employed to analyze the samples and forms part of the laboratory's normal QA/QC program.

5 Laboratory Analysis

All environmental monitoring samples are submitted to an offsite analytical laboratory which is accredited by the Canadian Association for Laboratory Accreditation (CALA) or the Standards Council of Canada (SCC). Currently, Agnico Eagle uses ALS Environmental Laboratories (ALS), Bureau Veritas Canada Inc. (formally Maxxam Analytics), Nautilus Environmental Inc. and Harris Industrial for analyses of all environmental samples. Certificates of Accreditation for these laboratories are included in the Appendices.

Agnico Eagle verifies with each laboratory that the analytical methods utilized for each parameter conform to industry best practices and those referenced in applicable guidance and regulatory documents.

6 Reporting

All analytical results are forwarded in electronic format to Agnico Eagle's Environmental Supervisor/Coordinator for filing. Agnico Eagle uses a MonitorPro electronic database to manage data and make data easily accessible. This database is maintained by the Environmental Supervisor/Coordinator.

After receipt, the results are screened for anomalies and/or trends, and are placed into the appropriate environmental files on the Environmental server. Results that appear to be anomalous are flagged and a review is conducted to identify potential sources of the anomaly. In some instances, the analysis is repeated. Analyses that indicate contamination or changes are subjected to further study and reported to the appropriate agencies. The environmental files are maintained on the server as a management tool for environmental risk assessment and in preparation of summary reports for the regulatory agencies and company officials. In compliance with the Surveillance Network Program, reports of analytical results for SNP samples are submitted electronically to the NWB and the Inspector within 30 days following the month in which the samples were taken. The NWB distributes the reports to other agencies and interested parties.

Results of samples collected under the MDMER are reported to Environment and Climate Change Canada through the Single Window Information Manager online reporting system each calendar quarter not later than 45 days after the end of the quarter. An annual report of results of samples collected under the MDMER will be submitted by March 31 of each year.

7 References

Guidance Manual on Sampling, Analysis, and Data Management for Contaminated Sites Volume I: Main Report. 1993, Canadian Council of Ministers of the Environment

Protocols Manual for Water Quality Sampling in Canada. 2011, Canadian Council of Ministers of the Environment

Standard Methods for the Examination of Water and Wastewater. 1999, American Public Health Association, American Water Works Association and Water Environment Federation

Quality Assurance (QA) and Quality Control (QC) Guidelines for use by Class “A” Licensees. 1996, Indian and Northern Affairs Canada Water Resources Division and Northwest Territories Water Board.

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QUALITY ASSURANCE AND QUALITY CONTROL PLAN

HOPE BAY, NUNAVUT

Appendix A – Analytical Parameters, Sample Bottles and Required Preservatives

Analytical Parameters, Sample Bottles and Required Preservatives

SNP Monitoring Group Reference	Analytical Parameters	Measurement Units	Sample Bottle	Preservative
General (G)	pH	pH units	500 mL plastic	None
	TSS	mg/L		
Nutrients (N1)	Orthophosphate-P	mg/L		
	Nitrate-N	mg-N/L		
	Nitrite-N	mg-N/L		
Nutrients (N2)	Total Ammonia-N	mg-N/L	120 or 250 mL amber glass	1 mL of 1:3 H2SO4 or 1 mL of 1:1 H2SO4
	Total Phosphate-P	mg/L		
Total Metals - Unfiltered (MT)	T-Aluminum	mg/L	60 mL plastic	None
	T-Arsenic	mg/L		
	T-Copper	mg/L		
	T-Iron	mg/L		
	T-Nickel	mg/L		
	T-Lead	mg/L		
	T-Zinc	mg/L		
Dissolved Metals - Filtered (MT)	D-Iron	mg/L	60 mL plastic; field filtered	None
	D-Copper	mg/L		
	D-Arsenic	mg/L		
	D-Zinc	mg/L		
	D-Cadmium	mg/L		
	D-Nickel	mg/L		
Biological (B)	Biochemical Oxygen Demand	mg/L	500 mL plastic	None
	Fecal Coliforms *	CFU/100 mL (colony forming units)	Sterile 250 mL plastic	Sodium Thiosulfate (precharged)
Hydrocarbons (HC)	Total Oil & Grease	mg/L	2 X 250 mL or 2 X 500 mL amber glass	0.5 mL of 1:1 HCl or 1 mL of 1:1 HCl
	Benzene	mg/L	2 X 40 mL glass	Sodium Bisulphate (precharged)
	Toluene	mg/L		
	Ethyl Benzene	mg/L		
Discharge (D)	Flow	m3/day	None, field measured	N/A
	Volume	m3		
	Duration	Day		

*ALS methodological change. Fecal coliforms now in MPN/100mL (Most Probable Number).

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QUALITY ASSURANCE AND QUALITY CONTROL PLAN

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Appendix B – Certificates of Accreditation

Harris Industrial Testing Service Ltd.

Canadian Association
for Laboratory Accreditation Inc.

CALA

Certificate of Accreditation

Harris Industrial Testing Service Ltd.
21 Old Cobequid Rd.
Waverly, Nova Scotia

This laboratory is accredited in accordance with the recognized International Standard ISO/IEC 17025:2017.
This accreditation demonstrates technical competence for a defined scope and the operation of a laboratory quality management system (refer to joint ISO-ILAC-IAF Communiqué dated April 2017).

Accreditation No.: 1002807
Issued On: 2/2/2023
Accreditation Date: 1/3/2005
Expiry Date: 8/2/2025

CALA

President and CEO

This certificate is the property of the Canadian Association for Laboratory Accreditation Inc. and must be returned on request; reproduction must follow policy in place at date of issue.

Nautilus Environmental Inc.

Canadian Association
for Laboratory Accreditation Inc.

CALA

Certificate of Accreditation

Nautilus Environmental Inc. (Burnaby)
Nautilus Environmental Company Inc.
8664 Commerce Court
Burnaby, British Columbia

This laboratory is accredited in accordance with the recognized International Standard ISO/IEC 17025:2017.
This accreditation demonstrates technical competence for a defined scope and the operation of a laboratory quality management system (refer to joint ISO-ILAC-IAF Communiqué dated April 2017).

CALA

Accreditation No.: 1003525
Issued On: 9/6/2023
Accreditation Date: 3/6/2007
Expiry Date: 3/5/2026

President and CEO

CALA

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For the specific tests to which this accreditation applies, please refer to the laboratory's scope of accreditation at www.cala.ca.

Bureau Veritas

Certificate of Accreditation

Certificat d'accréditation

scc ccn

Bureau Veritas
Mississauga Laboratory
6740 Campobello Road, Mississauga, ON L5N 2L8

having been assessed by the Standards Council of Canada (SCC) and found to conform with the requirements of ISO/IEC 17025:2017 and the conditions for accreditation established by SCC is hereby recognized as an

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for the specific tests or types of tests listed in the scope of accreditation approved by SCC and found on the SCC website at www.scc.ca.

ayant fait l'objet d'une évaluation du Conseil canadien des normes (CCN), et ayant été trouvé conforme aux exigences énoncées dans ISO/IEC 17025:2017 et aux conditions d'accréditation établies par le CCN, est de ce fait reconnu comme étant un

LABORATOIRE D'ESSAIS ACCRÉDITÉ

pour les essais ou types d'essais énumérés dans la portée d'accréditation approuvée par le CCN et figurant dans le site Web du CCN au www.ccn.ca.

SCC file number: / Dossier du CCN n° : 15025

Initial accreditation date: / Date de la première accréditation :1992-10-06

Vice-President – Accreditation Services / Vice-président – Services d'accréditation

Issued on: / Délivré le :2022-02-16

The validity of this certificate, including the date of last re-accreditation and its expiry can be confirmed by the accompanying Scope of Accreditation document in the Directory of Accredited Laboratories on the SCC website at www.scc.ca.

This laboratory is accredited in accordance with the recognized International Standard ISO/IEC 17025:2017. The accreditation demonstrates technical competence for a defined scope and the operation of a laboratory quality management system (refer to joint ISO-ILAC-IAF communiqué dated April 2017).

Pour vérifier la validité du présent certificat, y compris la date de la dernière réaccréditation et la date d'expiration du certificat, consulter la portée d'accréditation qui se trouve dans le répertoire des laboratoires accrédités dans le site Web du CCN au www.ccn.ca.

Ce laboratoire est accrédité conformément à la Norme internationale reconnue ISO/IEC 17025:2017. Cette accréditation démontre la compétence technique d'un organisme pour une portée définie et l'exploitation d'un système de management de la qualité de laboratoire (cf. communiqué conjoint ISO-ILAC-IAF date d'avril 2017).

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ALS Environmental

Canadian Association
for Laboratory Accreditation Inc.

CALA

Certificate of Accreditation

ALS Environmental (Burlington)
ALS Canada Ltd.
1435 Norjohn Court, Unit 1
Burlington, Ontario

This laboratory is accredited in accordance with the recognized International Standard ISO/IEC 17025:2017.
This accreditation demonstrates technical competence for a defined scope and the operation of a laboratory quality management system (refer to joint ISO-ILAC-IAF Communiqué dated April 2017).

CALA

Accreditation No.: 1003508
Issued On: 5/16/2023
Accreditation Date: 4/10/2012
Expiry Date: 11/15/2025

CALA

President and CEO

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For the specific tests to which this accreditation applies, please refer to the laboratory's scope of accreditation at www.cala.ca.

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QUALITY ASSURANCE AND QUALITY CONTROL PLAN

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Module A: 2AM-DOH1335

Conformity Table

Licence	Part	Item	Topic	Report Section
2AM-DOH1335	B	13	The Licensee shall, for all plans submitted under this Licence, implement the plan as approved by the Board in writing. Any changes to the plans deemed significant shall be considered as an amendment to the plan(s) or as a modification and must be submitted to the Board for approval in writing. The Board has approved under this Amended Water Licence 2AM-DOH1335, the following plans for implementation under the relevant sections in the Amended Licence: *q. Quality Assurance and Quality Control Plan (January 2017)*	This plan
	I	3	The Licensee shall undertake the Monitoring Program provided in the Tables 1, 2, and 3 of Schedule I. The Licensee shall, in consultation with an Inspector, establish the locations and GPS coordinates for all Monitoring Program Stations.	Table A1 and Figure A1
		15	The Licensee shall annually review the approved Quality Assurance and Quality Control Plan and modify the Plan as necessary. Proposed changes shall be submitted to an Accredited Laboratory for approval.	Section 1.4
		16	All analyses shall be conducted as described in the most recent edition of “Standard Methods for the Examination of Water and Wastewater” or by other such methods approved by an Analyst.	Sections 2 and 3
		17	All compliance analyses shall be performed in an accredited laboratory according to ISO/IEC Standard 17025. The accreditation shall be current and in good standing.	Section 5

A1 Introduction

The Type A Water Licence No. 2AM-DOH1335 issued to Agnico Eagle by the Nunavut Water Board (NWB) details the sampling and analysis requirements for the SNP program.

A2 SNP Sampling Stations

Table A1 summarizes the sampling stations, sampling frequency and monitoring parameters required as part of the Surveillance Network Program for water licence 2AM-DOH1335. The location of each sampling point is illustrated in Figure A1 through Figure A3 below.

Table A1. 2AM-DOH1335 Sample Stations, Sample Frequency and Analytical Parameters

SNP Station	UTM Easting (Zone 13W)	UTM Northing	Description	Phase	Monitoring Parameters	Frequency during Operations and Anytime after Initial Deposit of Tailings to the TIA
ST-1	433050.27	7558926.03	Doris Sedimentation Pond	Construction, Operation, Care and Maintenance, Closure	G, N1, MT and Total Sulphate, Total CN, Total Oil and Grease, Alkalinity, Chloride, and Total Metals by ICP-MS	Annually
ST-2	433193.1	7558929.35	Doris Contact Water Pond	Construction, Operation, Care and Maintenance, Closure	G, N1, MT and Total Sulphate, Total CN, Total Oil and Grease, Alkalinity, Chloride, and Total Metals by ICP-MS	Annually
ST-3	Not constructed	Discharge from Non-hazardous Landfill Contact Water control sump	Construction, Care and Maintenance, Operation, Closure	G, MT and Total Ammonia-N, Total Sulphate, Total and Free CN, Total Oil and Grease		Annually. Once prior to every discharge onto the tundra

SNP Station	UTM Easting (Zone 13W)	UTM Northing	Description	Phase	Monitoring Parameters	Frequency during Operations and Anytime after Initial Deposit of Tailings to the TIA
					D	Daily during periods of discharge
ST-4	432667.47	7559319.33	Discharge from Landfarm sump	Construction, Operation, Care and Maintenance, Closure	G, HC, total Ammonium, total Lead	Annually. Once prior to every discharge onto the tundra
					D	Daily during periods of discharge
ST-5	433022.53	7559216.5	Discharge from Doris Plant Site Fuel Storage and Containment Area Sump	Construction, Operation, Care and Maintenance, Closure	G, HC, Total Pb	Annually. Once prior to every discharge onto the tundra
					D	Daily during periods of discharge
ST-6a and ST-6b	432911.08	7563436.18	Discharge from the Roberts Bay Fuel Storage and Containment Area Sumps	Construction, Operation, Care and Maintenance, Closure	G, HC, Total Pb	Annually. Once prior to every discharge onto the tundra
					D	Daily during periods of discharge
ST-7	433511.68	7558726.75	Freshwater pumped from Doris Lake	Construction, Operation, Care and Maintenance, and Closure	G, N1, N2, MT and Free CN, Total CN, T-Ag, T-Ca, T-Cd, T-Cr, T-Hg, T-Mo, T-Se, T-Tl, and Total Oil and Grease, Cl	Monthly during periods of pumping
					D	Monthly during periods of pumping
					Cl-a	Annually

SNP Station	UTM Easting (Zone 13W)	UTM Northing	Description	Phase	Monitoring Parameters	Frequency during Operations and Anytime after Initial Deposit of Tailings to the TIA
ST-7a	432582	7550524	Freshwater pumped from the Windy Lake freshwater intake	Construction, Operation, Care and Maintenance, Closure	G, N1, N2, MT, Cl and, T-Ag, T-Cd, T-Cr, T-Hg, T-Mo, T-Se, T-Tl, T-Ca, and Total Oil and Grease, Free CN, Total CN	Monthly during periods of pumping
					B	
					D	
ST-8	432982.78	7559039.41	Discharge from Doris Sewage Treatment Plant bio-membrane	Construction, Operation, Care and Maintenance, Closure	G, B, and Total Oil and Grease	Monthly when discharge to the Tundra, Annually when discharge to the TIA
					Location of discharge	Monthly during periods of discharge
					D	Daily during periods of discharge
ST-9	431260	7559564	Runoff from Doris Sewage Treatment Plant discharge - downstream of wastewater treatment plant discharge point and just prior to flow entering Doris Lake	Construction, Operation, Care and Maintenance, Closure	G, B, and Total Oil and Grease	Monthly when ST-8 is discharged to the tundra
ST-10	Dependent on location of runoff, if found		Doris Site Runoff from Sediment Controls	Construction, Operations, Closure	TSS or Turbidity (following development and approval of a site-specific TSS-Turbidity)	Daily during periods of discharge

SNP Station	UTM Easting (Zone 13W)	UTM Northing	Description	Phase	Monitoring Parameters	Frequency during Operations and Anytime after Initial Deposit of Tailings to the TIA
ST-11	434538.91	7559261.79	Reagent and Cyanide Doris Storage Facility Sumps	Construction, Operation, Care and Maintenance, Closure	G, HC , MT, T-Ag, T-Ca, T-Cd, T-Cr, T-Hg, T-Mo, T-Se, T-Tl Total Ammonia, Total and Free Cyanide, and D	Annually
ST-12	402593	7551455	Doris Lake	Operation, Closure	Water Level	Monthly
					Ice Thickness	Annually in April
ST-13	Not constructed		Doris Contact Water Pond associated to Pad U	Construction, Operation, Care and Maintenance, Closure	G, N1, MT and Total Sulphate, Total CN, Total Oil and Grease, Alkalinity, Chloride, and Total Metals by ICP-MS	Annually
					D	Daily during periods of discharge
TL-1	434585.13	7558977.32	TIA at the Reclaim Pipeline	Operation, Care and Maintenance, Closure, Post-Closure	G, N1, N2, MT and TDS, Cl, Free CN, Total CN, T-Ag, T-Ca, T-Cd, T-Cr, T-Hg, T-K, T-Mo, T-Mg, T-Na, T-Se, T-Tl, HC, Fecal Coliforms	Monthly during Operations, Closure and Post-Closure
						Annually during Care and Maintenance
					Dissolved Oxygen, Redox Potential, BOD	Annually
					Acute Lethality	Annually during Post-Closure

SNP Station	UTM Easting (Zone 13W)	UTM Northing	Description	Phase	Monitoring Parameters	Frequency during Operations and Anytime after Initial Deposit of Tailings to the TIA
					D	Daily during periods of discharge
TL-2	Inactive	Doris Outflow Creek - upstream (at the flow monitoring station adjacent to the bridge)	Closure, Post-Closure		G, N1, N2, MT and TDS, Cl, Free CN, Total CN, T-Ag, T-Ca, T-Cd, T-Cr, T-Hg, T-K, T-Mo, T-Mg, T-Na, T-Se, T-Tl, Oil and Grease	Annually during Care and Maintenance Annually for 2 years prior to Post-Closure, and during Post-Closure, Increase to three times per year (under ice, freshet, and pre-freeze up), two years prior to breach of the North Dam.
			Operation		D	Daily upon commencement of mining in or beneath the Doris Lake Talik.
TL-3	Inactive	Doris Outflow Creek (~80m downstream of the base of the waterfall)	Care and Maintenance, prior to any deposit of tailings to the TIA		G, N1, N2, MT and TDS, Cl, Free CN, Total CN, T-Ag, T-Ca, T-Cd, T-Cr, T-Hg, T-K, T-Mo, T-Mg, T-Na, T-Se, T-Tl, Total Oil and Grease	Inactive
					D	

SNP Station	UTM Easting (Zone 13W)	UTM Northing	Description	Phase	Monitoring Parameters	Frequency during Operations and Anytime after Initial Deposit of Tailings to the TIA
TL-4	Inactive	TIA Discharge End-of-Pipe	Care and Maintenance, prior to any deposit of tailings to the TIA		G, N1, N2, MT, and TDS, Cl, Free CN, Total CN, T-Ag, T-Ca, T-Cd, T-Cr, T-Hg, T-K, T-Mo, T-Mg, T-Na, T-Se, T-Tl, T-Radium 226	Inactive
					Acute Lethality	
					B	
					D	
TL-5	MILL OUT OF OPERATION	Effluent from Doris Process Plant (tailings slurry/water)	Operations		G, N1, MT, and Free CN, Total CN, WAD CN, Sulphate, T-Cd, T-Cr, T-Hg, T-Mo, T-Se, and Total Metals by ICP-MS	Monthly
					Cyanate and Thiocyanate	Quarterly
TL-6	MILL OUT OF OPERATION	Tailings Discharged into TIA (Solid Component) taken from a valve in the mill at the discharge end of the mill tailings pumps	Operations		Tonnage of dry tailings solids	Monthly during periods of discharge
					MT and T-Cd, T-Cr, T-Hg, T-Mo, T-Se, Total Inorganic Carbon and Total Metals by ICP-MS (must include Sulphur)	Sampled on a weekly basis with analyses carried out monthly on a composite sample of the TL-6 weekly samples

SNP Station	UTM Easting (Zone 13W)	UTM Northing	Description	Phase	Monitoring Parameters	Frequency during Operations and Anytime after Initial Deposit of Tailings to the TIA
TL-7a	MILL OUT OF OPERATION	Detoxified tailings solids sent underground as backfill	Operations		Dry tonnage of detoxified tailings sent underground; Moisture content of backfill trucked underground	Monthly
TL-7b	MILL OUT OF OPERATION	Filtrate from TL-7a (Detoxified tailings sent underground as backfill)	Operations		Cyanate and Thiocyanate, WAD CN, Total Inorganic Carbon, Total Metals by ICP-MS (including Sulphur)	Monthly
TL-8	MILL OUT OF OPERATION	Reclaim water pumped from TIA to Mill Process water tank taken from a valve at the discharge end of the reclaim water pump	Operations		G, N1, N2, MT and Free CN, Total CN, T-Ag, T-Cd, T-Cr, T-Hg, T-Mo, T-Se, T-Tl	Inactive
					D	Daily during periods of pumping
TL-9	MILL OUT OF OPERATION	Detox tailings reactor tank (650-TK-565)	Monitoring and reporting is captured within the Water Management Plan			Monitoring and reporting is captured within the Water Management Plan
TL-10	MILL OUT OF OPERATION	Water Column in deepest portion of Tail Lake and at a location away from the TIA Reclaim water floating pump house, sampled at surface, mid- depth and near bottom	Inactive			Inactive

SNP Station	UTM Easting (Zone 13W)	UTM Northing	Description	Phase	Monitoring Parameters	Frequency during Operations and Anytime after Initial Deposit of Tailings to the TIA
TL-11	Various locations Underground determined by SRK	Seepage from Doris underground backfilled stopes	Operations		Visual inspection for seepage. If seepage present parameters to be monitored include N1 and pH, EC, Trace metals by ICP-MS, Alkalinity, Acidity, Sulphate, Total, Free and WAD CN	Survey Twice annually
TL-12	433277.98 7558963.55	Doris Mine Water Discharge Point	Operations during continuous pumping		Chloride, TDS and nitrate	Weekly
					Total Ammonia, Nitrate, Nitrite, pH, EC, Total Metals by ICPMS, alkalinity, bromide, fluoride, sulphate, TSS, and Total and WAD Cyanide	Monthly
					D	Daily during periods of discharge
MMS-1	433181 7549940	Madrid North Contact Water Pond	Construction, Operations, Care and Maintenance		G, N1, MT and Total Sulphate, Total CN, Total Oil and Grease, Alkalinity, Chloride, and Total Metals by ICP-MS	Sampled twice annually, Weekly water levels

SNP Station	UTM Easting (Zone 13W)	UTM Northing	Description	Phase	Monitoring Parameters	Frequency during Operations and Anytime after Initial Deposit of Tailings to the TIA
MMS-2	433190	7549837	Madrid South Primary Contact Water Pond	Construction, Operations, Care and Maintenance, Closure	G, N1, MT and Total Sulphate, Total CN, Total Oil and Grease, Alkalinity, Chloride, and Total Metals by ICP-MS	Sampled twice annually, Weekly water levels
MMS-3	Not constructed		Madrid South Secondary Contact Water Pond	Construction, Operations, Care and Maintenance, Closure	G, N1, MT and Total Sulphate, Total CN, Total Oil and Grease, Alkalinity, Chloride, and Total Metals by ICP-MS	Sampled twice annually, Weekly water levels
MMS-4a	renamed ST7A		Freshwater Intake at Windy Lake North	Construction, Operations, Care and Maintenance, Closure	G, N1, N2, MT and Free CN, Total CN, T-Ag, T-Ca, T-Cd, T-Cr, T-Hg, T-Mo, T-Se, T-Tl, and Total Oil and Grease, Cl, D	Sampled monthly during active pumping periods
MMS-4b	399222	7540401	Freshwater Intake at Windy Lake South (Windy Camp)	Construction, Operations, Care and Maintenance, Closure	G, N1, N2, MT and Free CN, Total CN, T-Ag, T-Ca, T-Cd, T-Cr, T-Hg, T-Mo, T-Se, T-Tl, and Total Oil and Grease, Cl, D	Sampled monthly during active pumping periods
MMS-5	Not constructed		Discharge from Madrid South Fuel Storage facility	Construction, Operations, Care and Maintenance, Closure	G, HC, Total Pb	Annually. Once prior to every discharge to tundra

SNP Station	UTM Easting (Zone 13W)	UTM Northing	Description	Phase	Monitoring Parameters	Frequency during Operations and Anytime after Initial Deposit of Tailings to the TIA
MMS-6	Not constructed	Brine Mixing Facility	Operations during continuous pumping		G, N1, Chloride, Fluoride, Bromide, Sulphate, TDS, EC, Total Metals ICP-MS, alkalinity, Total and WAD Cyanide	Sampled monthly during active pumping periods
MMS-7	Not constructed	Effluent from Madrid North Concentrator to TIA	Operations		G, N1, MT, and Free CN, Total CN, WAD CN, Sulphate, T-Cd, T-Cr, T-Hg, T-Mo, T-Se, and Total Metals by ICP-MS	Sampled quarterly during active pumping periods
MMS-8	Not constructed	Discharge from Madrid North Fuel Storage Facility	Construction, Operations, Care and Maintenance, Closure		G, HC, Total Pb	Annually. Once prior to every discharge to tundra
MMS-9	Dependent on location of runoff, if found	Site runoff from sediment controls during construction	Construction		TSS or Turbidity	Sampled daily during periods of discharge
MMS-10	Not constructed	Mine Water Discharge Point	Operations during continuous pumping		Chloride, TDS and nitrate	Weekly
					Total Ammonia, Nitrate, Nitrite, pH, EC, Total Metals ICP-MS, alkalinity, Fluoride, Bromide, Sulphate, TSS, and Total and WAD Cyanide	Monthly

Figure A.1 2AM-DOH1335 Sample Station Locations

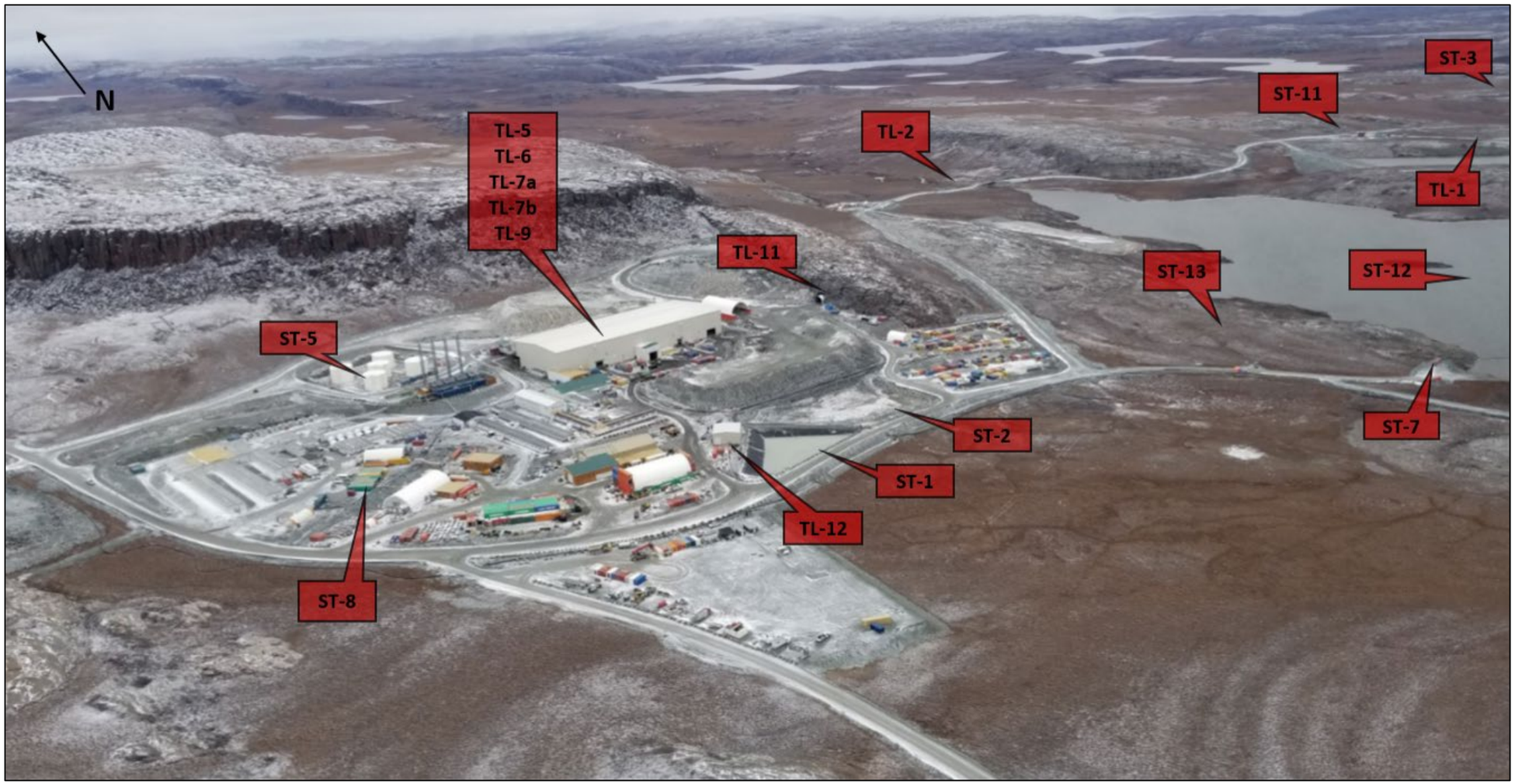

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Figure A.2 2AM-DOH1335 Sample Station Locations

Figure A.3 2AM-DOH1335 Sample Station Locations

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HOPE BAY

QUALITY ASSURANCE AND QUALITY CONTROL PLAN

HOPE BAY, NUNAVUT

Module B: 2BE-HOP1222

Conformity Table

Licence	Part	Item	Topic	Report Section
2BE-HOP1222	J	14	The Licensee shall implement the Hope Bay Mining Limited, Quality Assurance and Quality Control Plan R5, for the Windy Lake Camp and the Patch Lake Fuel Farm Area, dated December 31, 2010, prepared in accordance with the INAC document "Quality Assurance (QA) and Quality Control (QC) Guidelines for use by Class "B" Licensees in Collecting Representative Water Samples in the Field, 1996" approved by an Analyst on July 4, 2011.	
		15	The Licensee shall annually review the approved Quality Assurance/Quality Control plan and modify it as necessary. Proposed modifications shall be submitted to an Analyst for approval.	Section 1.4
		16	The approved Quality Assurance/Quality Control Plan shall be submitted to the Board for review and implemented as approved by an Analyst.	This plan
		17	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.	Sections 2 and 3
		18	All analyses shall be performed in a laboratory accredited according to ISO/IEC Standard 17025. The accreditation shall be current and in good standing.	Section 5

B1 Introduction

The Type B Water Licence No. 2BE-HOP1222 issued to Agnico Eagle by the Nunavut Water Board (NWB) details the sampling and analysis requirements for the SNP program. Windy Camp and the Patch Lake Laydown facility are no longer in use; therefore, sampling stations associated with camp operations and fuel storage facility are not being used or monitored. There are currently no active sampling stations at Windy Camp or Patch Lake. Water drawn from Windy Lake for domestic use at Doris Camp is monitored under the 2AM-DOH1323 Licence SNP Station ST-7A.

B2 SNP Sampling Stations

Table B1. 2BE-HOP1222 Sample Stations, Sample Frequency and Analytical Parameters

SNP Station	UTM Easting (Zone 13w)	UTM Northing	Description	Monitoring Parameters	Frequency
HOP-1	399222	7540401	Raw water supply intake at Windy Lake	B, G, Oil and Grease	Monthly (when in use for Doris)
				D	Daily during periods of pumping
HOP-2*	Inactive		WWTF effluent discharge at the surge tank prior to being pumped over the ridge east of the Windy Camp Facilities	G, B, Oil and Grease	Monthly
HOP-3*	Inactive		WWTF effluent at a point of entry into Windy lake	G, B, Oil and Grease	Monthly
				Acute Lethality	Annually
				D	Daily during periods of discharge
HOP-4*	Inactive		Effluent from the Landfarm Treatment Facility pumped to the WWTF surge tank. Has been decommissioned.	No monitoring requirements	N/A
HOP-5*	Inactive		Effluent from the Bulk Fuel Storage Facility located at the Windy Camp, prior to release	MT, Oil and Grease, BTEX, TPH, PAH,T-Hg, T-Cd, T-Cr Nitrate, Nitrite, Total Phenols, Total Hardness, Total Alkalinity, Calcium, Potassium, Sulphate, Sodium, Magnesium	Once before any discharge, monthly when discharging onto the tundra
				D	Daily during periods of discharge

SNP Station	UTM Easting (Zone 13w)	UTM Northing	Description	Monitoring Parameters	Frequency
HOP-6*	Inactive		Effluent from the Bulk Fuel Storage Facility located at the Patch Lake location, prior to release to a location approved by an Inspector	MT, Oil and Grease, BTEX, TPH, PAH,T-Hg, T-Cd, T-Cr Nitrate, Nitrite, Total Phenols, Total Hardness, Total Alkalinity, Calcium, Potassium, Sulphate, Sodium, Magnesium	Once before any discharge, monthly when discharging onto the tundra
				D	Daily during periods of discharge
HOP-7A, B, and D	397978, 397963, 400473 respectively	7547973, 7544932, 7540890 respectively	Discharge from Quarries A, B, and D respectively	pH, T-Ammonia, Nitrate, ICP metals, Total Sulphate, Alkalinity, Oil and Grease, Electrical Conductivity and Reduction potential (Eh)	Once before any discharge, monthly when discharging onto the tundra
				D	Daily during periods of discharge
HOP-8*	Inactive		Effluent from the Bulk Fuel Storage Facility located at the new Windy Camp location, prior to release to a location approved by an Inspector	MT, Oil and Grease, BTEX, TPH, PAH,T-Hg, T-Cd, T-Cr Nitrate, Nitrite, Total Phenols, Total Hardness, Total Alkalinity, Calcium, Potassium, Sulphate, Sodium, Magnesium	Once before any discharge, monthly when discharging onto the tundra
				D	Daily during periods of discharge
Drill Sites	Varies from year to year		Under-ice sampling before and after drilling	G, ICP total trace metals, Trace Arsenic, Trace Mercury, Electrical Conductivity	Before and after on-ice drilling
			Water intake from all sources	D	Daily during periods of operation

Figure B1. 2BE-HOP1222 Sample Stations Locations

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QUALITY ASSURANCE AND QUALITY CONTROL PLAN

HOPE BAY, NUNAVUT

Module C: 2BB-BOS1727

Conformity Table

Licence	Part	Item	Topic	Report Section
2BB-1727	J	16	The Board has accepted the Plan entitled "Quality Assurance and Quality Control Plan, Hope Bay, Nunavut, Module C: 2BB-BOS1217 Boston" dated January 2017, submitted as additional information with the Application. The Licensee shall submit with the Annual Report an addendum to the Plan; the addendum is to include an updated Table of Contents.	
		17	The Licensee shall annually review the Quality Assurance/Quality Control plan of Part J, Item 16 and modify it as necessary. Proposed modifications shall be submitted to an Analyst for approval.	Section 1.4
		18	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.	Sections 2 and 3
		19	All analyses shall be performed in a laboratory accredited according to ISO/IEC Standard 17025. The accreditation shall be current and in good standing.	Section 5

C1 Introduction

The Type B Water Licence No. 2BB-BOS1727 issued to Agnico Eagle by the Nunavut Water Board (NWB) details the sampling and analysis requirements for the SNP program.

C2 SNP Sampling Stations

Table C1 summarizes the sampling stations, sampling frequency and monitoring parameters required as part of the Surveillance Network Program for water licence 2BB-BOS1727. The location of each sampling point is illustrated in Figure C1 below.

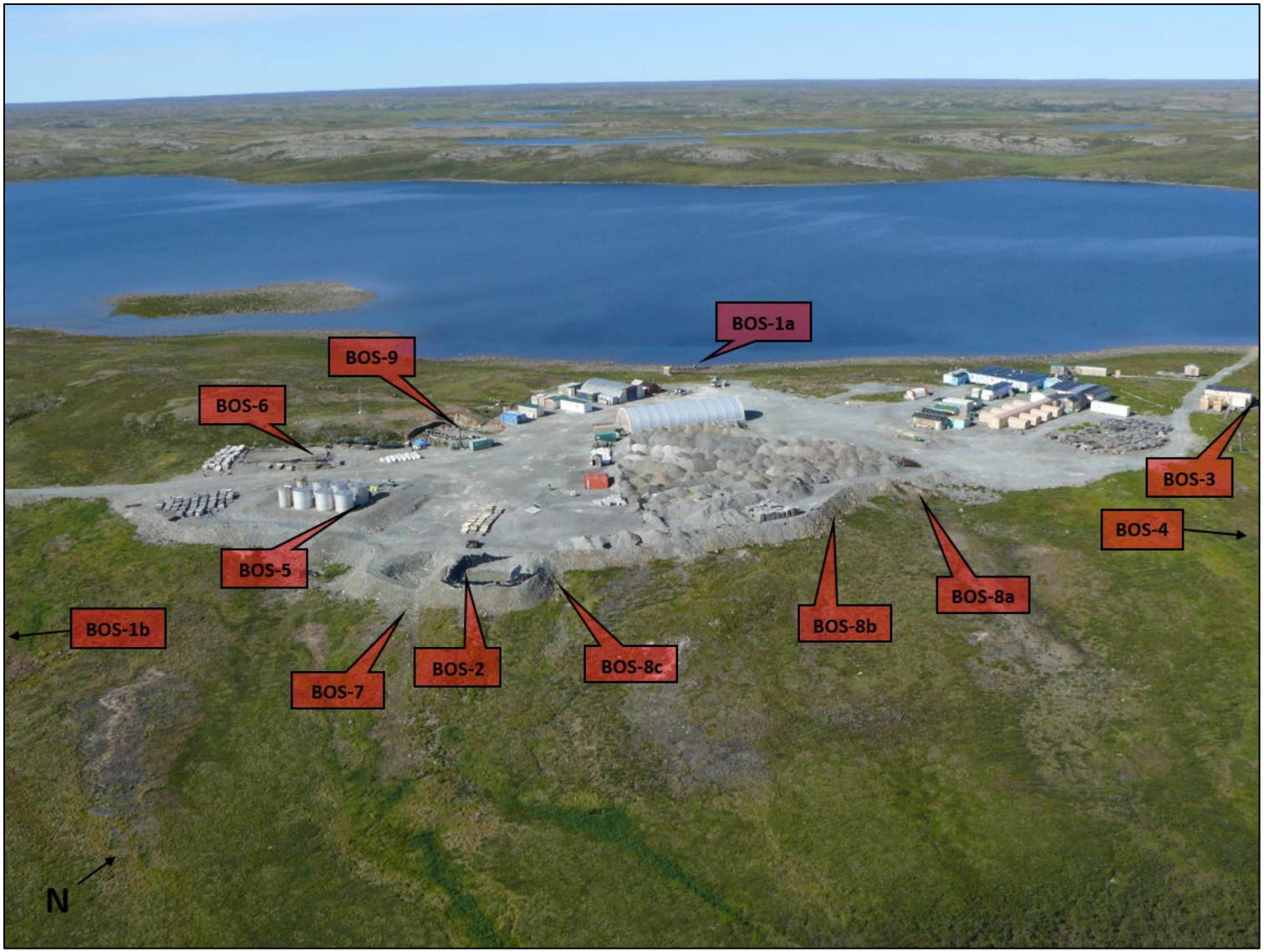
Table C1. 2BB-BOS1727 Sample Stations, Sample Frequency and Analytical Parameters

SNP Station	UTM Easting (Zone 13w)	UTM Northing	Description	Monitoring Parameters	Frequency
BOS-1a*	423869	7485640	Raw water supply intake at Aimaokatalok (Spyder) Lake	D	Daily during periods of pumping
BOS-1b*	Not constructed		Raw water supply intake at Stickleback Lake	D	Daily during periods of pumping
BOS-2	441294	7505403	Containment Pond discharge	pH, Nitrate as NO3-, Oil and Grease, Total Suspended Solids	Prior to discharge, weekly during periods of discharge
				Total As, Cu, Pb, Ni and Zn.	
				TPH, PAH, BTEX, pH, Electrical Conductivity, Nitrate, Nitrite, Oil and Grease, Total Phenols, Total Alkalinity, Total Hardness, Total Suspended Solids, Calcium, Magnesium, Potassium, Sodium, Sulphate & Chloride, Total As, Cd, Cu, Cr, Fe, Pb, Hg, Ni, Se and Zn.	Prior to discharge, monthly during periods of discharge
				D	Daily during periods of discharge
BOS-3*	423897	7485856	Sewage Disposal Facility treated effluent discharge	BOD_5, TSS, Oil and Grease (visual), Fecal Coliforms, pH	Once prior to discharge and monthly during periods of discharge
				D	Daily during periods of discharge

SNP Station	UTM Easting (Zone 13w)	UTM Northing	Description	Monitoring Parameters	Frequency
BOS-4*	423897	7485856	Treated sewage effluent point prior to entry into Aimaokatalok (Spyder) Lake	BOD_5, TSS, Oil and Grease (visual), Fecal Coliforms, pH	Monthly during periods of discharge
				D	Daily during periods of discharge
BOS-5	441310	7505339	Effluent from the Bulk Fuel Storage Facility prior to release to a location approved by an Inspector	TPH, PAH, BTEX, pH, Electrical Conductivity, Nitrate-Nitrite, Oil and Grease, Total Phenols, Total Alkalinity, Total Hardness, Calcium, Magnesium, Potassium, Sodium, Sulphate & Chloride, Total As, Cd, Cu, Cr, Fe, Pb, Hg, Ni, Se, and Zn.	Once before any discharge, monthly when discharging onto the tundra
				D	Daily during periods of discharge
BOS-6*	Not constructed		Effluent from the Landfarm Treatment Facility prior to release	TPH, PAH, BTEX, pH, TSS, Electrical Conductivity, Nitrate-Nitrite, Oil and Grease, Total Phenols, Total Alkalinity, Total Hardness, Calcium, Magnesium, Potassium, Sodium, Sulphate & Chloride, Total As, Cd, Cu, Cr, Fe, Pb, Hg, Ni and Se.	Once before any discharge, monthly when discharging onto the tundra
				D	Daily during periods of discharge
BOS-7*	Not constructed		Runoff from the temporary storage of hydrocarbon contaminated soils prior to discharge onto the tundra	TPH, PAH, BTEX, pH, TSS, Electrical Conductivity, Nitrate-Nitrite, Oil and Grease, Total Phenols, Total Alkalinity, Total Hardness, Calcium, Magnesium, Potassium, Sodium, Sulphate & Chloride, Total As, Cd, Cu, Cr, Fe, Pb, Hg, Ni, Se and Zn.	Once before any discharge, monthly when discharging onto the tundra
				D	Daily during periods of discharge

SNP Station	UTM Easting (Zone 13w)	UTM Northing	Description	Monitoring Parameters	Frequency
BOS-8	Dependent on seepage location, if observed		Seepage/runoff from the ore stockpiles and camp pad, monitored on the tundra to the east of the ore stockpiles	pH, Sulphate & Chloride, Electrical Conductivity, TSS, Total Ammonia, Total As, Total Trace Metals for a minimum of the following elements: Al, Sb, Ba, Cd, Cr, Co, Cu, Fe, Pb, Li, Mn, Mo, Ni, Se, Sn, Sr, Tl, Ti, U, V, Zn	Initially during spring thaw and monthly during periods of observed flow
BOS-9	441230.22	7505333.19	Portal decline, surface water runoff discharged to onto the tundra West of Portal	pH, Sulphate & Chloride, Electrical Conductivity, TSS, Total Ammonia, Total As, Total Trace Metals for a minimum of the following elements: Al, Sb, Ba, Cd, Cr, Co, Cu, Fe, Pb, Li, Mn, Mo, Ni, Se, Sn, Sr, Tl, Ti, U, V, Zn	Once before any discharge
BOS-10*	Not active		Underground Mine Water Sumps pumped from Underground	pH, Sulphate & Chloride, Electrical Conductivity, TSS, Total Ammonia, Total As, Total Trace Metals for a minimum of the following elements: Al, Sb, Ba, Cd, Cr, Co, Cu, Fe, Pb, Li, Mn, Mo, Ni, Se, Sn, Sr, Tl, Ti, U, V, Zn	Three times a year, during periods of water inflow
				D	Daily during periods of discharge
Drill Sites	Dependent on drilling location		Under-ice sampling before and after drilling	pH, TSS, Electrical Conductivity, Total Trace Metals for a minimum of the following elements: As, Al, Sb, Ba, Cd, Cr, Co, Cu, Fe, Hg, Pb, Li, Mn, Mo, Ni, Se, Sn, Sr, Tl, Ti, U, V, Zn	Before and after on-ice drilling
			Water intake from all sources	D	Daily during periods of discharge

Figure C1. 2BB-BOS1727 Sample Stations Locations



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QUALITY ASSURANCE AND QUALITY CONTROL PLAN

HOPE BAY, NUNAVUT

Module D: 2BB-MAE1727

Conformity Table

Licence	Part	Item	Topic	Report Section
2BB-MAE1727	J	14	The Licensee shall submit to the Board for review within 60 (sixty) days prior any major monitoring takes place, a Quality Assurance and Quality Control Plan, prepared in consultation with the accredited laboratory conducting the analysis. The Plan shall include a cover letter from the accredited laboratory confirming approval of the Plan for analysis to be performed under this Licence. The Plan shall be developed in accordance with current Standard Methods and the 1996 Quality Assurance and Quality Control Guidelines for Use by Class “A” Licensees (INAC).	
		15	The Licensee shall annually review the approved Quality Assurance/Quality Control plan and modify it as necessary. Proposed modifications shall be submitted to an accredited laboratory for approval.	
		16	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.	
		17	All analyses shall be performed in a laboratory accredited according to ISO/IEC Standard 17025. The accreditation shall be current and in good standing.	

D1 Introduction

The Type B Water Licence No. 2BB-MAE1727 issued to Agnico Eagle by the Nunavut Water Board (NWB) details the sampling and analysis requirements for the SNP program.

D2 SNP Sampling Stations

Table D1 summarizes the sampling stations, sampling frequency and monitoring parameters required as part of the Surveillance Network Program for water licence 2BB-MAE1727. The locations of these monitoring stations have not yet been established as work at Madrid under this licence. Work at the Madrid North site is monitored under water licence 2AM-DOH1335. Locations of these monitoring stations as approved by the Inspector will be provided with the next version of this plan. Proposed locations for monitoring stations MAE-14, MAE-15 and MAE-16 are illustrated in Figure D1 below.

Table D1. 2BB-MAE1727 Sample Stations, Sample Frequency and Analytical Parameters

SNP Station	UTM Easting	UTM Northing	Description	Monitoring Parameters	Frequency
MAE-01*	Inactive		Madrid North, Freshwater intake at Windy Lake	D	Daily during periods of pumping
MAE-02*	Inactive		Madrid South, Freshwater intake at Patch Lake	D	Daily during periods of pumping
MAE-03*	Inactive		Freshwater intake at other Lakes	D	Daily during periods of pumping
MAE-04*	Inactive		Madrid North Pollution Control Pond (PCP) Water at the point of discharge	pH, TSS, Electrical Conductivity, Oil and Grease, Total Ammonia, Nitrate-Nitrite, Total Phenols, Total Alkalinity, Total Hardness, Chloride, Sulphate, Magnesium, Sodium, Calcium, Potassium, Total As, Cd, Cu, Cr, Fe, Pb, Hg, and Ni	Once, prior to every discharge onto the tundra
				D	Daily during periods of discharge
MAE-05*	Inactive		Madrid South Pollution Control Pond No.1 Water at the point of discharge	pH, TSS, Electrical Conductivity, Oil and Grease, Total Ammonia, Nitrate-Nitrite, Total Phenols, Total Alkalinity, Total Hardness, Chloride, Sulphate, Magnesium, Sodium, Calcium, Potassium, Total As, Cd, Cu, Cr, Fe, Pb, Hg, and Ni	Once, prior to every discharge onto the tundra
				D	Daily during periods of discharge

SNP Station	UTM Easting	UTM Northing	Description	Monitoring Parameters	Frequency
MAE-06*	Inactive		Madrid South Pollution Control Pond No.2 Water at the point of discharge	pH, TSS, Electrical Conductivity, Oil and Grease, Total Ammonia, Nitrate-Nitrite, Total Phenols, Total Alkalinity, Total Hardness, Chloride, Sulphate, Magnesium, Sodium, Calcium, Potassium, Total As, Cd, Cu, Cr, Fe, Pb, Hg, and Ni	Once, prior to every discharge onto the tundra
				D	Daily during periods of discharge
MAE-07*	Inactive		Madrid North Fuel Storage Area Water Sump	pH, TSS, Sulphate, Chloride, Electrical Conductivity, Oil and Grease, Total Ammonia, BTEX, Total Arsenic, Total Lead, Total Trace Metals for a minimum of 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	Once, prior to every discharge onto the tundra
				D	Daily during periods of discharge
MAE-08*	Inactive		Madrid North Fuel Transfer Station Water Sump	pH, TSS, Sulphate, Chloride, Electrical Conductivity, Oil and Grease, Total Ammonia, BTEX, Total Arsenic, Total Lead, Total Trace Metals for a minimum of 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	Once, prior to every discharge onto the tundra
				D	Daily during periods of discharge
MAE-09*	Inactive		Madrid South Fuel Storage Area Water Sump	pH, TSS, Sulphate, Chloride, Electrical Conductivity, Oil and Grease, Total Ammonia, BTEX, Total Arsenic, Total Lead, Total Trace Metals for a minimum of 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	Once, prior to every discharge onto the tundra
				D	Daily during periods of discharge
MAE-10*	Inactive		Madrid South Fuel Transfer Station Water Sump	pH, TSS, Sulphate, Chloride, Electrical Conductivity, Oil and Grease, Total Ammonia, BTEX, Total Arsenic, Total Lead, Total Trace Metals for a minimum of 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	Once, prior to every discharge onto the tundra

SNP Station	UTM Easting	UTM Northing	Description	Monitoring Parameters	Frequency
				D	Daily during periods of discharge
MAE-11*		Inactive	Quarry G Contact Water Sump	pH, TSS, Sulphate, Chloride, Electrical Conductivity, Total Ammonia, Total Arsenic, Total Nickel, Total Trace Metals for a minimum of 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	Once, prior to every discharge onto the tundra
				D	Daily during periods of discharge
MAE-12*		Inactive	Quarry H Contact Water Sump	pH, TSS, Sulphate, Chloride, Electrical Conductivity, Total Ammonia, Total Arsenic, Total Nickel, Total Trace Metals for a minimum of 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	Once, prior to every discharge onto the tundra
				D	Daily during periods of discharge
MAE-13*		Inactive	Quarry I Contact Water Sump	pH, TSS, Sulphate, Chloride, Electrical Conductivity, Total Ammonia, Total Arsenic, Total Nickel, Total Trace Metals for a minimum of 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	Once, prior to every discharge onto the tundra
				D	Daily during periods of discharge
MAE-14*		Inactive	Windy Lake immediately downgradient of the Pollution Control Pond Discharge	Chloride, Electrical Conductivity, Total Dissolved Solids (TDS)	Once prior to each discharge; and a maximum of two weeks post discharge
MAE-15*		Inactive	Patch Lake immediately downgradient of the Pollution Control Pond Discharge	Chloride, Electrical Conductivity, Total Dissolved Solids (TDS)	Once prior to each discharge; and a maximum of two weeks post discharge
MAE-16*		Inactive	Wolverine Lake immediately downgradient of the Pollution Control Pond Discharge	Chloride, Electrical Conductivity, Total Dissolved Solids (TDS)	Once prior to each discharge; and a maximum of two weeks post discharge

SNP Station	UTM Easting	UTM Northing	Description	Monitoring Parameters	Frequency
Drill Sites	Inactive		Under-ice sampling before and after drilling	pH, TSS, Electrical Conductivity, Trace Arsenic, Trace Mercury Total Trace Metals for a minimum of 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	Before and after on-ice drilling
			Water intake from all sources	D	Daily during periods of pumping
Mine Sumps*	Inactive		Water from Madrid South Underground Mine Water Sumps	Total Dissolved Solids, pH, Electrical Conductivity, Chloride, Total Ammonia and Nitrate, Alkalinity, Sulfate, Trace Metals for a minimum of the following elements: As, Al, Sb, Ba, Be, Cd, Cr, Co, Cu, Fe, Pb, Li, Mn, Mo, Ni, Se, Sn, Sr, Tl, Ti, U, V, Zn	Three times per year during periods of Water inflow

Figure D1. 2BB-MAE1727 Sample Stations Locations

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QUALITY ASSURANCE AND QUALITY CONTROL PLAN

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Module E: 2AM-BOS1835

Conformity Table

Licence	Part	Item	Topic	Report Section
2AM-BOS1835	B	13	The Licensee shall, for all plans submitted under this Licence, implement the plan as approved by the Board in writing. Any changes to the plans deemed significant shall be considered as an amendment to the plan(s) or as a modification and must be submitted to the Board for approval in writing. The Board has approved under this Water Licence 2AM-BOS1835, the following plans for implementation under the relevant sections in the Licence: *q. Quality Assurance and Quality Control Plan (January 2017)*	
	I	3	The Licensee shall undertake the Monitoring Program provided in the Tables 1 and 2 of Schedule I. The Licensee shall, in consultation with an Inspector, establish the locations and GPS coordinates for all Monitoring Program stations.	Table E1
		14	The Licensee shall annually review the approved Quality Assurance and Quality Control Plan and modify the Plan as necessary. Proposed changes shall be submitted to an Accredited Laboratory for approval.	Section 1.4
		15	All analyses shall be conducted as described in the most recent edition of “Standard Methods for the Examination of Water and Wastewater” or by other such methods approved by an Analyst.	Sections 2 and 3
		16	All compliance analyses shall be performed in an accredited laboratory according to ISO/IEC Standard 17025. The accreditation shall be current and in good standing.	Section 5

E1 Introduction

The Type A Water Licence No. 2AM-BOS1835 issued to Agnico Eagle by the Nunavut Water Board (NWB) details the sampling and analysis requirements for the SNP program.

E2 SNP Sampling Stations

Table E1 summarizes the sampling stations, sampling frequency and monitoring parameters required as part of the Surveillance Network Program for water licence 2AM-BOS1835. The locations of these monitoring stations have not yet been established as work at Boston under this licence has not yet commenced. Locations of these monitoring stations as approved by the Inspector will be provided with the next version of this plan.

Table E1. 2AM-BOS1835 Sample Stations, Sample Frequency and Analytical Parameters

SNP Station	UTM Easting	UTM Northing	Description	Phase	Monitoring Parameters	Frequency during Operations and any time after initial deposit of Tailings to
BMS-1	Not active		Contact Water Pond #1 and #2	Construction, Operations, Care and Maintenance	G, N1, MT and Total Sulphate, Total CN, Total Oil and Grease, Alkalinity, Chloride, and Total metals by ICP-MS, D	Sampled twice annually; Weekly water levels
BMS-2	Not active		Surge pond at intake to Contact Water Treatment Plant	Construction, Operations, Care and Maintenance, Closure	G, N1, N2, MT, and TDS, Cl, Free CN, Total CN, T-Ag, T-Ca, T-Cd, T-Cr, T-Hg, T-K, T-Mo, T-Mg, T-Na, T-Se, T-Tl, T-Radium 226,	Sampled monthly during discharge periods; Weekly water levels
BMS-3	Not active		Discharge from Contact Water Treatment Plant	Construction (upon Effluent release), Operations, Care and Maintenance, Closure	G, N1, N2, MT, and TDS, Cl, Free CN, Total CN, T-Ag, T-Ca, T-Cd, T-Cr, T-Hg, T-K, T-Mo, T-Mg, T-Na, T-Se, T-Tl, T-Radium 226, D, AT	Sampled weekly during discharge periods and prior to discharge
BMS-4	Not active		Reclaim line from TMA Contact Water Pond	Construction, Operations, Care and Maintenance, Closure	G, N1, N2, MT, and TDS, Cl, Free CN, Total CN, T-Ag, T-Ca, T-Cd, T-Cr, T-Hg, T-K, T-Mo, T-Mg, T-Na, T-Se, T-Tl, HC, D, Fecal coliform	Sampled monthly during reclaim periods; Weekly water levels
BMS-5	Not active		Non-contact Water Pond	Construction, Operations, Care and Maintenance	G, N1, MT and Total Sulphate, Total CN, Total Oil and Grease, Alkalinity, Chloride, and Total metals by ICP-MS, D	Sampled annually; Water levels after large inflow events
BMS-6	Not active		Fresh Water intake at Aimaokatalok Lake	Construction, Operations, Care and Maintenance, Closure	G, N1, N2, MT, and Free CN, Total CN, T-Ag, T-Ca, T-Cd, T-Cr, T-Hg, T-Mo, T-Se, T-Tl, and Total Oil and Grease, Cl, D	Sampled monthly during active pumping periods

SNP Station	UTM Easting	UTM Northing	Description	Phase	Monitoring Parameters	Frequency during Operations and any time after initial deposit of Tailings to
BMS-7	Not active		Landfill Sump	Construction, Operations, Care and Maintenance, Closure	G, MT and Total Ammonia-N, Total Sulphate, Total and Free CN, Total Oil and Grease, D	Annually. Once prior to every discharge onto the tundra
BMS-8	Not active		Discharge of treated Sewage	Construction, Operations, Care and Maintenance, Closure	G, B, and Total Oil and Grease, D	Sampled monthly during active pumping periods
BMS-9	Not active		Landfarm Sump	Construction, Operations, Care and Maintenance, Closure	G, HC, Total Ammonium, Total Lead, D	Annually. Once prior to every discharge onto the tundra
BOS-10	Not active		Site runoff from sediment controls during construction	Construction	TSS or Turbidity	Daily during periods of discharge
BMS-11	Not active		Discharge from the Boston Fuel storage and containment sumps	Construction, Operations, Care and Maintenance, Closure	G, HC, Total Pb	Annually. Once prior to every discharge onto the tundra
					D	Daily during periods of