Appendix E.1

Limited Phase I and Phase II Environmental Site Assessment

Limited Phase I and Phase II Environmental Site Assessment

Goldboro Gold Mine, Guysborough County, Nova Scotia

Anaconda Mining Inc.

November 15, 2021

→ The Power of Commitment

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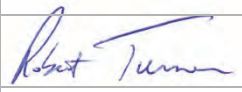
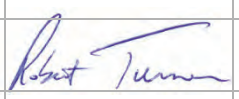
Document status

Status Code	Revision	Author	Reviewer		Approved for issue		
			Name	Signature	Name	Signature	Date
	00	Glen Merkley	Rob Turner		Rob Turner		1-Sep-2021
S4	01	Glen Merkley	Rob Turner		Rob Turner		15-Nov-2021

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1. Introduction

1.1 Scope of Work

GHD Limited (GHD) was tasked by Anaconda Mining Inc. (Anaconda) with assessing the spatial and analytical extent of historic tailings found in the proposed mineral lease area (the Site) for the Goldboro Gold Mine Project (the Project) located in Goldboro, Guysborough County, Nova Scotia (NS). This Limited Phase I and Phase II Environmental Site Assessment (ESA) was conducted as part of the feasibility due diligence for the development of the Project and serves to characterize environmental contamination remaining from historical activity.

The Phase I ESA consists of a records review, site visit observations, an evaluation of information available from previous site work, and a screening of known areas of historic tailings within the area of Upper Seal Harbour. The Phase II ESA included collection of surface soils samples from five previously identified historic tailings areas, a review of analytical data, and recommendations for further assessment. The ESA was limited to the investigation of historic mine tailings found within the proposed mineral lease area for the Project.

1.2 Regulatory Framework

Areas of historic tailings are typically considered as contaminated sites in Nova Scotia and therefore are subject to the Contaminated Sites Regulations. On July 6, 2013, Nova Scotia adopted Contaminated Site Regulations under the Environment Act which requires a property owner to notify Nova Scotia Environment & Climate Change (NSECC) of concentrations of contaminants exceeding the Tier 1 Environmental Quality standards, applicable to the property. Once NSECC is notified, the property would be entered into the Contaminated Site Process (CSP) and the respective property owner is required to fully assess contaminants of concern (COC). Through the CSP all applicable matrices such as soil, groundwater, sediment, surface water, must be assessed during the Phase II ESAs including operable pathways where the COC could pose a risk to human health and/or the environment. Based on the land use and associated receptors, the COC(s) can be managed on the property or there may be a requirement to remediate the property. Given that the property is owned by the Province of Nova Scotia then an appropriate course of action will be determined in consultation with the province. GHD will provide oversight of the program under the supervision of a Qualified Site Professional and provide ongoing management of the file as it relates to contaminated sites legislation.

1.3 Limitations

This report has been prepared by GHD for Anaconda Mining Inc. and may only be used and relied on by Anaconda Mining Inc. for the purpose agreed between GHD and Anaconda Mining Inc. as set out in this report.

GHD otherwise disclaims responsibility to any person other than Anaconda Mining Inc. arising in connection with this report. GHD also excludes implied warranties and conditions, to the extent legally permissible.

The services undertaken by GHD in connection with preparing this report were limited to those specifically detailed in the report and are subject to the scope limitations set out in the report.

The opinions, conclusions and any recommendations in this report are based on conditions encountered and information reviewed at the date of preparation of the report. GHD has no responsibility or obligation to update this report to account for events or changes occurring subsequent to the date that the report was prepared.

The opinions, conclusions and any recommendations in this report are based on assumptions made by GHD described in this report. GHD disclaims liability arising from any of the assumptions being incorrect.

2. Phase I ESA

2.1 Site Description

The proposed Goldboro Gold Mine Project is located in Goldboro, Guysborough County, Nova Scotia. The Project is in the Goldboro region on the Goldboro Deposit, which is characterized by relatively abundant, coarse free gold. The Crown Lease area (the Site) intended for use in the Project is shown in Figure A1, Appendix A.

The Site was originally developed in 1892 as an auriferous ore mine from the Richardson belt. The mine was active from 1893 to 1958 and produced a total of 57,846 troy ounces of gold from a total of 400,516 tonnes of crushed ore. The historic gold mining industry across the province of Nova Scotia utilized various extraction technologies including stamp milling with bromo-cyanide extraction and mercury amalgamation (Parson et al. 2012). The mill and processing facilities were located on the southern end of Gold Brook Lake. The processing route of the ore included being crushed and passed throughout the amalgamation tables, which produced by-product (tailings) that were composed of finely-ground sand-to-silt sized rock particles, water, and processing agents. As a result of the historic operations, tailings deposits are located throughout the Site in watercourses and low-lying areas. As would be expected, tailings were not managed in accordance with present mining practices, and contain elevated concentrations of arsenic and mercury, which pose a threat for environmental contamination in the Project area.

2.2 Records Review

2.2.1 Information Sources

Information sources obtained and reviewed as part of the records review are listed below.

Table 1 Information Sources

Source	Information/Contact
Aerial Photographs	1991, 2008, 2017, and 2020 – Anaconda Aerial Photography Collection
Fire Insurance Plans	None available
City Directories	None available
Previous Environmental Reports	WSP. 2019. Goldboro Site Historic Tailings Assessment, Anaconda Mining Inc. Parson et al. 2012. Environmental Geochemistry of Tailings, Sediments and Surface Waters Collected from 14 Historical Gold Mining Districts in Nova Scotia Percival et al. 2013. Mineralogy and Spectral Reflectance of Soils and Tailings from Historical Gold Mines, Nova Scotia
Company Records	2017 Historic Sample Sites, Goldboro Prospect, Goldboro, NS.
Geological and Geotechnical Reports	Surficial Geology Map of the Province of Nova Scotia, Nova Scotia Department of Natural Resources, Map 92-3, 1992 Geological Map of the Province of Nova Scotia, Nova Scotia Department of Natural Resources, Map ME2000-1, 2000 Map Showing Potential Radon in Indoor Air in Nova Scotia, Province of Nova Scotia, Department of Natural Resources
Regulatory Infractions	Regulatory infraction records for the Site were not requested due to the absence of a civic address.
Reportable Spill Occurrences	Reportable spill occurrence records for the Site were not requested due to the absence of a civic address.
Contaminated Sites	Site is identified as a former gold mine based on Nova Scotia Department of Lands and Forestry (NSDLF) records and a potential source of arsenic and mercury.
Landfill Records	Site is identified as a former gold mine based on NSDLF records and potential source of tailings and waste rock.

Table 1 Information Sources

Source	Information/Contact
Underground & Aboveground Storage Tanks	Tank registration records for the Site were not requested due to the absence of a civic address.
Water Well Records	Based on a search of the Nova Scotia Well Logs Database, the nearest drinking water well to the Site is approximately 700 m away.
Mapping	NTS Sheet 11F04, Guysborough County, Nova Scotia

2.2.2 Previous Reports

The 2012 Geological Survey of Canada report titled 'Environmental geochemistry of tailings, sediments and surface waters collected from 14 historical gold mining districts in Nova Scotia' outlines a historic tailings sampling program conducted by Natural Resources Canada from 2003 to 2006. The objective of the study was to characterize the distribution, chemical form and potential risks associated with the metals released into the Canadian surface environment from natural sources and activities related to their exploitation. This study included an investigation of the area of the Project, termed the upper Seal Harbour Gold District.

Samples of tailings were collected from 20 sites along Gold Brook in 2003 and 2004 up to 4 km downstream of the former mill site. The highest concentrations of arsenic (up to 72,000 mg/kg, or 7.2 wt.%) and mercury (up to 120,000 µg/kg) were measured directly within the foundation of the Richardson Mill. However, high concentrations of both arsenic and mercury are present in the sediments along Gold Brook and are most likely present in the bottom sediments of Seal Harbour Lake as well (Parson et al. 2012).

The 2013 Geological Survey of Canada report titled 'Mineralogy and spectral reflectance of soils and tailings from historical gold mines, Nova Scotia' details extensive dispersion of arsenic and mercury-bearing mine tailings in the receiving environment downstream from many historical mine sites. The report includes studies from Nova Scotia sites related to the spectral reflectance, regional setting, and analytical results of tailings studies in the area. The report concluded that the silt-sized materials that make up most of the historic tailings at mine sites in Nova Scotia contain elevated concentrations of mercury and arsenic and result in potential risks to the receiving environment (Percival et al. 2013).

In 2019, WSP conducted a sampling program to identify the extent of historical tailings on the Goldboro Site. The investigation included a review of the Site digital terrain model and available satellite imagery in addition to chemical data. Thirty-four (34) soil and sediment samples and nine water samples were collected from the Site and analyzed for metals and mercury. The highest concentrations of arsenic in soil and sediment were found at the mouth of Gold Brook Lake near the location of the historic Richardson Mill. Other areas that contain elevated arsenic in sediments include the floodplain of Gold Brook, the wetland area east of Gold Brook and the settling ponds west of Gold Brook and associated wetland areas located to the south and west, a result of the natural transport of tailings from the historic discharge points (WSP 2019).

2.2.3 Physical Setting

2.2.3.1 Surficial Geology

Based on the Surficial Geology Map of Nova Scotia (ME 1992-003), the native surficial soils at the Site consist of till. Stony, sandy matrix material derived from local bedrock sources make up the silty till. The topography of the area is described as flat to rolling, with many surface boulders (Nova Scotia Department of Natural Resources [NSDNR] 1992).

Geochemical samples were collected from till covering the southern mainland Meguma Terrane in Nova Scotia from 1977-1982 by the Canada Department of Regional Economic Expansion and the Nova Scotia Department of Mines. 12 geochemical samples from this survey were collected within 10 km of the Site, as shown in Figure A2. The average

concentration of arsenic from these 12 samples was 82.3 mg/kg, although nine of the samples were reported to have arsenic concentrations greater than 99 mg/kg (NSDNR 2006).

2.2.3.2 Surface Water Drainage

Land cover at the Site consist of open water, wetlands, roadways, and forested areas. Gold Brook runs through the Site from north to south between Gold Brook Lake and Seal Harbour Lake.

2.2.3.3 Bedrock Geology

Based on the Geological Map of the Province of Nova Scotia (ME 2000-001), the bedrock in the area of the site consists of a seam of the Halifax Formation throughout a base of the Goldenville Formation of the Meguma Group.

The Nova Scotia Mineral Occurrence Database contains an occurrence of arsenopyrite located approximately 4 km southeast of the Site (NSDNR 2016). Arsenic is released in soil as a result of weathering of arsenopyrite, which can contribute to elevated background concentrations.

2.3 Site Description

2.3.1 Property Information

The Site is in a rural forested area near Goldboro, Guysborough County, Nova Scotia. The Site consists of portions of two different Crown land properties. Property Identification Numbers (PID Nos.) include:

– PID 35094366, 38,175 hectares (ha), Crown Land
– PID 35094325, 36 ha, Crown Land

The PIDs are not currently serviced being in a rural portion of the province. A summary of the property information is provided in Table 2.

Table 2 Property Details

Current Site Owner:	The Queen in the Right of the Province of Nova Scotia
Legal Description:	Provincial Forest
Property Area:	38,210 ha
Water:	No municipal connections
Storm and Sanitary sewers:	None
Electricity:	Nova Scotia Power
Natural Gas:	None

2.3.2 Historical Land Use

Table 3 provides a chronological review of land use at the Site as described in the 2012 Geological Survey of Canada report titled ‘Environmental geochemistry of tailings, sediments and surface waters collected from 14 historical gold mining districts in Nova Scotia’ (Parson et al. 2012).

Table 3 Historical Land Use

Period/Date	Land Use
1892	Howard Richardson, prospecting along an anticline trace from GSC maps, discovers a large body of low-grade ore, later known as the Richardson belt.

Table 3 Historical Land Use

Period/Date	Land Use
1892–1893	The Richardson Gold Mining Company erects a 15-stamp mill.
1893–1896	Active mining on the Richardson belt; the ore was carried by a trestle 1200 feet long from the shaft to a mill (40 stamps by 1896) on the edge of Gold Brook Lake.
1898–1899	Wilfley concentrators used to treat tailings from the mill; in 1899, 150 tons of arsenopyrite concentrate were saved from the tailings.
1901	20 additional stamps added to the Richardson mill, bringing the total number to 60, and four Wilfley tables in use for recovering sulphide concentrates.
1902–1905	Tailings treated without concentration in an extensive cyanide plant that had been transported from the Caribou district in Fall 1901. Initial operations were unsatisfactory, and tests were made using the bromo-cyanide process.
1905–1912	Active mining by various companies at the Richardson Mine and the East Goldboro property; tailings continued to be treated successfully in a bromocyanide plant containing Wilfley tables for concentration; in 1909, 83% of the gold was being recovered by amalgamation, and 17 percent by bromo-cyanide extraction of concentrate; during this period, large tonnages of arsenical concentrate were shipped first to Germany, and later to Wales for smelting.
1912–1927	Intermittent activity by various companies, including treatment of tailings.
1988–present	Surface exploration, shaft rehabilitation, surface and underground diamond drilling and limited underground exploration.

2.4 Site Visit Findings

2.4.1 Current Site Operations

The Site was used for a bulk sampling program conducted from 2018-2019 as part of advanced exploration activities to confirm the geological interpretation of the deposit, test for spatial and grade continuity of the mineralized structures, validate key assumptions of the updated Mineral Resource model, and test mining method parameters to optimize the extraction of the mineralized material. Infrastructure remaining on-Site from the bulk sampling program includes mine buildings, the remainder of the bulk sample stockpile and run-off collection system, and settling ponds. Underground mine workings and a flooded mine portal and shaft are also present on-Site.

2.4.2 Waste Generation and Storage

No hazardous waste generation or storage was identified to be conducted on the Site. Waste on the Site is characterized as waste rock from historical mining and occasional metal debris.

No sources of air emissions that are suspected to result in residual contamination to the Properties were identified on the Site. Further, no strong, pungent, or unusual odours were identified.

2.4.3 Fuel and Chemical Storage

2.4.3.1 Underground Storage Tanks

No chemical or fuel storage USTs were identified on the Site. No vent or fill pipes indicating the potential presence of an abandoned or decommissioned UST were observed.

2.4.3.2 Aboveground Storage Tanks

No permanent chemical or fuel storage ASTs were identified on the Site. There are mobile tanks associated with the exploration process that are not considered to be a potential environmental concern to the Site.

2.4.3.3 Other Storage Containers

No permanent chemical storage was observed on the Site.

2.4.4 Exterior Site Observations

2.4.4.1 Surface Features

No hydrocarbon-stained surficial materials were observed on the Site. It was noted that in locations there are exposed historic tailings present at the surface, as well as areas of waste rock. There are several abandoned mine openings at the Site which are identified on Site maps and with signage.

2.4.4.2 Fill Materials

There are areas of exposed historic mine tailings at the Site. Tailings are believed to have been placed on the native till layer as early as 1892.

2.4.4.3 Wells

No abandoned or existing wells were encountered on the Site. The Nova Scotia Well Logs Database does not indicate any domestic, commercial, or industrial water wells on the Site properties.

2.4.4.4 Asbestos-Containing Materials (ACMs)

As the properties are undeveloped, no suspected ACMs were identified on the Site during the Site visit.

2.4.4.5 Polychlorinated Biphenyls (PCBs)

No oil-filled transformers or lamps ballasts were observed on the Site.

2.4.4.6 Lead-Based Materials

As the properties are undeveloped, no suspected lead-based materials were identified on the Site during the Site visit.

2.4.4.7 Urea Formaldehyde Foam Insulation (UFFI)

As the properties are undeveloped, no UFFI was identified on the Site during the Site visit.

2.4.4.8 Ozone-Depleting Substances (ODSs)

As the properties are undeveloped, no equipment containing ODSs was identified on the Site.

2.4.5 Special Attention Items

2.4.5.1 Radon Gas

Based on the online map supplied by NSDLF, the Site is in an area of low radon potential (NSLF 2009).

2.4.5.2 Microbial Contamination (Mould) and Indoor Air Quality

As the properties are undeveloped, no visual evidence or suspected indoor mould growth was identified on the Site.

2.4.5.3 Electromagnetic Frequencies (EMFs)

No high-voltage transmission lines or electrical substations, which could generate significant electromagnetic field were identified on or adjacent to the Site.

2.4.5.4 Noise and Vibration

Current Site activity involving drilling generates intermittent and non-permanent noise/vibration, however given the proposed industrial nature of the surrounding area this is not considered to be a concern.

2.4.6 Neighbouring Property Information

The Site is surrounded by undeveloped forested land to the north and east. Several of the adjacent properties to the south and west contain residences on Marine Drive, Goldboro. The nearest residence to the historic tailings likely to be disturbed by Project activity is approximately 1.8 km to the southwest. The Maritimes & Northeast natural gas pipeline is located west of proposed Project infrastructure, and approximately 500 m west of the historic tailings likely to be disturbed by Project activity. The former Goldboro Gas Plant is located approximately 2.5 km southwest of the Site. In 2014 the Province of Nova Scotia issued an environmental assessment approved for the proposed Goldboro Liquified Natural Gas (LNG) project located at the site of the former Goldboro Gas Plant. Numerous abandoned mine openings (AMOs) are located on the Site and surrounding properties.

2.5 Historic Tailings Screening

In order to better define the potential impact of Project activities on historic tailings, a screening table was produced by GHD to summarize available information on 17 previously identified areas of historic tailings in the vicinity of Goldboro. Tailings areas A through Q are shown in Figure A2, Appendix A. The historic tailings screening table is provided in Appendix B, and includes the following detail:

– Land ownership (Crown / Non-Crown);
– Approximate location;
– Elevation;
– Approximate area;
– Approximate depth / thickness;
– Availability of geochemical data;
– COCs;
– Location relative to exploration license area, proposed mine pit, and proposed tailings management facility (TMF);
– Expected direct or indirect disturbance by mine operations;
– Deposit environment;
– Underlying lithology;
– Proximity to potential receptors;
– Potential migration pathways;
– Ecological considerations; and,
– Human health and recreational considerations.

Based on a review of previous tailings delineations (produced using sampling completed by the Geological Survey of Canada, WSP, and Anaconda), historic tailings areas F through Q are not anticipated to be directly or indirectly impacted by proposed Project infrastructure and therefore are not given further consideration at this time. Tailings areas P and Q are recommended to be re-screened using the results of groundwater and surface water modelling conducted for the Project to assess possible changes to flow regime. Five tailings areas, A through E, are located in the vicinity of the Project and are likely to be disturbed by proposed activity. These five areas are the focus of further

investigation, however only the near field of the Gold Brook will be investigated where direct impacts may occur through mine development and operation.

3. Phase II ESA

3.1 Methodology

3.1.1 Surface Soil Sampling Program

In order to delineate the horizontal extent of historic tailings areas A through E, manual samples were collected using a hand auger. Samples were collected by GHD from June 14 - 17, 2021, with additional samples collected by Anaconda on September 1, 2021. Samples were collected from ground surface to a maximum depth of 1.5 m, subject to refusal. A total of 272 delineation points were manually inspected, including descriptions of lithology and if any tailings material was encountered. Coordinates were recorded at each delineation point using a handheld GPS to establish the horizontal extent of visually confirmed tailings. A total of 84 delineation points were sampled for soil analysis. Samples were visually inspected and submitted for analysis based on visual observations and geographic distribution. Delineation points and sample locations are shown in Figure A3 in Appendix A. Photos taken during the sampling program are provided in Appendix C.

The following summarizes the assessment locations per historic tailings areas:

– Tailings Area A: Total of 63 delineation locations with the collection of 27 soil samples for laboratory analysis.
– Tailings Area B: Total of 68 delineation locations with the collection of 15 soil samples for laboratory analysis.
– Tailings Area C: Total of 22 delineation locations with the collection of 6 soil samples for laboratory analysis.
– Tailings Area D: Total of 44 delineation locations with the collection of 19 soil samples for laboratory analysis.
– Tailings Area E: Total of 75 delineation locations with the collection of 17 soil samples for laboratory analysis.

3.1.2 Sample Handling

The samples were placed in laboratory supplied clean glass jars. The jars were placed in a cooler with ice packs for transport to the laboratory. To minimize the potential for cross-contamination, the sampling equipment was thoroughly rinsed between each sampling event or samples were obtained from soil that never contacted the excavation equipment. Samples not submitted for laboratory analysis were archived for potential future analysis.

3.1.3 Field and Laboratory Program

The field and laboratory program is summarized in Table 4. Samples were submitted to Bureau Veritas in Bedford, NS, and to Eastern Analytical in Springdale, Newfoundland and Labrador (NL). Bureau Veritas and Eastern Analytical are accredited by the Standards Council of Canada for each of the analysis methods utilized and have in-house quality assurance/quality control (QA/QC) programs to govern sample analysis, including replicates. The results of this analysis are presented in Tables D.1 through D.6 in Appendix D. Laboratory certificates of analysis are provided in Appendix E.

Table 4 Field and Laboratory Program

Analytes	Matrix	Samples Submitted	Sample IDs	QA/QC Samples	
				Field Duplicates	Analytes
General chemistry and available metals	Soil	56	Assorted, A-05 – E-74	6	General chemistry and metals
Available mercury	Soil	83	Assorted, A-05 – E-74, ANX-A1a – ANX-D8a	8	Available mercury
Total metals	Soil	27	Assorted, ANX-A1a – ANX-D8a	2	Total metals
Leachable arsenic	Soil	12	Assorted, A-14 – E-45	3	Leachable arsenic
Total organic carbon (TOC)	Soil	14	Assorted, A-24 – E-35	1	Total organic carbon (TOC)
Modified acid-base accounting	Soil	6	Assorted, A-24 – E-35	1	Modified acid-base accounting
Grain size analysis	Soil	13	Assorted, A-14 – E-45	1	Grain size analysis

3.1.4 Quality Assurance/Quality Control Sampling Program

GHD utilizes a protocol for collecting and analyzing samples which is defensible in legal forums. This protocol meets the requirements outlined in the "Handbook of Analytical Methods of Environmental Samples" and "A Guide to the Collection and Submission of Samples for Laboratory Analysis".

To ensure the integrity of the laboratory results in any sampling program, it is necessary to develop and use a QA/QC program. QA/QC samples are required to ensure, or at least quantify, the accuracy and precision of the field sampling methodology and the analytical results. The QA/QC sampling was conducted on over 10% of parameters that were analyzed. QA/QC was addressed by collecting field duplicates. The results of this testing were used to evaluate the reliability of the sampling. Each duplicate was a blind duplicate in that the sample was not identified as a duplicate to the laboratory. The results of this testing were used to evaluate the reliability of the sampling. QA/QC results are provided in Section 3.5.

3.2 Results of Field Investigation

3.2.1 Field Observations

Pertinent field observations and coordinates for the 245 delineation points collected by GHD are provided in Appendix F. The horizontal extent of visually observed tailings is presented in Figures A4, A5, and A6.

3.2.2 Stratigraphy

Samples were collected from ground surface to a maximum depth of 1.5 m, subject to refusal. Most of the upper layer of the delineation points consisted of organics, while some points were located in wetland areas with exposed tailings. Exposed bedrock was observed in three locations within the surrounding area. The majority of soils encountered in the program consisted of light to dark brown silty sand. Tailings material was described as grey-green sand. Soil stratigraphy recorded at each delineation point is provided in the test hole data table in Appendix F.

3.3 Preliminary Site Exposure Scenario Assessment

Based on the definitions provided in the NSECC Notification of Contamination Protocol (2021), the use of industrial land use, potable water, and coarse-grained soil criteria from the Tier 1 Environmental Quality Standards (EQS) is considered appropriate.

Industrial land use criteria are recommended for areas used for the production, manufacturing, or construction of goods, and which do not permit direct public access. Upon Project development, historic tailings areas A through E will be in the vicinity of mine infrastructure and access to these areas will be restricted to workers.

Following the determination of groundwater potability flow chart provided in the NSECC Notification of Contamination Protocol (2021), groundwater at the Site is considered potable as no municipal water is available.

Site Exposure Scenario
• Industrial
• Potable
• Coarse-grained soil

13 soil samples collected in this program were submitted for grain size analysis. The majority of these samples contained material having greater than 50% particles equal to or greater than 75 microns in diameter. As described in the NSECC Notification of Contamination Protocol (2021), coarse-grained soil criteria should be used for the Site.

Analytical data collected during this program was also compared to the Canadian Council of Ministers of the Environment (CCME) Canadian Soil Quality Guidelines for the Protection of Environmental (SQG_E) and Human Health (SQG_{HH}), industrial land use.

3.4 Laboratory Analytical Results for Soil

Laboratory analytical results for metals in soil are presented in Table D.1, Appendix D. Available arsenic exceeded NS Tier 1 EQS in 53 samples, with five of these exceedances occurring in field duplicates. Available arsenic also exceeded CCME SQG_{HH} in 39 samples (including 4 field duplicates) and SQG_E in 41 samples (including 4 field duplicates).

Available selenium exceeded NS Tier 1 EQS in 12 samples and SQG_E in two samples. Available zinc exceeded NS Tier 1 EQS in one sample and did not exceed SQG_E or SQG_{HH}. None of the other parameters analyzed during this program exceeded applicable criteria.

Soil Available Metals Samples
• 62 samples submitted (including six field duplicates)
• 53 arsenic exceedances to NS Tier 1 EQS (including five field duplicates)
• 12 selenium exceedances to NS Tier 1 EQS (no field duplicates)
• 1 zinc exceedance to NS Tier 1 EQS
• No other exceedances

The exceedances can be attributed to the historic tailings in the area, and to naturally occurring background metals concentrations. Arsenic, selenium, and zinc are listed as substances potentially considered as background occurrences in the Nova Scotia Notification of Contamination Protocol (NSECC 2021).

3.5 Quality Assurance / Quality Control Discussion

QA/QC sampling consisted of the collection and analysis of approximately 10% of the samples for quality control. This program permits the evaluation of the representativeness of the samples. Bureau Veritas and Eastern Analytical also submitted their own duplicate samples to ensure their own quality control.

Table 5 Summary of QA/QC Sampling

Field Duplicate Analysis	Range of %RPD	Number of Analytes within ±40% RPD	Acceptable Duplicate Correlation
Metals (soil)	0% to 67%	23 of 27	Yes
General chemistry (soil)	0% to 115%	8 of 9	Yes

In general, the duplicate results agree closely with their corresponding samples and confirm the representativeness of the sampling procedures. There are no firm guidelines for the degree of correlation expected between duplicates due to natural heterogeneity in soil type (*e.g.* grain size, clay fraction) and contaminant distribution. However, the values noted above are considered to indicate an acceptable duplicate correlation.

Four metals parameters, arsenic and nickel from sample ANX-A4b and its duplicate, lead from samples B-37 and DUP-B, and manganese from samples C-03 and DUP-C, produced RPDs greater than 40% (43%, 43%, 67% and 48%, respectively). Orthophosphate in samples B-37 and DUP-B produced an RPD of 115%. The other RPDs calculated from field duplicate samples were under 40%. The overall laboratory and field data quality is considered acceptable.

3.6 Contaminant Distribution

3.6.1 Arsenic Exceedances in Soil

Arsenic exceedances were present in each of the historic tailings areas assessed (A through E). The locations of soil arsenic exceedances are presented in Figure A4. Horizontal and vertical delineation of arsenic impacted soil was not achieved during this program.

3.6.2 Selenium Exceedances in Soil

Selenium exceedances were present in each of the historic tailing areas assessed (A through E). The locations of soil selenium exceedances are presented in Figure A5. Horizontal and vertical delineation of selenium impacted soil was not achieved during this program.

3.6.3 Zinc Exceedances in Soil

Zinc exceedances were present in historic tailings area B and were not recorded in the other areas assessed. The location of the zinc exceedance is presented in Figure A6. The horizontal extent of zinc impacted soil is approximately 2,200 m^2. Horizontal delineation of zinc impacted soil was achieved during this program, however vertical delineation is still required.

4. Conclusions and Recommendations

Based on the information gathered and on observations made during this investigation, this Limited Phase I and Phase II ESA has revealed evidence of environmental contamination associated with the subject property. Results of the study are as follows:

– The Site was originally developed in 1892 as an auriferous ore mine from the Richardson belt. The mine was active from 1893 to 1958 and produced a total of 57,846 troy ounces of gold from a total of 400,516 tonnes of crushed ore. The mill and processing facilities were located on the southern end of Gold Brook Lake and produced by-product (tailings) that were composed of finely-ground sand-to-silt sized rock particles, water, and processing agents. As a result of the operations, tailings deposits are located throughout the site in water courses and low-lying areas. The tailings were not managed in accordance with present mining practices, and contain

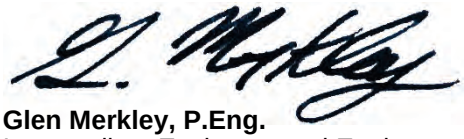
high concentrations of arsenic and mercury, which pose a threat for environmental contamination through potential increased activity in the area.

– Based on a review of previous tailings delineations (produced using sampling completed by the Geological Survey of Canada, WSP, and Anaconda), 17 areas of historic tailings were identified in the vicinity of Goldboro. The majority of these areas are not anticipated to be directly or indirectly impacted by proposed Project infrastructure and therefore are not given further consideration at this time. Five tailings areas, A through E, are located in the vicinity of the Project and are likely to be disturbed by proposed activity.
– In order to delineate the horizontal extent of historic tailings areas A through E, manual samples were collected using a hand auger. A total of 272 delineation points were manually inspected, including descriptions of lithology and any tailings material encountered; 84 of these delineation points were sampled for soil analysis.
– Concentrations of arsenic, selenium, and zinc in exceedance of the NS Tier 1 EQS were present in the historic tailing areas assessed (A through E). Horizontal and vertical delineation of arsenic and selenium impacted soil was not achieved during this program. Further sampling is recommended to better define the horizontal and vertical extent of metals contamination.

5. Closure

This report was prepared by Glen Merkley and reviewed by Robert Turner.

All of which is respectfully submitted



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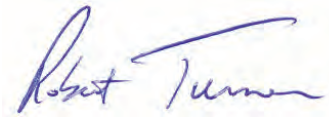

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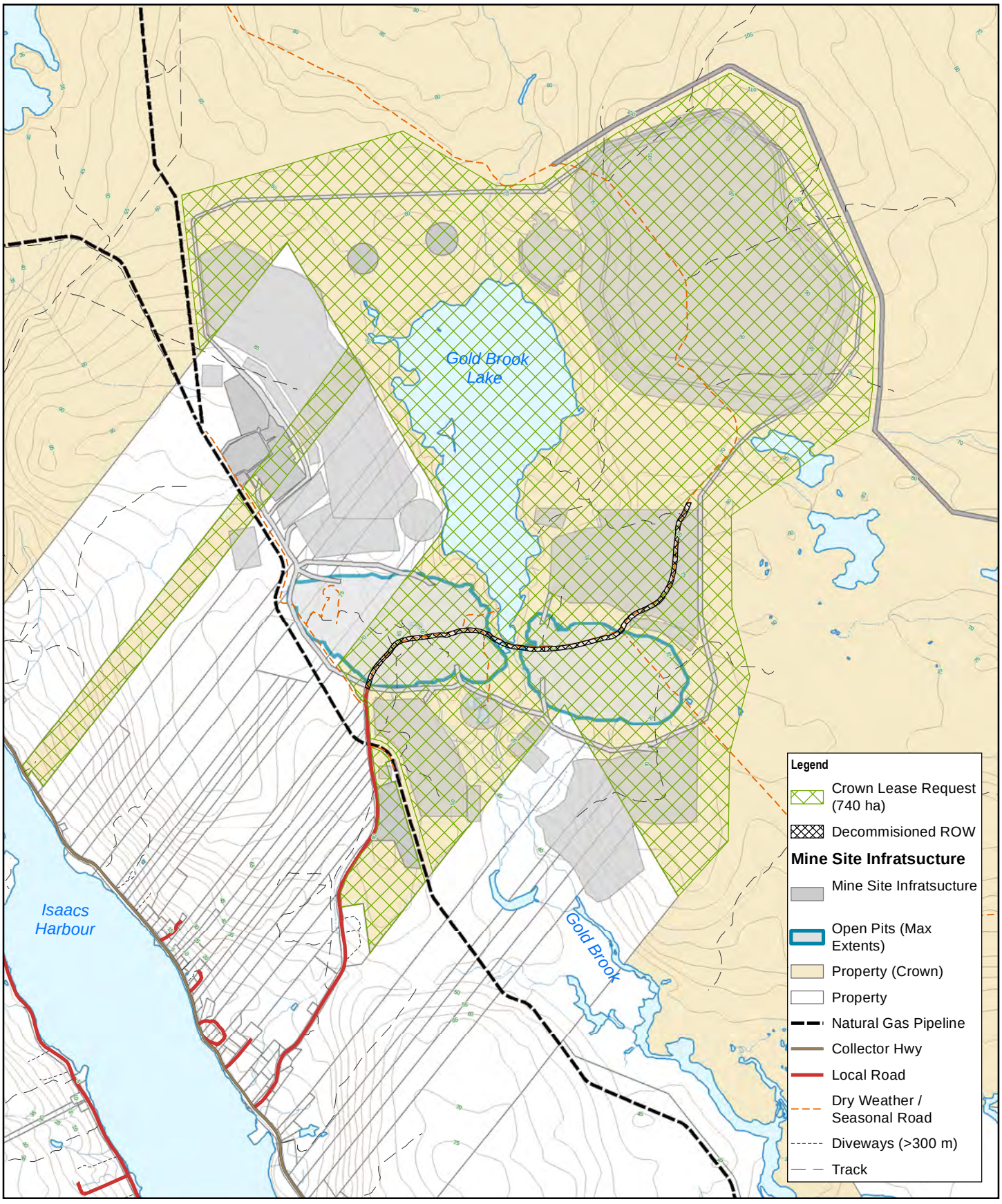
Appendix A

Figures



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GHD

ANACONDA MINING INC
GOLDBORO GOLD PROJECT
LIMITED PHASE I/II ESA

Project No. **11222385**
Revision No. **-**
Date **10/11/2021**

SITE PLAN

FIGURE A1

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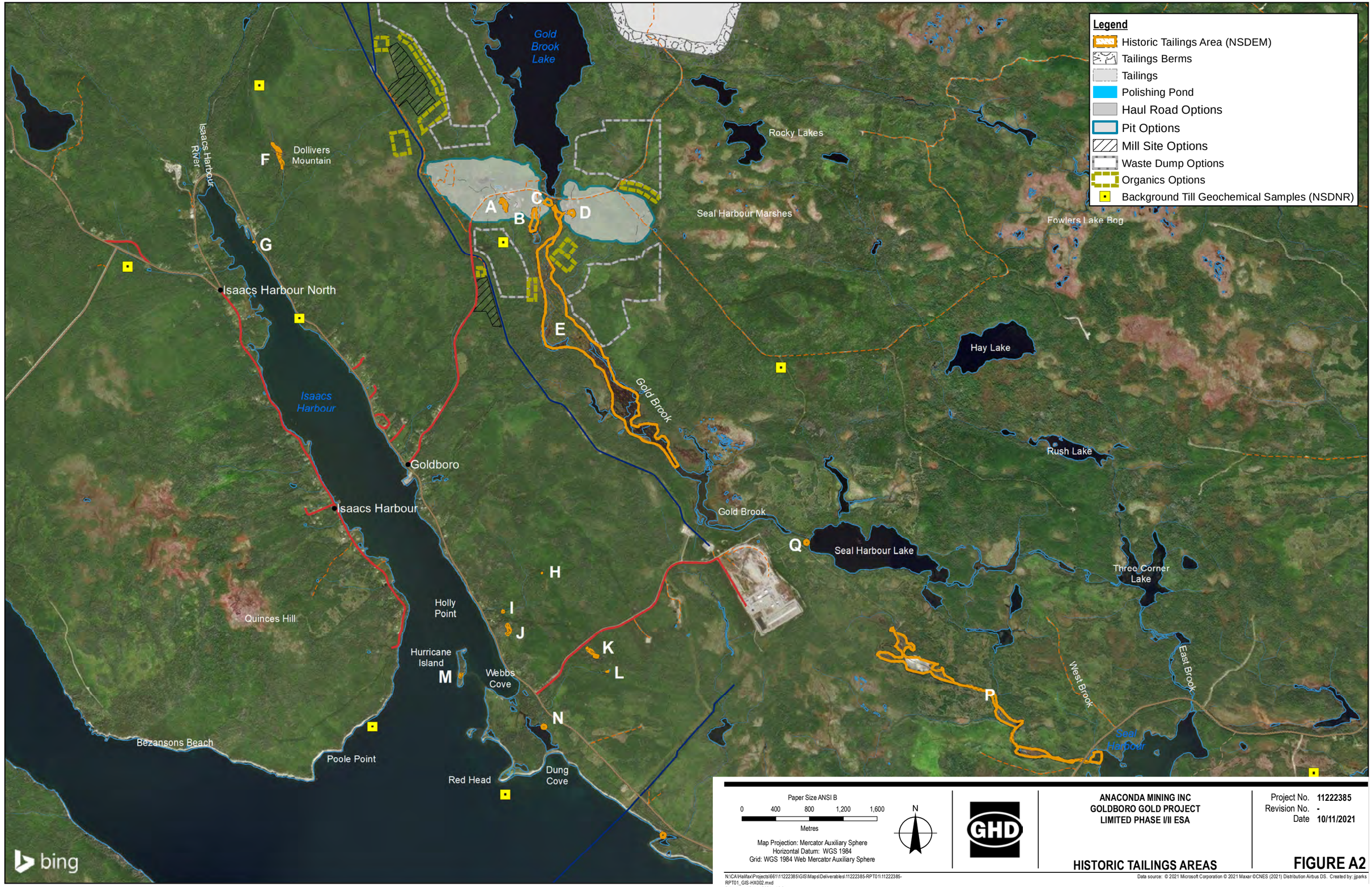

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ANACONDA MINING INC
GOLDBORO GOLD PROJECT
LIMITED PHASE I/II ESA

Project No. 11222385
Revision No. -
Date 10/11/2021

HISTORIC TAILINGS AREAS

FIGURE A2

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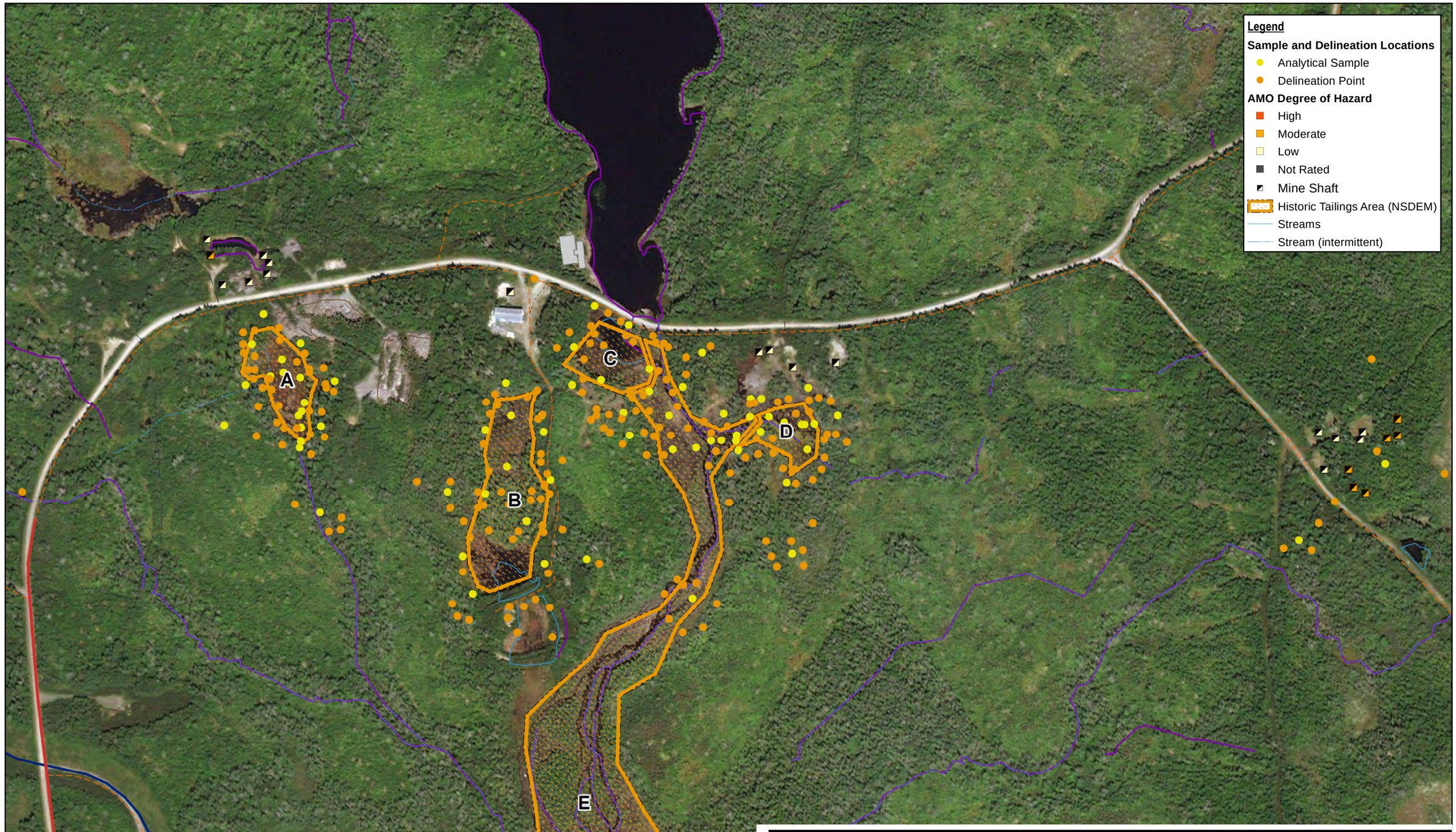

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ANACONDA MINING INC
GOLDBORO GOLD PROJECT
LIMITED PHASE I/II ESA

HISTORIC TAILINGS
2021 SOIL SAMPLE LOCATIONS

Project No. **11222385**
Revision No. **-**
Date **10/11/2021**

FIGURE A3

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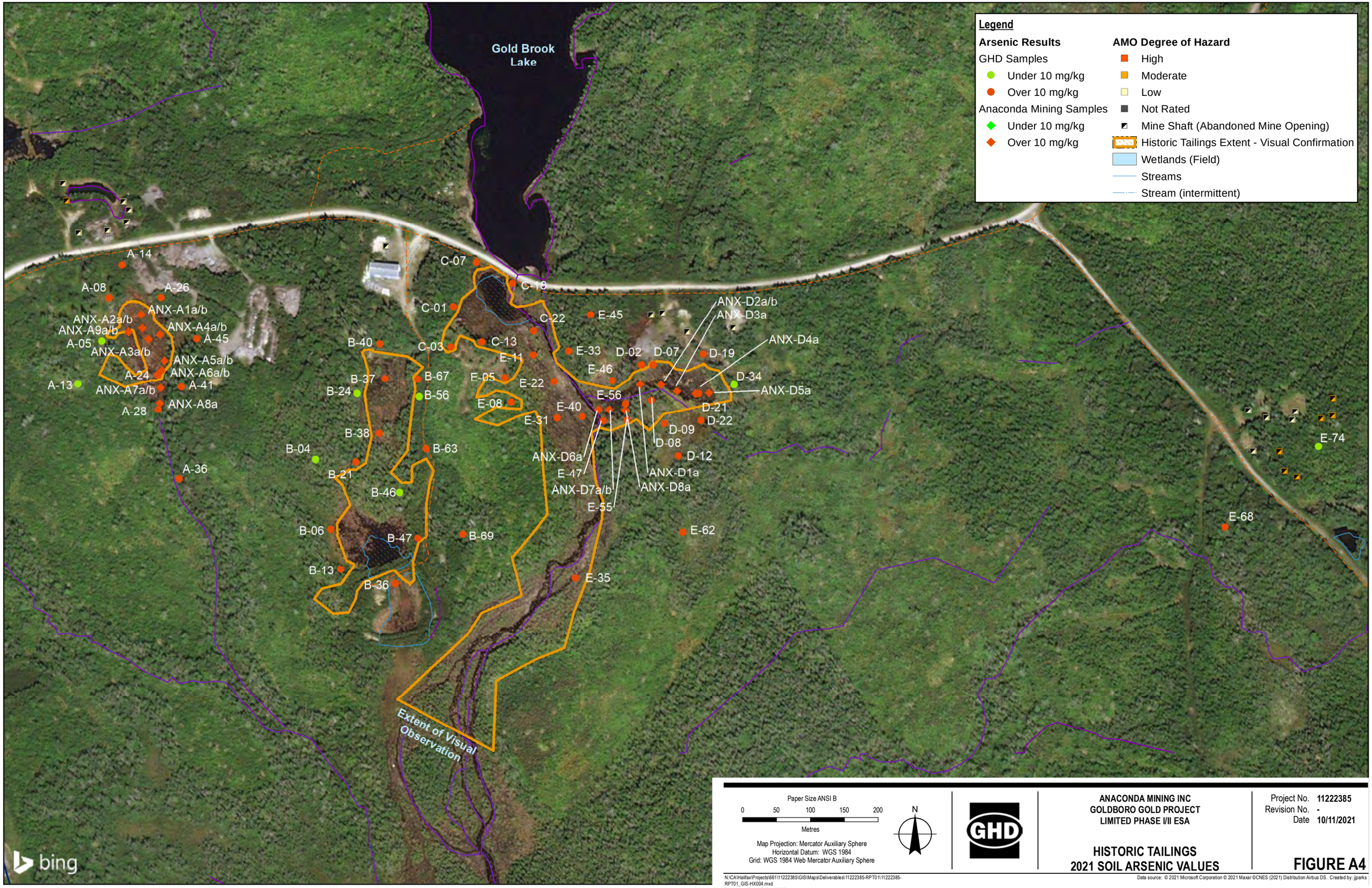

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ANACONDA MINING INC
GOLDBORO GOLD PROJECT
LIMITED PHASE I/II ESA

HISTORIC TAILINGS
2021 SOIL ARSENIC VALUES

Project No. **11222385**
Revision No. **-**
Date **10/11/2021**

FIGURE A4

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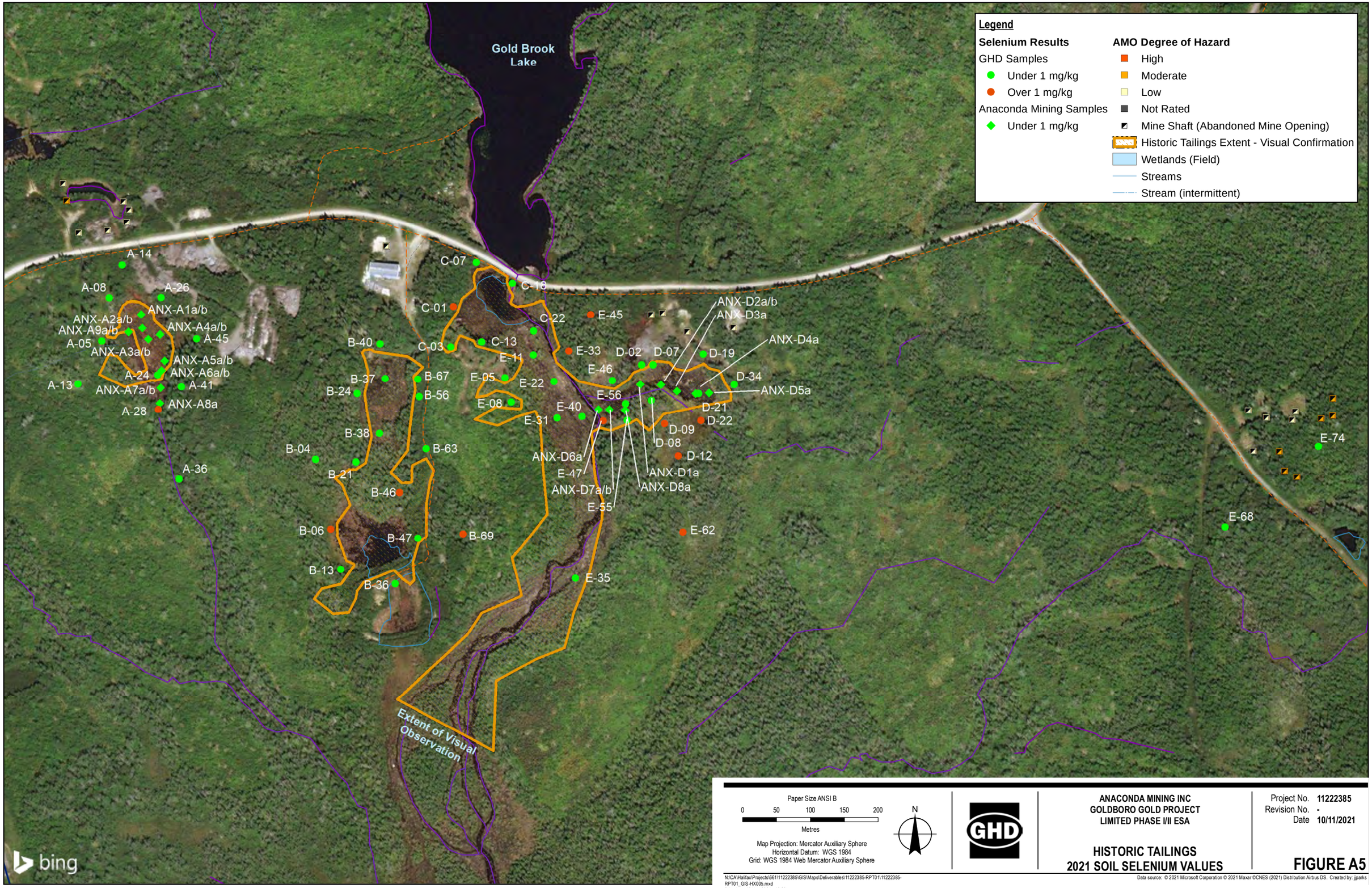

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ANACONDA MINING INC
GOLDBORO GOLD PROJECT
LIMITED PHASE I/II ESA

HISTORIC TAILINGS
2021 SOIL SELENIUM VALUES

Project No. **11222385**
Revision No. **-**
Date **10/11/2021**

FIGURE A5

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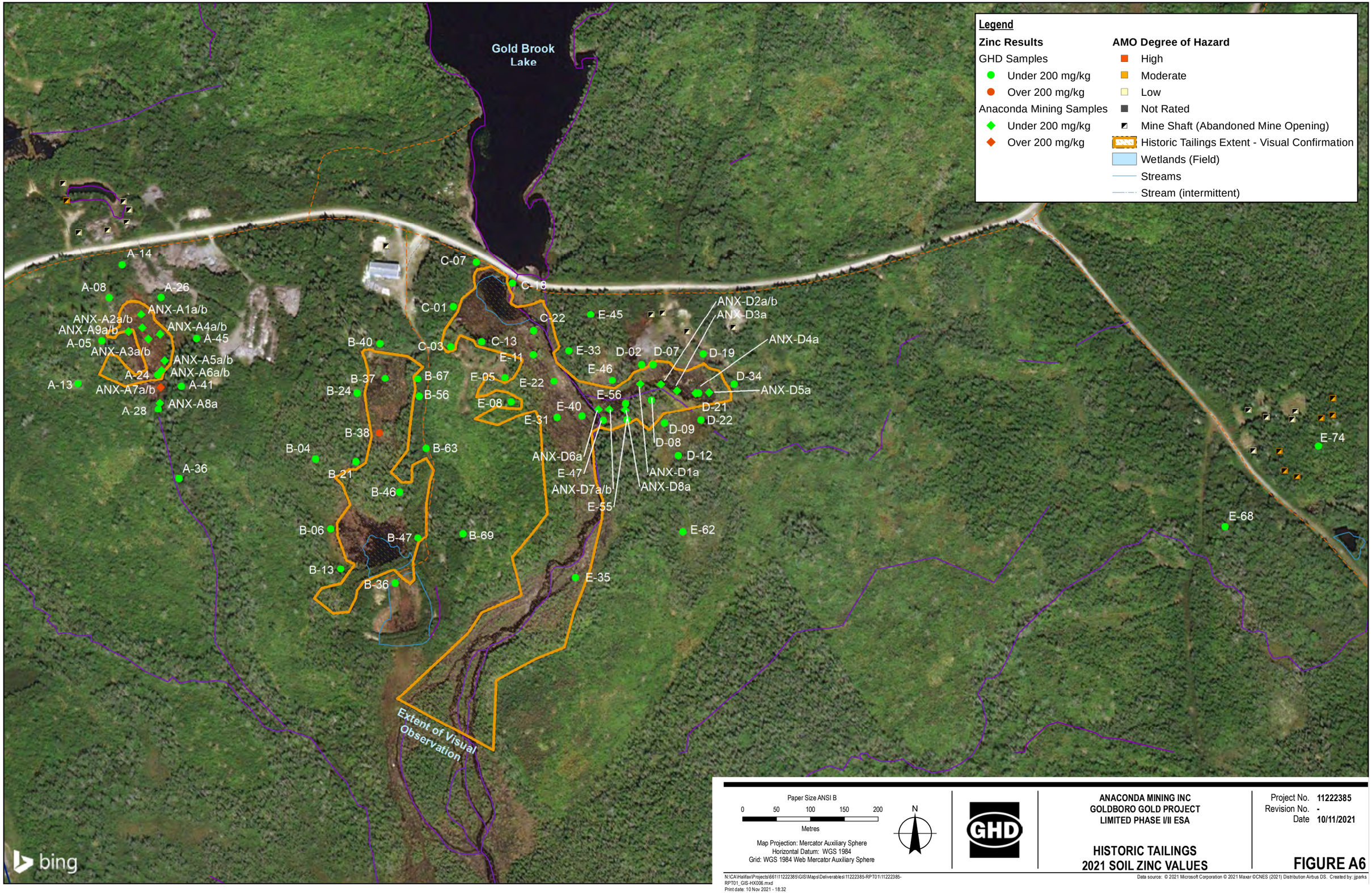

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ANACONDA MINING INC
GOLDBORO GOLD PROJECT
LIMITED PHASE I/II ESA

HISTORIC TAILINGS
2021 SOIL ZINC VALUES

Project No. **11222385**
Revision No. **-**
Date **10/11/2021**

FIGURE A6

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Appendix B

Historic Tailings Screening Table

Area Details	Tailings Area A	Tailings Area B	Tailings Area C	Tailings Area D
Previous Literature Reference Name(s)	Goldboro (Richardson)	Goldboro	Coldboro Main (Boston-Richardson)	Coldboro Main (Boston-Richardson)
Land Ownership (Crown/Non Crown)	Crown	Crown	Crown	Crown
Approx. Center Location (Easting/Northing)	606675E;5006270N	606925E;5006135N	607035E;5006295N	607240E;5006210N
Elevation (masl)	60	53	53	53
Approx. Area (ha)	0.63	1.42	0.41	0.46
Approx. Depth/Thickness (m)	Unknown	Unknown	Unknown	Unknown
Geochemistry Data Exists	Yes	Yes	Yes	Yes
Contaminants of Concern	As, Hg	As, Hg	As, Hg	As, Hg
Located within Exploration License Area?	Yes	Yes	Yes	Yes
Located within Proposed Mine Pit?	Yes	Yes	Yes	Yes
Located Within Proposed TMF?	No	No	No	No
Direct Disturbance by Mine Ops?	Yes	Yes	Yes	Yes
Indirect Disturbance by Mine Ops?	Likely	Likely	Likely	Likely
Deposit Environment	Wetland	Wetland	Wetland	Wetland
Underlying Lithology	Stony Till Plain	Stony Till Plain	Stony Till Plain	Stony Till Plain
Proximity to Potential Receptor	500 m	200 m	0 m	100 m
Type of Potential Receptor	Gold Brook	Gold Brook	Gold Brook	Gold Brook
Distance to nearest Residence	>2km	>2km	>2km	>2km
Potential Migration Pathway	Surface/Groundwater, Disturbance	Surface/Groundwater, Disturbance	Surface/Groundwater, Disturbance	Surface/Groundwater, Disturbance
Engineering Considerations	Pit wall design; access roads	Pit wall design; access roads; Settling Pond	Pit wall design; access roads	Pit wall design; access roads
Ecological Considerations	Wetland; Fish, others?	Wetland; Fish, others?	Wetland; Fish, others?	Wetland; Fish, others?
Human Health / Recreational Considerations	Mine workers / Trespassers	Mine workers / Trespassers	Mine workers / Trespassers	Mine workers / Trespassers
Environment / Water Considerations	Wetland / Gold Brook	Wetland / Gold Brook	Wetland / Gold Brook	Wetland / Gold Brook

Area Details	Tailings Area E & E'	Tailings Area F	Tailings Area G	Tailings Area H	Tailings Area I
Previous Literature Reference Name(s)	Coldboro Main (Boston-Richardson)	Goldboro (Dolliver Mountain)	Isaac's Harbour (Butler)	Isaac's Harbour (Goldfinch)	Isaac's Harbour (Mulgrave,Gallagher)
Land Ownership (Crown/Non Crown)	Both	Both	Non-Crown	Non-Crown	Non-Crown
Approx. Center Location (Easting/Northing)	607111E;5005398N	604795E;5006628N	604587E;5005921N	607037E;5003205N	606718E;5002882N
Elevation (masl)	variable (30-50)	56	0	53	31
Approx. Area (ha)	38.9	1.04	0.06	0.05	0.12
Approx. Depth/Thickness (m)	Unknown	Unknown	Unknown	Unknown	Unknown
Geochemistry Data Exists	Yes	No	No	No	No
Contaminants of Concern	As, Hg				
Located within Exploration License Area?	Yes	Yes	Yes	No	No
Located within Proposed Mine Pit?	Possible	No	No	No	No
Located Within Proposed TMF?	No	No	No	No	No
Direct Disturbance by Mine Ops?	Possible	Not Likely	Not Likely	No	No
Indirect Disturbance by Mine Ops?	Possible	Not Likely	Not Likely	Not Likely	Not Likely
Deposit Environment	Wetland/Brook	Wetland	Kame/Esker (coastal inlet)		
Underlying Lithology	Stony Till Plain	Stony Till Plain	Kame/Esker	Stony Till Plain	Stony Till Plain
Proximity to Potential Receptor	0 m	500 m	0 m		
Type of Potential Receptor	Gold Brook	Coastal Inlet	Coastal Inlet		
Distance to nearest Residence	>2km	~ 500m	65m (location assumed)		
Potential Migration Pathway	Surface/Groundwater, Disturbance	Surface/Groundwater, Disturbance			
Engineering Considerations	Pit wall design; access roads	N/A	N/A	N/A	N/A
Ecological Considerations	Wetland; Fish, others?	Wetland			
Human Health / Recreational Considerations	Mine workers / Trespassers				
Environment / Water Considerations	Wetland / Gold Brook	N/A	Coastal inlet		

Area Details	Tailings Area J	Tailings Area K	Tailings Area L	Tailings Area M	Tailings Area N	Tailings Area O
Previous Literature Reference Name(s)	Isaac's Harbour (Sweet,Stormont,Victory)	Isaac's Harbour (Rocland, Skunk Den, Giffin, Eureka)	Isaac's Harbour (Rocland, Skunk Den, Giffin, Eureka)	Isaac's Harbour (Hurricane Island)	Isaac's Harbour (Griffin)	Isaac's Harbour (Buckley/Hattie)
Land Ownership (Crown/Non Crown)	Non-Crown	Non-Crown	Non-Crown	Non-Crown	Non-Crown	Non-Crown
Approx. Center Location (Easting/Northing)	606775E;5002735N	607495E;5002535N	607580E;5002400N	606375E;5002345N	607080E;5001930N	608085E;5001045N
Elevation (masl)	30	40	34	2	7	0
Approx. Area (ha)	0.13	0.36	0.2	0.04	0.3	0.31
Approx. Depth/Thickness (m)	Unknown	Unknown	Unknown	Unknown	Unknown	Unknown
Geochemistry Data Exists	No	No	No	No	No	No
Contaminants of Concern						
Located within Exploration License Area?	No	No	No	No	No	No
Located within Proposed Mine Pit?	No	No	No	No	No	No
Located Within Proposed TMF?	No	No	No	No	No	No
Direct Disturbance by Mine Ops?	No	No	No	No	No	No
Indirect Disturbance by Mine Ops?	Not Likely	Not Likely	Not Likely	Not Likely	Not Likely	Not Likely
Deposit Environment				Island	Coastal inlet	Coastal inlet
Underlying Lithology	Stony Till Plain	Stony Till Plain	Stony Till Plain	Stony Till Plain	Stony Till Plain	Stony Till Plain
Proximity to Potential Receptor						
Type of Potential Receptor						
Distance to nearest Residence						
Potential Migration Pathway						
Engineering Considerations	N/A	N/A	N/A	N/A	N/A	N/A
Ecological Considerations						
Human Health / Recreational Considerations						
Environment / Water Considerations						

Area Details	Tailings Area P	Tailings Area Q
Previous Literature Reference Name(s)	Lower Seal Harbour (Beaver Hat, Sydney, Seal Harbour)	N/A (new area of interest)
Land Ownership (Crown/Non Crown)	Both	Crown
Approx. Center Location (Easting/Northing)	610790E;5002260N	607855E;5006160N
Elevation (masl)	17	70
Approx. Area (ha)	17.38	TBD
Approx. Depth/Thickness (m)	Unknown	Unknown
Geochemistry Data Exists	Yes	No
Contaminants of Concern	As, Hg	As, Hg
Located within Exploration License Area?	No	Yes
Located within Proposed Mine Pit?	No	No
Located Within Proposed TMF?	No	No
Direct Disturbance by Mine Ops?	No	No
Indirect Disturbance by Mine Ops?	Not Likely	Not Likely
Deposit Environment	Stream/Wetland	Wetland
Underlying Lithology	Stony Till Plain	Stony Till Plain
Proximity to Potential Receptor	0 m	1000 m
Type of Potential Receptor	Gold Brook and Harbour	Gold Brook
Distance to nearest Residence	350 m +	>2 km
Potential Migration Pathway	Surface/Groundwater	Surface/Groundwater, Disturbance
Engineering Considerations	N/A	Access Roads
Ecological Considerations	Fish & Shellfish species	Wetland; Species?
Human Health / Recreational Considerations	Fish consumption	Mine workers / Trespassers
Environment / Water Considerations	Brook / Harbour	Wetland / Gold Brook

Appendix C

Site Photographs

PHOTO 1 - NORTHEAST VIEW OF WETLAND IN AREA A

PHOTO 2 - SOIL SAMPLE AT DELINEATION POINT A-06

PHOTO 3 - SOIL SAMPLE WITH TAILINGS PRESENT AT DELINEATION POINT A-10

PHOTO 4 - SOUTHEAST VIEW OF WETLAND IN AREA B

PHOTO 5 - SOIL SAMPLE AT DELINEATION POINT B-31

PHOTO 6 - SOIL SAMPLE WITH TAILINGS PRESENT AT DELINEATION POINT B-09

PHOTO 7 - SOUTHERN VIEW OF WETLAND IN AREA C

PHOTO 8 - SOIL SAMPLE AT DELINEATION POINT C-21

PHOTO 9 - SOIL SAMPLE WITH TAILINGS PRESENT AT DELINEATION POINT C-15

PHOTO 10 - WESTERN VIEW OF WETLAND IN AREA D

PHOTO 11 - SOIL SAMPLE WITH TAILINGS PRESENT AT DELINEATION POINT D-15

PHOTO 12 - WESTERN VIEW OF WETLAND IN AREA E

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PHOTO 13 - SOUTHWEST VIEW OF WETLAND IN AREA E

PHOTO 14 - SOIL SAMPLE WITH TAILINGS PRESENT AT DELINEATION POINT E

Appendix D

Analytical Results

Table D.1: Available Metal Concentrations in Soil Samples
Goldboro Gold Mine Project, Guysborough County, NS

Parameters	Units	NS Tier 1 EQS (Potable, Industrial, Coarse Grained)[a]	CCME SQG_{HH} (Industrial)[b]	CCME SQG_E (Industrial)[b]	GHD																	
					A-05	A-08	A-13	A-14	A-24	A-26	A-28	A-36	A-41	A-45	DUP-A (FD of A-45)	B-04	B-06	B-13	B-21	B-24	B-36	B-37	DUP-B (FD of B-37)
				Sample Depth (m)	0.15 - 0.25	0.10 - 0.3	0.10 - 0.32	0.3 - 0.5	0.25 - 0.45	0.1 - 0.4	0.10 - 0.23	0.05 - 0.30	0.1 - 1.0	0.05 - 0.66	0.05 - 0.66	0.2 - 0.5	0.15 - 0.22	0.10 - 0.23	0.1 - 0.3	0.3 - 0.8	0.05 - 0.3	0.1 - 0.2	0.1 - 0.2
				Sample Date	14-Jun-21	14-Jun-21	14-Jun-21	14-Jun-21	14-Jun-21	14-Jun-21	14-Jun-21	14-Jun-21	14-Jun-21	14-Jun-21	14-Jun-21	15-Jun-21	15-Jun-21	15-Jun-21	15-Jun-21	15-Jun-21	15-Jun-21	15-Jun-21	15-Jun-21
Aluminum (Al)	mg/kg	220000	No Guideline	No Guideline	3700	7800	7700	13000	13000	11000	9700	11000	5900	20000	19000	4900	4100	12000	8400	8600	8800	15000	13000
Antimony (Sb)	mg/kg	63	40	40	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	4.3	5.1
Arsenic (As)	mg/kg	10	31[c]	26	6.1	**86**	5.4	**2000**	**1900**	**160**	**560**	15	13	14	15	6.5	29	17	**2400**	4.3	**280**	**9500**	**11000**
Barium (Ba)	mg/kg	350	96000	2000	11	38	27	63	61	51	51	18	7.9	26	27	12	14	36	38	19	37	82	72
Beryllium (Be)	mg/kg	1	1100	8	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0
Bismuth (Bi)	mg/kg	No Guideline	No Guideline	No Guideline	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0
Boron (B)	mg/kg	24000	No Guideline	No Guideline	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50
Cadmium (Cd)	mg/kg	1	192	22	<0.30	<0.30	<0.30	0.35	0.38	<0.30	0.54	<0.30	<0.30	<0.30	<0.30	<0.30	<0.30	<0.30	0.32	<0.30	<0.30	<0.30	<0.30
Chromium (Cr)	mg/kg	6700	2300	87	5.8	15	12	22	17	19	9.9	14	7.3	22	24	8.4	4.2	20	15	11	14	23	20
Cobalt (Co)	mg/kg	25	300	300	<1.0	2.8	2.8	14	7.2	20	8.1	2.2	<1.0	4.3	4.5	1.6	<1.0	2.7	8.2	1.8	4.6	<1.0	1.4
Copper (Cu)	mg/kg	250	16000	91	<2.0	4.5	2	26	17	5.6	12	3.3	<2.0	8.3	9.1	<2.0	3	<2.0	6.7	2.4	11	3	7.6
Iron (Fe)	mg/kg	164000	No Guideline	No Guideline	3700	12000	7900	28000	20000	13000	10000	13000	8400	19000	19000	4300	1300	15000	12000	6000	13000	32000	31000
Lead (Pb)	mg/kg	120	740	6000	4.9	8.8	4.4	48	47	8.7	39	6.4	3.1	8.8	9.3	4.7	13	6.9	13	8.6	11	24	48
Lithium (Li)	mg/kg	No Guideline	No Guideline	No Guideline	3.5	11	11	26	27	17	8	9	6.8	19	19	5.2	<2.0	12	10	13	17	27	22
Manganese (Mn)	mg/kg	2000	No Guideline	No Guideline	51	140	110	890	1200	1500	1100	100	43	150	160	69	13	150	140	100	260	380	310
Methyl Mercury	mg/kg	No Guideline	No Guideline	No Guideline	-	-	-	0.00289	0.0122	-	-	0.0044	-	-	-	-	-	-	-	-	0.0111	0.00116	-
Mercury (Hg)	mg/kg	99	99	50	<0.10	<0.10	<0.10	0.45	3.2	<0.10	0.82	<0.10	<0.10	<0.10	<0.10	<0.10	0.22	<0.10	1.8	<0.10	0.75	6.2	4.5
Molybdenum (Mo)	mg/kg	15	40	40	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0
Nickel (Ni)	mg/kg	70	2500	89	2.9	8.7	7.8	23	15	15	9	6.6	3.1	13	13	4.9	2.3	8.6	18	6.4	11	7.9	8
Rubidium (Rb)	mg/kg	No Guideline	No Guideline	No Guideline	4.6	14	12	23	17	17	7.6	7.3	3.5	9.8	11	4.2	3.3	11	12	9.1	16	53	43
Selenium (Se)	mg/kg	1	1135	2.9	<0.50	<0.50	<0.50	0.53	0.92	0.58	1.8	0.65	<0.50	0.84	0.87	<0.50	1.1	0.65	<0.50	<0.50	<0.50	<0.50	<0.50
Silver (Ag)	mg/kg	490	40	40	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50
Strontium (Sr)	mg/kg	140000	No Guideline	No Guideline	<5.0	<5.0	<5.0	18	46	<5.0	57	<5.0	<5.0	<5.0	<5.0	<5.0	8.9	<5.0	8.4	<5.0	<5.0	<5.0	<5.0
Thallium (Tl)	mg/kg	1	1	3.6	<0.10	0.12	<0.10	0.29	0.29	0.16	0.21	<0.10	<0.10	0.1	0.11	<0.10	<0.10	0.1	0.13	<0.10	0.12	0.37	0.33
Tin (Sn)	mg/kg	140000	300	300	<1.0	<1.0	<1.0	1.3	1.3	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	1	<1.0	<1.0	<1.0	2.1	<1.0
Uranium (U)	mg/kg	30	300	2000	0.51	0.48	0.47	1.3	1.8	0.66	1.6	0.61	0.46	0.7	0.81	0.4	0.62	0.61	0.58	1.2	0.65	0.53	0.39
Vanadium (V)	mg/kg	100	No Guideline	130	7	21	13	28	19	23	16	29	18	23	24	14	5.7	38	20	10	18	26	24
Zinc (Zn)	mg/kg	200	140000	410	7	19	16	84	80	41	67	17	6.7	30	30	8.5	<5.0	17	160	11	33	42	39

Notes:

Shaded — Result exceeds NS Tier 1 EQS

Bold — Result exceeds CCME SQG_{HH}

Red — Result exceeds CCME SQG_E

a. Nova Scotia. 2021. Tier 1 Environmental Quality Standards for Soil at a Potable Site (Industrial land use and coarse grained soil).

b. Canadian Council of Ministers of the Environment. 1999. Canadian Soil Quality Guidelines for the Protection of Environmental and Human Health.

c. Value has been adjusted from its original jurisdictional value to reflect a 1 x 10-05 Target Cancer Risk Level.

Table D.1: Available Metal Concentrations in Soil Samples
Goldboro Gold Mine Project, Guysborough County, NS

Parameters	Units	NS Tier 1 EQS (Potable, Industrial, Coarse Grained)[a]	CCME SQG_{HH} (Industrial)[b]	CCME SQG_E (Industrial)[b]	GHD																	
					B-38	B-40	B-46	B-47	B-56	B-63	B-67	B-69	C-01	C-03	DUP-C (FD of C-03)	C-07	C-13	C-18	C-22	D-02	D-07	DUP-D (FD of D-07)	D-08
Sample Depth (m)					0.05 - 0.2	0.08 - 0.3	0.05 - 0.25	0.03 - 0.14	0.1 - 0.4	0.05 - 0.3	0.1 - 0.5	0.1 - 0.3	0.25 - 0.45	0.07 - 0.27	0.07 - 0.27	0.1 - 0.25	0.01 - 0.2	0.1 - 0.22	0.05 - 0.2	0.0 - 0.3	0.1 - 0.6	0.1 - 0.6	0.1 - 0.6
Sample Date					15-Jun-21	15-Jun-21	15-Jun-21	15-Jun-21	15-Jun-21	15-Jun-21	15-Jun-21	15-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21
Aluminum (Al)	mg/kg	220000	No Guideline	No Guideline	19000	6500	1000	6700	6600	11000	9600	6700	29000	5000	6800	8900	22000	10000	14000	13000	12000	11000	4300
Antimony (Sb)	mg/kg	63	40	40	3.9	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	3.4	<2.0	4.8	2.3	8.9	8	<2.0
Arsenic (As)	mg/kg	10	31[c]	26	**4000**	**2200**	5.3	23	8.3	**200**	23	13	**100**	**200**	**250**	**410**	**4900**	**860**	**8600**	**3300**	**11000**	**9900**	**380**
Barium (Ba)	mg/kg	350	96000	2000	84	29	33	29	31	44	7	23	13	8.1	13	33	140	45	71	68	67	61	8.3
Beryllium (Be)	mg/kg	1	1100	8	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0
Bismuth (Bi)	mg/kg	No Guideline	No Guideline	No Guideline	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0
Boron (B)	mg/kg	24000	No Guideline	No Guideline	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50
Cadmium (Cd)	mg/kg	1	192	22	1	<0.30	0.33	<0.30	<0.30	<0.30	<0.30	<0.30	<0.30	<0.30	<0.30	<0.30	0.35	<0.30	<0.30	<0.30	<0.30	<0.30	<0.30
Chromium (Cr)	mg/kg	6700	2300	87	22	12	<2.0	11	11	18	8.6	8.9	24	8	11	13	33	29	21	21	19	19	5.9
Cobalt (Co)	mg/kg	25	300	300	20	3.4	<1.0	4.4	4.2	5.4	<1.0	1.2	2.1	1.1	1.7	4	12	4.8	1.2	2.7	1	<1.0	<1.0
Copper (Cu)	mg/kg	250	16000	91	45	9.6	5.1	7.7	7.7	12	2.2	4	4.8	<2.0	2.3	11	31	46	7.8	7	7.6	6.9	<2.0
Iron (Fe)	mg/kg	164000	No Guideline	No Guideline	33000	14000	1400	10000	11000	17000	13000	3100	29000	14000	15000	14000	39000	53000	29000	25000	29000	26000	15000
Lead (Pb)	mg/kg	120	740	6000	76	12	25	4.1	3.3	9.5	5.1	15	13	4.6	6.5	17	44	19	42	25	52	39	6.3
Lithium (Li)	mg/kg	No Guideline	No Guideline	No Guideline	32	15	<2.0	14	15	19	11	4.6	12	3	5	15	49	21	26	27	21	20	<2.0
Manganese (Mn)	mg/kg	2000	No Guideline	No Guideline	550	140	43	150	160	220	28	43	77	47	77	150	620	270	330	350	290	260	33
Methyl Mercury	mg/kg	No Guideline	No Guideline	No Guideline	-	-	-	-	-	-	-	-	-	-	-	-	0.00325	0.00741	-	-	0.00168	-	-
Mercury (Hg)	mg/kg	99	99	50	7.2	0.42	0.32	<0.10	<0.10	0.12	<0.10	0.17	0.22	0.1	0.18	0.22	8.2	0.24	3	1	2.9	2.7	0.12
Molybdenum (Mo)	mg/kg	15	40	40	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0
Nickel (Ni)	mg/kg	70	2500	89	59	9.2	2.7	9.7	10	13	<2.0	3.3	6.3	3	4.8	11	31	16	8.8	11	7.9	7.3	2.3
Rubidium (Rb)	mg/kg	No Guideline	No Guideline	No Guideline	33	16	<2.0	15	14	19	2.7	6.6	5.1	3.7	5.1	15	80	22	44	40	40	38	2.9
Selenium (Se)	mg/kg	1	1135	2.9	0.95	<0.50	1.4	<0.50	<0.50	<0.50	0.89	1.5	2.5	0.62	0.61	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50
Silver (Ag)	mg/kg	490	40	40	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50
Strontium (Sr)	mg/kg	140000	No Guideline	No Guideline	24	<5.0	27	<5.0	<5.0	<5.0	<5.0	6.8	<5.0	<5.0	<5.0	<5.0	15	5.6	12	13	8.8	8	<5.0
Thallium (Tl)	mg/kg	1	1	3.6	0.33	<0.10	<0.10	0.11	<0.10	0.13	<0.10	<0.10	<0.10	<0.10	<0.10	0.11	0.57	0.17	0.33	0.3	0.33	0.3	<0.10
Tin (Sn)	mg/kg	140000	300	300	1.2	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	1.2	1.2	2.4	<1.0	<1.0	<1.0	<1.0	<1.0
Uranium (U)	mg/kg	30	300	2000	1.1	0.58	0.17	0.56	0.52	0.65	0.62	0.74	0.9	0.47	0.56	0.5	0.72	0.44	0.51	0.5	0.48	0.42	0.48
Vanadium (V)	mg/kg	100	No Guideline	130	26	14	3.6	14	14	21	20	9	34	29	31	16	39	21	23	22	21	19	30
Zinc (Zn)	mg/kg	200	140000	410	280	39	15	20	21	32	5.3	8.3	13	5.8	9.8	31	130	140	36	51	39	31	<5.0

Notes:

Shaded — Result exceeds NS Tier 1 EQS

Bold — Result exceeds CCME SQG_{HH}

Red — Result exceeds CCME SQG_E

a. Nova Scotia. 2021. Tier 1 Environmental Quality Standards for Soil at a Potable Site (Industrial land use and coarse grained soil).

b. Canadian Council of Ministers of the Environment. 1999. Canadian Soil Quality Guidelines for the Protection of Environmental and Human Health.

c. Value has been adjusted from its original jurisdictional value to reflect a 1 x 10-05 Target Cancer Risk Level.

Table D.1: Available Metal Concentrations in Soil Samples
Goldboro Gold Mine Project, Guysborough County, NS

Parameters	Units	NS Tier 1 EQS (Potable, Industrial, Coarse Grained)[a]	CCME SQG_{HH} (Industrial)[b]	CCME SQG_E (Industrial)[b]	GHD																	
					D-09	D-12	D-19	D-21	D-22	D-34	E-05	E-08	E-11	E-22	E-31	E-33	E-35	DUP-F (FD of E-35)	E-40	E-45	E-46	E-47	E-55
Sample Depth (m)					0.1 - 0.4	0.35 - 0.55	0.1 - 0.3	0 - 0.3	0.5 - 0.9	0.1 - 0.4	0.15 - 0.34	0.2 - 0.4	0 - 0.15	0.05 - 0.18	0 - 0.25	0.1 - 0.3	0.2 - 0.35	0.2 - 0.35	0.08 - 0.18	0.15 - 0.30	0.08 - 0.18	0.1 - 0.2	0.1 - 0.3
Sample Date					16-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	17-Jun-21	17-Jun-21	17-Jun-21	17-Jun-21	17-Jun-21	17-Jun-21	17-Jun-21	17-Jun-21	17-Jun-21	17-Jun-21
Aluminum (Al)	mg/kg	220000	No Guideline	No Guideline	22000	5100	7900	13000	13000	9200	3900	10000	10000	9000	18000	16000	9700	8600	9500	7800	9900	9800	18000
Antimony (Sb)	mg/kg	63	40	40	<2.0	<2.0	<2.0	18	<2.0	<2.0	<2.0	<2.0	5.7	14	3	<2.0	20	15	7.5	<2.0	<2.0	16	<2.0
Arsenic (As)	mg/kg	10	31[c]	26	**110**	28	**220**	**9700**	24	8.3	26	**99**	**9600**	**25000**	**790**	**84**	**28000**	**22000**	**22000**	**180**	**940**	**20000**	**580**
Barium (Ba)	mg/kg	350	96000	2000	13	20	14	70	23	18	11	13	57	52	97	7.8	47	44	71	39	44	45	87
Beryllium (Be)	mg/kg	1	1100	8	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0
Bismuth (Bi)	mg/kg	No Guideline	No Guideline	No Guideline	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0
Boron (B)	mg/kg	24000	No Guideline	No Guideline	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50	<50
Cadmium (Cd)	mg/kg	1	192	22	<0.30	<0.30	<0.30	0.42	<0.30	<0.30	<0.30	<0.30	<0.30	<0.30	<0.30	<0.30	<0.30	<0.30	<0.30	<0.30	<0.30	<0.30	<0.30
Chromium (Cr)	mg/kg	6700	2300	87	26	<2.0	11	22	6.4	13	6.3	15	17	17	27	17	16	16	17	4.4	15	18	24
Cobalt (Co)	mg/kg	25	300	300	2.6	<1.0	1.8	15	<1.0	2.1	<1.0	2.9	1.1	<1.0	6.1	1.3	2.7	1.4	1.9	2.4	7.1	3	1.6
Copper (Cu)	mg/kg	250	16000	91	4.2	2.7	<2.0	39	8.3	<2.0	<2.0	3.1	12	6.9	21	2.3	8.2	8	7.7	11	24	5.8	13
Iron (Fe)	mg/kg	164000	No Guideline	No Guideline	39000	1900	7000	33000	1200	7100	3300	21000	27000	36000	28000	33000	40000	35000	45000	4700	18000	41000	23000
Lead (Pb)	mg/kg	120	740	6000	9.9	14	7.5	120	15	6.8	7.8	7.3	31	86	36	8.9	96	74	75	15	37	64	28
Lithium (Li)	mg/kg	No Guideline	No Guideline	No Guideline	12	<2.0	9	25	<2.0	12	2.8	7.8	18	13	39	6.1	14	12	13	<2.0	13	11	31
Manganese (Mn)	mg/kg	2000	No Guideline	No Guideline	100	14	93	320	15	96	45	110	270	180	500	49	200	170	190	210	290	180	370
Methyl Mercury	mg/kg	No Guideline	No Guideline	No Guideline	-	-	-	-	0.0337	-	-	-	-	-	0.00263	-	0.0316	-	-	0.0696	-	-	-
Mercury (Hg)	mg/kg	99	99	50	0.16	0.24	0.21	9.6	0.48	<0.10	0.17	<0.10	8.5	11	1.3	<0.10	15	15	11	0.39	0.23	6.6	5.1
Molybdenum (Mo)	mg/kg	15	40	40	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0
Nickel (Ni)	mg/kg	70	2500	89	7.3	2.2	6.1	30	2.8	7.1	2.7	7.9	6.6	4.9	19	3.8	9.4	6.1	7.6	6.9	14	9	11
Rubidium (Rb)	mg/kg	No Guideline	No Guideline	No Guideline	6.5	<2.0	7.6	40	2.5	8	4.2	6.8	36	28	65	3.6	27	22	21	<2.0	17	14	46
Selenium (Se)	mg/kg	1	1135	2.9	2.2	1.7	<0.50	<0.50	3.7	<0.50	<0.50	0.94	<0.50	<0.50	<0.50	1.5	<0.50	0.54	0.77	3	0.58	1.2	<0.50
Silver (Ag)	mg/kg	490	40	40	<0.50	<0.50	<0.50	0.64	<0.50	<0.50	<0.50	<0.50	<0.50	1.1	<0.50	<0.50	0.87	0.66	0.85	<0.50	1.1	0.88	<0.50
Strontium (Sr)	mg/kg	140000	No Guideline	No Guideline	<5.0	14	<5.0	13	22	<5.0	<5.0	<5.0	6.3	<5.0	14	<5.0	6.5	5	10	45	12	11	15
Thallium (Tl)	mg/kg	1	1	3.6	<0.10	<0.10	<0.10	0.38	<0.10	<0.10	<0.10	<0.10	0.31	0.28	0.47	<0.10	0.27	0.24	0.22	<0.10	0.15	0.15	0.37
Tin (Sn)	mg/kg	140000	300	300	<1.0	<1.0	<1.0	1.7	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	1.1	<1.0	<1.0	<1.0	<1.0	<1.0	1.3	<1.0
Uranium (U)	mg/kg	30	300	2000	0.72	0.19	0.58	0.55	1.5	0.53	0.49	0.62	0.38	0.41	0.8	0.55	0.42	0.46	0.49	1.2	0.61	0.57	1.7
Vanadium (V)	mg/kg	100	No Guideline	130	47	2.7	12	22	7.4	12	6.8	28	19	20	31	56	19	18	18	4.5	22	21	26
Zinc (Zn)	mg/kg	200	140000	410	17	6.4	14	93	<5.0	14	5.1	19	31	22	78	7.3	31	21	23	49	46	23	42

Notes:

Shaded	Result exceeds NS Tier 1 EQS
Bold	Result exceeds CCME SQG_{HH}
Red	Result exceeds CCME SQG_E

a. Nova Scotia. 2021. Tier 1 Environmental Quality Standards for Soil at a Potable Site (Industrial land use and coarse grained soil).

b. Canadian Council of Ministers of the Environment. 1999. Canadian Soil Quality Guidelines for the Protection of Environmental and Human Health.

c. Value has been adjusted from its original jurisdictional value to reflect a 1 x 10-05 Target Cancer Risk Level.

Table D.1: Available Metal Concentrations in Soil Samples
Goldboro Gold Mine Project, Guysborough County, NS

Parameters	Units	NS Tier 1 EQS (Potable, Industrial, Coarse Grained)[a]	CCME SQG_{HH} (Industrial)[b]	CCME SQG_E (Industrial)[b]	GHD					Anaconda													
					E-56	E-62	E-68	E-74	DUP-E (FD of E-74)	ANX-A1a	ANX-A1b	ANX-A2a	ANX-A2b	ANX-A3a	ANX-A3b	ANX-A4a	ANX-A4b	ANX-A4b DUP	ANX-A5a	ANX-A5b	ANX-A6a	ANX-A6b	ANX-A7a
				Sample Depth (m)	0.08 - 0.2	0.2 - 0.5	0.15 - 0.2	0.15 - 0.4	0.15 - 0.4	0.9	1.3	1	1.4	1.1	1.5	1	1.4	-	0.9	1.2	1	1	0.7
				Sample Date	17-Jun-21	17-Jun-21	17-Jun-21	16-Jun-21	16-Jun-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21
Aluminum (Al)	mg/kg	220000	No Guideline	No Guideline	23000	1200	1900	3400	3100	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Antimony (Sb)	mg/kg	63	40	40	<2.0	<2.0	<2.0	<2.0	<2.0	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Arsenic (As)	mg/kg	10	31[c]	26	**1600**	15	12	3	4.9	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Barium (Ba)	mg/kg	350	96000	2000	140	17	8.6	6.5	6.4	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Beryllium (Be)	mg/kg	1	1100	8	<2.0	<2.0	<2.0	<2.0	<2.0	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Bismuth (Bi)	mg/kg	No Guideline	No Guideline	No Guideline	<2.0	<2.0	<2.0	<2.0	<2.0	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron (B)	mg/kg	24000	No Guideline	No Guideline	<50	<50	<50	<50	<50	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cadmium (Cd)	mg/kg	1	192	22	<0.30	<0.30	<0.30	<0.30	<0.30	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chromium (Cr)	mg/kg	6700	2300	87	34	<2.0	3	3.8	4	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cobalt (Co)	mg/kg	25	300	300	5.2	<1.0	<1.0	<1.0	<1.0	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Copper (Cu)	mg/kg	250	16000	91	30	2.9	<2.0	<2.0	<2.0	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Iron (Fe)	mg/kg	164000	No Guideline	No Guideline	37000	1000	1600	1700	1600	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lead (Pb)	mg/kg	120	740	6000	34	11	6.3	4.7	4.7	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lithium (Li)	mg/kg	No Guideline	No Guideline	No Guideline	46	<2.0	<2.0	<2.0	<2.0	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Manganese (Mn)	mg/kg	2000	No Guideline	No Guideline	600	32	26	30	30	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methyl Mercury	mg/kg	No Guideline	No Guideline	No Guideline	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury (Hg)	mg/kg	99	99	50	4.5	0.21	<0.10	<0.10	<0.10	1.6	1.6	1.8	1.1	2.4	1.4	2.1	0.98	-	0.46	0.33	0.53	0.55	1.3
Molybdenum (Mo)	mg/kg	15	40	40	<2.0	<2.0	<2.0	<2.0	<2.0	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Nickel (Ni)	mg/kg	70	2500	89	22	<2.0	<2.0	<2.0	<2.0	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Rubidium (Rb)	mg/kg	No Guideline	No Guideline	No Guideline	78	<2.0	3.2	3.4	3	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Selenium (Se)	mg/kg	1	1135	2.9	<0.50	1.3	<0.50	<0.50	<0.50	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Silver (Ag)	mg/kg	490	40	40	<0.50	<0.50	<0.50	<0.50	<0.50	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Strontium (Sr)	mg/kg	140000	No Guideline	No Guideline	21	27	<5.0	<5.0	<5.0	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Thallium (Tl)	mg/kg	1	1	3.6	0.57	<0.10	<0.10	<0.10	<0.10	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tin (Sn)	mg/kg	140000	300	300	<1.0	2.1	<1.0	<1.0	<1.0	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Uranium (U)	mg/kg	30	300	2000	1.2	<0.10	0.26	0.44	0.36	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Vanadium (V)	mg/kg	100	No Guideline	130	38	<2.0	3	4.7	5	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Zinc (Zn)	mg/kg	200	140000	410	92	26	<5.0	<5.0	<5.0	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Notes:

Shaded	Result exceeds NS Tier 1 EQS
Bold	Result exceeds CCME SQG_{HH}
Red	Result exceeds CCME SQG_E

a. Nova Scotia. 2021. Tier 1 Environmental Quality Standards for Soil at a Potable Site (Industrial land use and coarse grained soil).

b. Canadian Council of Ministers of the Environment. 1999. Canadian Soil Quality Guidelines for the Protection of Environmental and Human Health.

c. Value has been adjusted from its original jurisdictional value to reflect a 1 x 10-05 Target Cancer Risk Level.

Table D.1: Available Metal Concentrations in Soil Samples
Goldboro Gold Mine Project, Guysborough County, NS

Parameters	Units	NS Tier 1 EQS (Potable, Industrial, Coarse Grained)[a]	CCME SQG_{HH} (Industrial)[b]	CCME SQG_E (Industrial)[b]	Anaconda														
					ANX-A7b	ANX-A8a	ANX-A8a DUP	ANX-A9a	ANX-A9b	ANX-D1A	ANX-D2a	ANX-D2b	ANX-D3a	ANX-D4a	ANX-D5a	ANX-D6a	ANX-D7a	ANX-D7b	ANX-D8a
				Sample Depth (m)	0.7	0.6	-	0.8	1.2	0.6	0.5	0.7	0.5	0.4	0.4	0.6	0.6	0.7	0.4
				Sample Date	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21
Aluminum (Al)	mg/kg	220000	No Guideline	No Guideline	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Antimony (Sb)	mg/kg	63	40	40	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Arsenic (As)	mg/kg	10	31[c]	26	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Barium (Ba)	mg/kg	350	96000	2000	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Beryllium (Be)	mg/kg	1	1100	8	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Bismuth (Bi)	mg/kg	No Guideline	No Guideline	No Guideline	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron (B)	mg/kg	24000	No Guideline	No Guideline	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cadmium (Cd)	mg/kg	1	192	22	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chromium (Cr)	mg/kg	6700	2300	87	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cobalt (Co)	mg/kg	25	300	300	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Copper (Cu)	mg/kg	250	16000	91	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Iron (Fe)	mg/kg	164000	No Guideline	No Guideline	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lead (Pb)	mg/kg	120	740	6000	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lithium (Li)	mg/kg	No Guideline	No Guideline	No Guideline	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Manganese (Mn)	mg/kg	2000	No Guideline	No Guideline	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methyl Mercury	mg/kg	No Guideline	No Guideline	No Guideline	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury (Hg)	mg/kg	99	99	50	1.2	4.3	-	1.1	1.5	2.8	5.2	1.8	9	12	13	8.1	8	8.6	3.3
Molybdenum (Mo)	mg/kg	15	40	40	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Nickel (Ni)	mg/kg	70	2500	89	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Rubidium (Rb)	mg/kg	No Guideline	No Guideline	No Guideline	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Selenium (Se)	mg/kg	1	1135	2.9	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Silver (Ag)	mg/kg	490	40	40	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Strontium (Sr)	mg/kg	140000	No Guideline	No Guideline	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Thallium (Tl)	mg/kg	1	1	3.6	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tin (Sn)	mg/kg	140000	300	300	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Uranium (U)	mg/kg	30	300	2000	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Vanadium (V)	mg/kg	100	No Guideline	130	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Zinc (Zn)	mg/kg	200	140000	410	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Notes:

Shaded	Result exceeds NS Tier 1 EQS
Bold	Result exceeds CCME SQG_{HH}
Red	Result exceeds CCME SQG_E

a. Nova Scotia. 2021. Tier 1 Environmental Quality Standards for Soil at a Potable Site (Industrial land use and coarse grained soil).

b. Canadian Council of Ministers of the Environment. 1999. Canadian Soil Quality Guidelines for the Protection of Environmental and Human Health.

c. Value has been adjusted from its original jurisdictional value to reflect a 1 x 10-05 Target Cancer Risk Level.

Table D.2: Total Metal Concentrations in Soil Samples
Goldboro Gold Mine Project, Guysborough County, NS

Parameters	Units	NS Tier 1 EQS (Potable, Industrial, Coarse Grained)[a]	CCME SQG_{HH} (Industrial)[b,c]	CCME SQG_E (Industrial)[b]	Anaconda																	
					ANX-A1a	ANX-A1b	ANX-A2a	ANX-A2b	ANX-A3a	ANX-A3b	ANX-A4a	ANX-A4b	ANX-A4b DUP	ANX-A5a	ANX-A5b	ANX-A6a	ANX-A6b	ANX-A7a	ANX-A7b	ANX-A8a	ANX-A8a DUP	ANX-A9a	ANX-A9b
				Sample Depth (m)	0.9	1.3	1	1.4	1.1	1.5	1	1.4	-	0.9	1.2	1	1	0.7	0.7	0.6	-	0.8	1.2
				Sample Date	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21
Aluminum (Al)	mg/kg	220000	No Guideline	No Guideline	62100	56200	67800	67600	79600	66800	62400	53500	49500	25500	29100	32100	35800	33700	62200	93500	111500	47400	39600
Antimony (Sb)	mg/kg	63	40	40	<3	<3	<3	5	4	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	<3	5	<3	<3
Arsenic (As)	mg/kg	10	31	26	**>1000**	**639**	**>1000**	**>1000**	**317**	**281**	**913**	**598**	**387**	**475**	**699**	**385**	**>1000**	**492**	**>1000**	**582**	**504**	**>1000**	**>1000**
Barium (Ba)	mg/kg	350	96000	2000	516	430	576	568	711	577	518	418	386	154	194	225	278	287	527	1082	1127	379	307
Beryllium (Be)	mg/kg	1	1100	8	3.3	3.2	3.5	3.6	3.7	3.2	2.9	2.6	2.3	1.6	1.5	1.7	2.3	1.8	4.2	6.1	6.1	2.8	2.7
Bismuth (Bi)	mg/kg	No Guideline	No Guideline	No Guideline	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2
Cadmium (Cd)	mg/kg	1	192	22	7	0.7	0.7	1.2	1	0.9	1.7	1.4	0.8	<0.5	1.6	0.6	0.8	0.5	2.3	0.8	1.4	3.9	1.1
Chromium (Cr)	mg/kg	6700	2300	87	172	43	43	138	47	38	34	41	43	17	22	29	35	35	63	61	55	34	26
Cobalt (Co)	mg/kg	25	300	300	11	5	8	8	3	4	5	4	3	6	4	4	9	5	25	5	6	12	11
Copper (Cu)	mg/kg	250	16000	91	25	24	22	26	15	17	22	18	16	17	11	13	25	13	48	18	19	22	28
Iron (Fe)	mg/kg	164000	No Guideline	No Guideline	36900	20800	28700	30000	22000	18900	17800	13500	13300	15200	18000	12700	33100	14900	31900	27400	29700	36000	35700
Lead (Pb)	mg/kg	120	740	6000	37	34	32	31	29	27	31	21	26	20	21	18	48	18	79	31	33	31	39
Manganese (Mn)	mg/kg	2000	No Guideline	No Guideline	1312	703	1014	1099	486	462	939	733	691	858	1198	1428	3118	1586	1780	459	510	1601	1216
Molybdenum (Mo)	mg/kg	15	40	40	3	1	1	1	1	1	2	1	1	1	1	2	2	1	2	1	<1	1	1
Nickel (Ni)	mg/kg	70	2500	89	98	14	17	21	12	11	13	14	9	12	8	11	16	13	44	18	18	17	22
Selenium (Se)	mg/kg	1	1135	2.9	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10
Silver (Ag)	mg/kg	490	40	40	<0.2	<0.2	<0.2	<0.2	<0.2	<0.2	<0.2	<0.2	<0.2	0.2	0.4	<0.2	0.2	<0.2	0.3	<0.2	<0.2	0.3	<0.2
Strontium (Sr)	mg/kg	140000	No Guideline	No Guideline	110	90	90	89	99	85	86	83	76	58	74	83	102	111	107	73	79	67	75
Tin (Sn)	mg/kg	140000	300	300	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10
Uranium (U)	mg/kg	30	300	2000	3	<2	<2	2	<2	<2	<2	<2	<2	<2	2	<2	<2	<2	<2	<2	<2	2	2
Vanadium (V)	mg/kg	100	No Guideline	130	64	53	71	68	84	68	61	50	47	21	27	29	41	35	71	125	132	49	43
Zinc (Zn)	mg/kg	200	140000	410	89	60	85	93	65	64	47	39	37	36	42	24	81	51	305	81	88	97	116

Notes:

Shaded	Result exceeds NS Tier 1 EQS
Bold	Result exceeds CCME SQG_{HH}
Italics	Result exceeds CCME SQG_E

a. Nova Scotia. 2021. Tier 1 Environmental Quality Standards for Soil at a Potable Site (Industrial land use and coarse grained soil).
b. Canadian Council of Ministers of the Environment. 1999. Canadian Soil Quality Guidelines for the Protection of Environmental and Human Health.
c. Value has been adjusted from its original jurisdictional value, to reflect a 1 x 10-05 Target Cancer Risk Level.

Table D.2: Total Metal Concentrations in Soil Samples
Goldboro Gold Mine Project, Guysborough County, NS

Parameters	Units	NS Tier 1 EQS (Potable, Industrial, Coarse Grained)[a]	CCME SQG_{HH} (Industrial)[b,c]	CCME SQG_E (Industrial)[b]	Anaconda									
					ANX-D1A	ANX-D2a	ANX-D2b	ANX-D3a	ANX-D4a	ANX-D5a	ANX-D6a	ANX-D7a	ANX-D7b	ANX-D8a
				Sample Depth (m)	0.6	0.5	0.7	0.5	0.4	0.4	0.6	0.6	0.7	0.4
				Sample Date	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21	1-Sep-21
Aluminum (Al)	mg/kg	220000	No Guideline	No Guideline	48600	60900	62300	60500	59200	59800	43300	59300	49400	100700
Antimony (Sb)	mg/kg	63	40	40	7	5	5	20	25	14	<3	18	22	11
Arsenic (As)	mg/kg	10	31	26	**>1000**	**>1000**	**>1000**	**>1000**	**>1000**	**>1000**	**688**	**>1000**	**>1000**	**>1000**
Barium (Ba)	mg/kg	350	96000	2000	409	489	500	491	511	518	326	498	423	968
Beryllium (Be)	mg/kg	1	1100	8	2.3	2.8	3	2.6	2.7	3	2	2.9	2.5	3.6
Bismuth (Bi)	mg/kg	No Guideline	No Guideline	No Guideline	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2
Cadmium (Cd)	mg/kg	1	192	22	10.4	5.6	4.9	18.9	16.8	16.1	0.6	7.3	*28.4*	4.3
Chromium (Cr)	mg/kg	6700	2300	87	43	33	30	43	75	49	*152*	53	43	61
Cobalt (Co)	mg/kg	25	300	300	11	7	7	9	12	7	2	5	5	4
Copper (Cu)	mg/kg	250	16000	91	26	14	16	50	45	26	16	34	33	17
Iron (Fe)	mg/kg	164000	No Guideline	No Guideline	37400	38000	37400	48700	48900	37000	22600	35400	59500	43000
Lead (Pb)	mg/kg	120	740	6000	44	28	28	125	153	91	50	37	33	28
Manganese (Mn)	mg/kg	2000	No Guideline	No Guideline	475	587	595	551	555	492	330	602	650	672
Molybdenum (Mo)	mg/kg	15	40	40	<1	<1	<1	<1	2	1	1	<1	<1	1
Nickel (Ni)	mg/kg	70	2500	89	33	23	23	26	31	22	16	22	17	18
Selenium (Se)	mg/kg	1	1135	2.9	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10
Silver (Ag)	mg/kg	490	40	40	0.2	<0.2	<0.2	0.4	0.6	0.3	0.2	<0.2	<0.2	0.2
Strontium (Sr)	mg/kg	140000	No Guideline	No Guideline	113	149	152	134	131	134	94	172	213	132
Tin (Sn)	mg/kg	140000	300	300	<10	<10	<10	<10	<10	<10	<10	<10	<10	<10
Uranium (U)	mg/kg	30	300	2000	3	4	3	5	4	3	2	4	5	4
Vanadium (V)	mg/kg	100	No Guideline	130	51	58	59	62	61	58	45	56	50	109
Zinc (Zn)	mg/kg	200	140000	410	87	99	111	98	115	78	35	151	163	81

Notes:

Shaded	Result exceeds NS Tier 1 EQS
Bold	Result exceeds CCME SQG_{HH}
Italics	Result exceeds CCME SQG_E

a. Nova Scotia. 2021. Tier 1 Environmental Quality Standards for Soil at a Potable Site (Industrial land use and coarse grained soil).
b. Canadian Council of Ministers of the Environment. 1999. Canadian Soil Quality Guidelines for the Protection of Environmental and Human Health.
c. Value has been adjusted from its original jurisdictional value, to reflect a 1 x 10-05 Target Cancer Risk Level.

Table D.3: Leachable Metal Concentrations in Soil Samples
Goldboro Gold Mine Project, Guysborough County, NS

Parameters	Units	GHD											
		A-14	A-24	A-36	B-36	B-37	C-13	C-18	D-07	D-22	E-31	E-35	E-45
Sample Depth (m)		0.3 - 0.5	0.25 - 0.45	0.05 - 0.30	0.05 - 0.3	0.1 - 0.2	0.01 - 0.2	0.1 - 0.22	0.1 - 0.6	0.5 - 0.9	0 - 0.25	0.2 - 0.35	0.15 - 0.30
Sample Date		14-Jun-21	14-Jun-21	14-Jun-21	15-Jun-21	15-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	17-Jun-21	17-Jun-21	17-Jun-21
Leachable Arsenic (As)	ug/L	500	370	<20	37	1700	6000	78	1600	23	620	2600	81

Notes:
Bold and Shaded Result exceeds the applicable screening criteria.
a. Nova Scotia. 2021. Tier 1 Environmental Quality Standards for Soil at a Potable Site (Industrial land use and coarse grained soil).

Table D.4: Inorganics in Soil Samples
Goldboro Gold Mine Project, Guysborough County, NS

Parameters	Units	GHD																					
		A-05	A-08	A-13	A-14	A-24	A-26	A-28	A-36	A-41	A-45	DUP-A (FD of A-45)	B-04	B-06	B-13	B-21	B-24	B-36	B-37	DUP-B (FD of B-37)	DUP-T	B-38	B-40	B-46
Sample Depth (m)		0.15 - 0.25	0.10 - 0.3	0.10 - 0.32	0.3 - 0.5	0.25 - 0.45	0.1 - 0.4	0.10 - 0.23	0.05 - 0.30	0.1 - 1.0	0.05 - 0.66	0.05 - 0.66	0.2 - 0.5	0.15 - 0.22	0.10 - 0.23	0.1 - 0.3	0.3 - 0.8	0.05 - 0.3	0.1 - 0.2	0.1 - 0.2	0.1 - 0.2	0.05 - 0.2	0.08 - 0.3	0.05 - 0.25
Sample Date		14-Jun-21	14-Jun-21	14-Jun-21	14-Jun-21	14-Jun-21	14-Jun-21	14-Jun-21	14-Jun-21	14-Jun-21	14-Jun-21	14-Jun-21	15-Jun-21	15-Jun-21	15-Jun-21	15-Jun-21	15-Jun-21	15-Jun-21	15-Jun-21	15-Jun-21	15-Jun-21	15-Jun-21	15-Jun-21	15-Jun-21
Ammonia-N	mg/kg	<0.38	<0.38	<0.36	<0.41	7.2	<0.32	4.1	<0.38	<0.35	<0.39	<0.42	<0.42	3.1	<0.43	<0.45	<2.1	2.6	<0.33	<0.33	-	2.2	<0.32	<0.71
Chloride (Cl-)	mg/kg	11	9	5.4	14	29	8.4	60	15	<5.0	<5.0	6.1	7.2	61	9	8.7	16	15	5.2	10	-	23	7.4	220
Conductivity	uS/cm	15	21	9.1	51	130	37	160	35	12	15	19	25	170	29	74	47	41	29	38	-	71	21	300
Total Inorganic Carbon (C)	g/kg	-	-	-	-	4.8	-	-	-	-	-	-	-	-	-	-	-	-	<0.5	-	<0.5	<0.5	-	-
Moisture	%	30	29	27	36	68	20	75	31	25	33	36	37	84	38	39	86	34	22	23	-	69	20	60
Nitrate + Nitrite (N)	mg/kg	0.52	1.4	<0.25	6.9	<0.25	<0.25	0.73	0.69	<0.25	0.55	1.5	<0.25	1.2	<0.25	0.33	0.4	<0.25	<0.25	0.42	-	<0.25	<0.25	0.33
Nitrite (N)	mg/kg	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	-	<0.050	<0.050	<0.050
Organic Carbon (TOC)	g/kg	-	-	-	32	130	-	-	31	-	-	-	-	-	-	-	-	37	2.1	-	3.7	89	-	-
Orthophosphate (P)	mg/kg	0.081	0.16	<0.050	2.2	0.068	0.22	0.14	<0.050	<0.050	<0.050	<0.050	0.057	3	<0.050	0.07	<0.050	0.14	3.8	14	-	0.25	2.4	66
Soluble (5:1) pH	pH	5.54	5.1	5.6	6.07	5.73	5.91	5.66	5.1	5.12	5.18	5.2	5.16	4.23	5.26	5.16	4.95	5.44	4.53	4.71	-	5.63	5	3.75
Sulphate (SO4)	mg/kg	11	11	<11	30	100	45	100	<10	17	23	19	20	110	<10	66	39	25	15	12	-	41	<10	<10
Total Carbon-combustion IR	g/kg	-	-	-	-	130	-	-	-	-	-	-	-	-	-	-	-	-	2	-	3.6	86	-	-
Total Sulphur (S)	% g/g	-	-	-	-	0.24	-	-	-	-	-	-	-	-	-	-	-	-	0.013	-	0.02	0.16	-	-

Notes:

Bold and Shaded Result exceeds the applicable screening criteria.

a. Nova Scotia. 2021. Tier 1 Environmental Quality Standards for Soil at a Potable Site (Industrial land use and coarse grained soil).

Table D.4: Inorganics in Soil Samples
Goldboro Gold Mine Project, Guysborough County, NS

Parameters	Units	GHD																					
		B-47	B-56	B-63	B-67	B-69	C-01	C-03	DUP-C (FD of C-03)	C-07	C-13	C-18	C-22	D-02	D-07	DUP-D (FD of D-07)	D-08	D-09	D-12	D-19	D-21	D-22	D-34	E-05
Sample Depth (m)		0.03 - 0.14	0.1 - 0.4	0.05 - 0.3	0.1 - 0.5	0.1 - 0.3	0.25 - 0.45	0.07 - 0.27	0.07 - 0.27	0.1 - 0.25	0.01 - 0.2	0.1 - 0.22	0.05 - 0.2	0.0 - 0.3	0.1 - 0.6	0.1 - 0.6	0.1 - 0.6	0.1 - 0.4	0.35 - 0.55	0.1 - 0.3	0 - 0.3	0.5 - 0.9	0.1 - 0.4	0.15 - 0.34
Sample Date		15-Jun-21	15-Jun-21	15-Jun-21	15-Jun-21	15-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21
Ammonia-N	mg/kg	<0.28	<0.29	<0.31	<0.37	<0.64	0.86	0.61	0.43	<0.34	<0.33	0.99	<0.38	<0.34	<0.33	<0.32	<0.39	<0.41	5	<0.35	0.43	4.8	<0.37	<0.40
Chloride (Cl-)	mg/kg	7.9	11	10	17	29	46	8.5	13	8.1	12	23	8.9	6.7	<5.0	<5.0	20	15	85	8.8	9.1	50	13	7
Conductivity	uS/cm	28	31	34	48	81	66	33	45	22	58	66	35	21	16	19	55	47	210	28	49	230	53	29
Total Inorganic Carbon (C)	g/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	<0.5	-	-	-	-	-	-	<1	-	-
Moisture	%	10	11	16	28	57	50	27	38	23	22	48	30	24	20	20	31	35	90	23	22	83	29	33
Nitrate + Nitrite (N)	mg/kg	0.29	<0.25	0.52	0.72	1.2	0.65	0.6	0.25	<0.25	0.3	0.51	0.29	0.32	<0.25	<0.25	0.36	0.98	0.52	0.26	<0.25	1	0.49	<0.25
Nitrite (N)	mg/kg	<0.050	<0.050	<0.050	<0.050	<0.050	0.053	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
Organic Carbon (TOC)	g/kg	-	-	-	-	-	-	-	-	-	3.5	25	-	-	1.7	-	-	-	-	-	-	460	-	-
Orthophosphate (P)	mg/kg	0.36	0.22	0.13	<0.050	0.23	<0.050	0.074	0.13	0.24	0.32	0.12	5.8	4.2	9	13	0.25	<0.050	4.3	0.42	0.28	0.2	0.059	0.081
Soluble (5:1) pH	pH	5.52	5.18	5.26	4.94	4.89	4.87	4.62	4.63	5.38	5.19	4.78	4.51	5.34	4.93	4.68	4.41	5.02	3.95	5.21	5.13	4.3	4.72	4.85
Sulphate (SO4)	mg/kg	<10	<10	<10	<10	10	<10	<10	<10	<10	63	16	<10	<10	<10	<10	<10	<10	46	<10	37	170	<10	<10
Total Carbon-combustion IR	g/kg	-	-	-	-	-	-	-	-	-	-	-	-	-	1.6	-	-	-	-	-	-	460	-	-
Total Sulphur (S)	% g/g	-	-	-	-	-	-	-	-	-	-	-	-	-	0.021	-	-	-	-	-	-	0.66	-	-

Notes:

Bold and Shaded Result exceeds the applicable screening criteria.

a. Nova Scotia. 2021. Tier 1 Environmental Quality Standards for Soil at a Potable Site (Industrial land use and coarse grained soil).

Table D.4: Inorganics in Soil Samples
Goldboro Gold Mine Project, Guysborough County, NS

Parameters	Units	GHD																
		E-08	E-11	E-22	E-31	E-33	E-35	DUP-E (FD of E-35)	E-40	E-45	E-46	E-47	E-55	E-56	E-62	E-68	E-74	DUP-F (FD of E-74)
Sample Depth (m)		0.2 - 0.4	0 - 0.15	0.05 - 0.18	0 - 0.25	0.1 - 0.3	0.2 - 0.35	0.2 - 0.35	0.08 - 0.18	0.15 - 0.30	0.08 - 0.18	0.1 - 0.2	0.1 - 0.3	0.08 - 0.2	0.2 - 0.5	0.15 - 0.2	0.15 - 0.4	0.15 - 0.4
Sample Date		16-Jun-21	16-Jun-21	17-Jun-21	17-Jun-21	17-Jun-21	17-Jun-21	17-Jun-21	17-Jun-21	17-Jun-21	17-Jun-21	17-Jun-21	17-Jun-21	17-Jun-21	17-Jun-21	17-Jun-21	16-Jun-21	16-Jun-21
Ammonia-N	mg/kg	<0.41	<0.33	0.68	<0.33	1.8	<0.41	<0.35	<0.45	11	1.7	3.4	1.8	<0.37	<3.3	<0.42	<0.36	<0.43
Chloride (Cl-)	mg/kg	13	<5.0	11	6.3	17	10	9.7	17	70	17	34	9.8	11	97	12	12	8.6
Conductivity	uS/cm	33	14	46	23	43	47	28	80	290	80	130	45	39	140	39	36	55
Total Inorganic Carbon (C)	g/kg	-	-	-	-	-	<0.5	-	-	-	-	-	-	-	-	-	-	-
Moisture	%	35	22	32	21	35	34	26	40	87	31	53	49	29	91	37	28	37
Nitrate + Nitrite (N)	mg/kg	0.38	<0.25	0.26	<0.25	0.77	0.41	<0.25	0.27	0.38	1.6	3.4	0.33	<0.25	0.75	<0.25	0.39	0.53
Nitrite (N)	mg/kg	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
Organic Carbon (TOC)	g/kg	-	-	-	3.8	-	16	-	-	520	-	-	-	-	-	-	-	-
Orthophosphate (P)	mg/kg	0.064	1.8	11	0.69	0.051	9.5	0.1	3.2	1.3	0.92	1.6	0.67	0.18	37	0.83	0.073	11
Soluble (5:1) pH	pH	4.72	5.05	4.22	5.5	4.7	4.42	4.75	4.31	4.36	4.95	4.27	4.95	5.15	3.64	4.84	4.76	4.28
Sulphate (SO4)	mg/kg	<10	<10	<10	18	<10	24	<10	<10	220	<10	17	<10	<10	50	<10	<10	<10
Total Carbon-combustion IR	g/kg	-	-	-	-	-	13	-	-	-	-	-	-	-	-	-	-	-
Total Sulphur (S)	% g/g	-	-	-	-	-	0.38	-	-	-	-	-	-	-	-	-	-	-

Notes:

Bold and Shaded Result exceeds the applicable screening criteria.

a. Nova Scotia. 2021. Tier 1 Environmental Quality Standards for Soil at a Potable Site (Industrial land use and coarse grained soil).

Table D.5: Modified Acid-Base Accounting in Soil Samples
Goldboro Gold Mine Project, Guysborough County, NS

Parameters[1]	Units	GHD						
		A-24	B-37	DUP-T	B-38	D-07	D-22	E-35
Sample Depth (m)		0.25 - 0.45	0.1 - 0.2	0.1 - 0.2	0.05 - 0.2	0.1 - 0.6	0.5 - 0.9	0.2 - 0.35
Sample Date		14-Jun-21	15-Jun-21	15-Jun-21	15-Jun-21	16-Jun-21	16-Jun-21	17-Jun-21
Paste pH	-	5.5	4.1	4	5.2	4.8	4.2	4.3
Total Sulfur[2]	%	0.082	0.009	0.008	0.103	<0.005	0.353	0.018
Sulfate (as S)[3]	%	0.009	0.009	0.007	0.052	<0.005	0.065	0.013
Sulfide[4]	%	0.073	<0.005	<0.005	0.051	<0.005	0.288	0.005
Acid Production Potential	Kg $CaCO_3$ / tonne	2.3	<0.2	<0.2	1.6	<0.2	9	0.2
Neutralizing Potential pH 8.3	Kg $CaCO_3$ / tonne	1.4	-1.4	-0.2	-1.2	0.7	-41.1	-6.2
Net NP pH 8.3	Kg $CaCO_3$ / tonne	-0.8	-1.4	-0.3	-2.8	0.7	-50.1	-6.4
NP/AP	-	0.6	-	-	-0.8	-	-4.6	-39.8

Notes:
(1) The modified acid/base accounting was determined by the Sobek method.
(2) Total Sulfur was determined using a combustion/infrared method.
(3) Acid soluble, non-volatile sulfur species (sulfate (as S)).
(4) Sulfide was determined as the difference between Total Sulfur and Sulfate (as S).

Table D.6: Grain Size Distributions
Goldboro Gold Mine Project, Guysborough County, NS

Parameters	Units	GHD												
		A-14	A-24	A-36	B-36	B-37	DUP-T (FD of B-37)	C-13	C-18	D-07	D-22	E-31	E-35	E-45
Sample Depth (m)		0.3 - 0.5	0.25 - 0.45	0.05 - 0.30	0.05 - 0.3	0.1 - 0.2	0.1 - 0.2	0.01 - 0.2	0.1 - 0.22	0.1 - 0.6	0.5 - 0.9	0 - 0.25	0.2 - 0.35	0.15 - 0.30
Sample Date		14-Jun-21	14-Jun-21	14-Jun-21	15-Jun-21	15-Jun-21	15-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	16-Jun-21	17-Jun-21	17-Jun-21	17-Jun-21
< -1 Phi (2 mm)	%	75	99	91	87	100	100	100	81	100	99	100	98	99
< 0 Phi (1 mm)	%	69	98	88	83	100	100	100	67	100	96	100	96	90
< +1 Phi (0.5 mm)	%	63	97	84	80	99	99	100	50	98	91	99	92	82
< +2 Phi (0.25 mm)	%	55	95	76	74	94	91	95	33	74	86	90	79	76
< +3 Phi (0.12 mm)	%	47	95	63	63	66	64	89	21	36	83	67	51	73
< +4 Phi (0.062 mm)	%	39	94	47	47	32	36	79	15	13	81	42	34	71
< +5 Phi (0.031 mm)	%	33	92	33	33	14	15	67	11	6.4	79	24	27	67
< +6 Phi (0.016 mm)	%	22	83	20	22	4.6	5.7	41	8.3	4.2	76	10	21	66
< +7 Phi (0.0078 mm)	%	11	51	11	13	1.1	1.6	11	5.7	1.5	70	2.8	14	59
< +8 Phi (0.0039 mm)	%	9.3	40	9	9.8	0.49	1.2	6.4	4.9	0.98	65	1.8	11	53
< +9 Phi (0.0020 mm)	%	6.3	25	7.3	6.8	0.53	0.8	2.6	3.8	0.72	60	0.84	7.2	54
Gravel	%	25	0.89	9.5	13	<0.10	<0.10	<0.10	19	<0.10	0.73	<0.10	1.7	0.77
Sand	%	36	5.4	44	40	68	64	21	66	87	18	58	65	28
Silt	%	30	54	38	37	32	35	73	9.9	12	16	41	23	18
Clay	%	9.3	40	9	9.8	0.49	1.2	6.4	4.9	0.98	65	1.8	11	53

Table D.7: Soil QA/QC (Field Duplicates)

Parameters	Units	A-45				B-37				C-03				D-07				E-35			
		RDL (mg/kg)	14-Jun-21	DUP-A	Relative Percent Difference (%)	RDL (mg/kg)	15-Jun-21	DUP-B	Relative Percent Difference (%)	RDL (mg/kg)	16-Jun-21	DUP-C	Relative Percent Difference (%)	RDL (mg/kg)	16-Jun-21	DUP-D	Relative Percent Difference (%)	RDL (mg/kg)	16-Jun-21	DUP-F	Relative Percent Difference (%)
Metals																					
Aluminum (Al)	mg/kg	10	20000	19000	5	10	15000	13000	14	10	5000	6800	31	10	12000	11000	9	10	9700	8600	12
Antimony (Sb)	mg/kg	2	<2.0	<2.0	NC	2	4.3	5.1	NC	2	<2.0	<2.0	NC	2	8.9	8	11	2	20	15	29
Arsenic (As)	mg/kg	2	14	15	7	2	9500	11000	15	2	200	250	22	2	11000	9900	11	2	28000	22000	24
Barium (Ba)	mg/kg	5	26	27	4	5	82	72	13	5	8.1	13	NC	5	67	61	9	5	47	44	7
Beryllium (Be)	mg/kg	2	<2.0	<2.0	NC	2	<2.0	<2.0	NC	2	<2.0	<2.0	NC	2	<2.0	<2.0	NC	2	<2.0	<2.0	NC
Bismuth (Bi)	mg/kg	2	<2.0	<2.0	NC	2	<2.0	<2.0	NC	2	<2.0	<2.0	NC	2	<2.0	<2.0	NC	2	<2.0	<2.0	NC
Boron (B)	mg/kg	50	<50	<50	NC	50	<50	<50	NC	50	<50	<50	NC	50	<50	<50	NC	50	<50	<50	NC
Cadmium (Cd)	mg/kg	0.3	<0.30	<0.30	NC	0.3	<0.30	<0.30	NC	0.3	<0.30	<0.30	NC	0.3	<0.30	<0.30	NC	0.3	<0.30	<0.30	NC
Chromium (Cr)	mg/kg	2	22	24	9	2	23	20	14	2	8	11	32	2	19	19	0	2	16	16	0
Cobalt (Co)	mg/kg	1	4	4.5	NC	1	<1.0	1.4	NC	1	1	2	NC	1	1	<1.0	NC	1	3	1	NC
Copper (Cu)	mg/kg	2	8	9.1	NC	2	3	7.6	NC	2	<2.0	2	NC	2	8	7	10	2	8	8	2
Iron (Fe)	mg/kg	50	19,000	19,000	0	50	32,000	31,000	3	50	14,000	15,000	7	50	29,000	26,000	11	50	40,000	35,000	13
Lead (Pb)	mg/kg	0.5	9	9.3	6	0.5	24	48	**67**	0.5	5	7	34	0.5	52	39	29	0.5	96	74	26
Lithium (Li)	mg/kg	2	19	19	0	2	27	22	20	2	3	5	NC	2	21	20	5	2	14	12	15
Manganese (Mn)	mg/kg	2	150	160	6	2	380	310	20	2	47	77	**48**	2	290	260	11	2	200	170	16
Mercury (Hg)	mg/kg	0.1	<0.10	<0.10	NC	0.1	6.2	4.5	32	0.1	0.1	0.2	NC	0.1	3	3	7	0.1	15	15	0
Molybdenum (Mo)	mg/kg	2	<2.0	<2.0	NC	2	<2.0	<2.0	NC	2	<2.0	<2.0	NC	2	<2.0	<2.0	NC	2	<2.0	<2.0	NC
Nickel (Ni)	mg/kg	2	13	13	0	2	7.9	8	NC	2	3	5	NC	2	8	7	8	2	9	6	NC
Rubidium (Rb)	mg/kg	2	10	11	12	2	53	43	21	2	4	5	NC	2	40	38	5	2	27	22	20
Selenium (Se)	mg/kg	0.5	1	0.87	NC	0.5	<0.50	<0.50	NC	0.5	1	1	NC	0.5	<0.50	<0.50	NC	0.5	<0.50	1	NC
Silver (Ag)	mg/kg	0.5	<0.50	<0.50	NC	0.5	<0.50	<0.50	NC	0.5	<0.50	<0.50	NC	0.5	<0.50	<0.50	NC	0.5	1	1	NC
Strontium (Sr)	mg/kg	5	<5.0	<5.0	NC	5	<5.0	<5.0	NC	5	<5.0	<5.0	NC	5	9	8	10	5	7	5	NC
Thallium (Tl)	mg/kg	0.1	0	0.11	NC	0.1	0.37	0.33	11	0.1	<0.10	<0.10	NC	0.1	0	0	10	0.1	0	0	NC
Tin (Sn)	mg/kg	1	<1.0	<1.0	NC	1	2.1	<1.0	NC	1	<1.0	<1.0	NC	1	<1.0	<1.0	NC	1	<1.0	<1.0	NC
Uranium (U)	mg/kg	0.1	1	0.81	15	0.1	0.53	0.39	30	0.1	0	1	17	0.1	0	0	13	0.1	0	0	NC
Vanadium (V)	mg/kg	2	23	24	4	2	26	24	8	2	29	31	7	2	21	19	10	2	19	18	5
Zinc (Zn)	mg/kg	5	30	30	0	5	42	39	7	5	6	10	NC	5	39	31	23	5	31	21	38
Inorganics																					
Ammonia-N	mg/kg	0.39	73	91	22	0.33	<0.33	<0.33	NC	0.37	0.61	0.43	NC	0.33	<0.33	<0.32	NC	0.41	<0.41	<0.43	NC
Chloride (Cl-)	mg/kg	5	<1.0	<1.0	NC	5	5.2	10	NC	5	8.5	13	NC	5	<5.0	<5.0	NC	5	10	8.6	NC
Conductivity	uS/cm	1	1.1	1.2	NC	1	29	38	27	1	33	45	31	1	16	19	17	1	47	55	16
Moisture	%	1	<1.0	<1.0	NC	1	22	23	4	1	27	38	34	1	20	20	0	1	34	37	8
Nitrate + Nitrite (N)	mg/kg	0.25	<2.0	<2.0	NC	0.25	<0.25	0.42	NC	0.25	0.6	0.25	NC	0.25	<0.25	<0.25	NC	0.25	0.41	0.53	NC
Nitrite (N)	mg/kg	0.05	<50	<50	NC	0.05	<0.050	<0.050	NC	0.05	<0.050	<0.050	NC	0.05	<0.050	<0.050	NC	0.05	<0.050	<0.050	NC
Orthophosphate (P)	mg/kg	0.05	44000	44000	0	0.25	3.8	14	**115**	0.05	0.074	0.13	NC	0.25	9	13	36	0.25	9.5	11	15
Soluble (5:1) pH	pH	N/A	<1.0	<1.0	NC	N/A	4.53	4.71	4	N/A	4.62	4.63	0	N/A	4.93	4.68	5	N/A	4.42	4.28	3
Sulphate (SO4)	mg/kg	11	<0.40	<0.40	NC	10	15	12	22	10	<10	<10	NC	10	<10	<10	NC	10	24	<10	NC

Notes:
NC = not calculated
RPD calculated when one or both samples are >= 5x RDL.

Table D.7: Soil QA/QC (Field Duplicates)

Parameters	Units	E-74				ANX-A4b				ANX-A8a			
		RDL (mg/kg)	16-Jun-21	DUP-E	Relative Percent Difference (%)	RDL (mg/kg)	1-Sep-21	DUP	Relative Percent Difference (%)	RDL (mg/kg)	1-Sep-21	DUP	Relative Percent Difference (%)
Metals													
Aluminum (Al)	mg/kg	10	3400	3100	9	100	53500	49500	8	100	93500	111500	18
Antimony (Sb)	mg/kg	2	<2.0	<2.0	NC	3	<3	<3	NC	3	<3	5	NC
Arsenic (As)	mg/kg	2	3	4.9	NC	5	598	387	**43**	5	582	504	14
Barium (Ba)	mg/kg	5	6.5	6.4	NC	5	418	386	8	5	1082	1127	4
Beryllium (Be)	mg/kg	2	<2.0	<2.0	NC	0.5	2.6	2.3	NC	0.5	6.1	6.1	0
Bismuth (Bi)	mg/kg	2	<2.0	<2.0	NC	2	<2	<2	NC	2	<2	<2	NC
Boron (B)	mg/kg	50	<50	<50	NC	-	-	-	-	-	-	-	-
Cadmium (Cd)	mg/kg	0.3	<0.30	<0.30	NC	0.5	1.4	0.8	NC	0.5	0.8	1.4	NC
Chromium (Cr)	mg/kg	2	4	4	NC	5	41	43	5	5	61	55	10
Cobalt (Co)	mg/kg	1	<1.0	<1.0	NC	2	4	3	NC	2	5	6	NC
Copper (Cu)	mg/kg	2	<2.0	<2.0	NC	5	18	16	NC	5	18	19	NC
Iron (Fe)	mg/kg	50	1,700	1,600	6	100	13500	13300	1	100	27400	29700	8
Lead (Pb)	mg/kg	0.5	4.7	4.7	0	2	21	26	21	2	31	33	6
Lithium (Li)	mg/kg	2	<2.0	<2.0	NC	-	-	-	-	-	-	-	-
Manganese (Mn)	mg/kg	2	30	30	0	1	733	691	6	1	459	510	11
Mercury (Hg)	mg/kg	0.1	<0.10	<0.10	NC	0.1	0.98	-	NC	0.1	4.3	-	NC
Molybdenum (Mo)	mg/kg	2	<2.0	<2.0	NC	1	1	1	NC	1	1	<1	NC
Nickel (Ni)	mg/kg	2	<2.0	<2.0	NC	1	14	9	**43**	1	18	18	0
Rubidium (Rb)	mg/kg	2	3	3	NC	-	-	-	-	-	-	-	-
Selenium (Se)	mg/kg	0.5	<0.50	<0.50	NC	10	<10	<10	NC	10	<10	<10	NC
Silver (Ag)	mg/kg	0.5	<0.50	<0.50	NC	0.2	<0.2	<0.2	NC	0.2	<0.2	<0.2	NC
Strontium (Sr)	mg/kg	5	<5.0	<5.0	NC	1	83	76	9	1	73	79	8
Thallium (Tl)	mg/kg	0.1	<0.10	<0.10	NC	-	-	-	-	-	-	-	-
Tin (Sn)	mg/kg	1	<1.0	<1.0	NC	10	<10	<10	NC	10	<10	<10	NC
Uranium (U)	mg/kg	0.1	0	0	NC	2	<2	<2	NC	2	<2	<2	NC
Vanadium (V)	mg/kg	2	5	5	NC	1	50	47	6	1	125	132	5
Zinc (Zn)	mg/kg	5	<5.0	<5.0	NC	5	39	37	5	5	81	88	8
Inorganics													
Ammonia-N	mg/kg	0.36	<0.36	<0.35	NC	-	-	-	-	-	-	-	-
Chloride (Cl-)	mg/kg	5	12	9.7	NC	-	-	-	-	-	-	-	-
Conductivity	uS/cm	1	36	28	25	-	-	-	-	-	-	-	-
Moisture	%	1	28	26	7	-	-	-	-	-	-	-	-
Nitrate + Nitrite (N)	mg/kg	0.25	0.39	<0.25	NC	-	-	-	-	-	-	-	-
Nitrite (N)	mg/kg	0.05	<0.050	<0.050	NC	-	-	-	-	-	-	-	-
Orthophosphate (P)	mg/kg	0.05	0.073	0.1	NC	-	-	-	-	-	-	-	-
Soluble (5:1) pH	pH	N/A	4.76	4.75	0	-	-	-	-	-	-	-	-
Sulphate (SO4)	mg/kg	10	<10	<10	NC	-	-	-	-	-	-	-	-

Notes:
NC = not calculated
RPD calculated when one or both samples are >= 5x RDL.

Appendix E

Laboratory Certificates of Analysis

Your P.O. #: TO FOLLOW
Your Project #: 11222385
Site Location: GOLDBORO
Your C.O.C. #: N/A

Attention: Glen Merkley

GHD Limited
120 Western Parkway
Bedford, NS
CANADA B4B 0V2

Report Date: 2021/07/14
Report #: R6718985
Version: 3 - Final

CERTIFICATE OF ANALYSIS

BV LABS JOB #: C1H4101
Received: 2021/06/22, 16:33

Sample Matrix: Soil
Samples Received: 63

Analyses	Quantity	Date Extracted	Date Analyzed	Laboratory Method	Analytical Method
Chloride in Soil by Auto. Colourimetry	8	N/A	2021/07/05	ATL SOP 00014	SM 23 4500-Cl- E m
Chloride in Soil by Auto. Colourimetry	7	N/A	2021/07/06	ATL SOP 00014	SM 23 4500-Cl- E m
Chloride in Soil by Auto. Colourimetry	1	N/A	2021/07/07	ATL SOP 00014	SM 23 4500-Cl- E m
Chloride in Soil by Auto. Colourimetry	46	N/A	2021/07/08	ATL SOP 00014	SM 23 4500-Cl- E m
Conductance - soil	8	2021/06/29	2021/06/29	ATL SOP 00004	SM 23 2510B m
Conductance - soil	7	2021/07/05	2021/07/05	ATL SOP 00004	SM 23 2510B m
Conductance - soil	46	2021/07/06	2021/07/07	ATL SOP 00004	SM 23 2510B m
Conductance - soil	1	2021/07/07	2021/07/07	ATL SOP 00004	SM 23 2510B m
Metals Solids Acid Extr. ICPMS	6	2021/06/29	2021/06/29	ATL SOP 00058	EPA 6020B R2 m
Metals Solids Acid Extr. ICPMS	2	2021/06/29	2021/06/30	ATL SOP 00058	EPA 6020B R2 m
Metals Solids Acid Extr. ICPMS	5	2021/06/30	2021/07/02	ATL SOP 00058	EPA 6020B R2 m
Metals Solids Acid Extr. ICPMS	5	2021/06/30	2021/07/05	ATL SOP 00058	EPA 6020B R2 m
Metals Solids Acid Extr. ICPMS	1	2021/06/30	2021/07/06	ATL SOP 00058	EPA 6020B R2 m
Metals Solids Acid Extr. ICPMS	2	2021/07/05	2021/07/05	ATL SOP 00058	EPA 6020B R2 m
Metals Solids Acid Extr. ICPMS	17	2021/07/06	2021/07/06	ATL SOP 00058	EPA 6020B R2 m
Metals Solids Acid Extr. ICPMS	24	2021/07/06	2021/07/07	ATL SOP 00058	EPA 6020B R2 m
Sulfur (1)	7	N/A	2021/07/05	STL SOP-00028	MA. 310-CS 1.0 R3 m
Moisture	8	N/A	2021/06/29	ATL SOP 00001	OMOE Handbook 1983 m
Moisture	13	N/A	2021/06/30	ATL SOP 00001	OMOE Handbook 1983 m
Moisture	41	N/A	2021/07/03	ATL SOP 00001	OMOE Handbook 1983 m
Nitrogen Ammonia - soil (as N)	1	2021/06/29	2021/07/07	ATL SOP 00015	EPA 350.1 R2 m
Nitrogen Ammonia - soil (as N)	1	2021/07/02	2021/07/07	ATL SOP 00015	EPA 350.1 R2 m
Nitrogen Ammonia - soil (as N)	60	2021/07/05	2021/07/07	ATL SOP 00015	EPA 350.1 R2 m
Nitrogen - Nitrate + Nitrite	8	2021/07/02	2021/07/05	ATL SOP 00016	USGS I-2547-11m
Nitrogen - Nitrate + Nitrite	7	2021/07/06	2021/07/06	ATL SOP 00016	USGS I-2547-11m
Nitrogen - Nitrate + Nitrite	47	2021/07/07	2021/07/07	ATL SOP 00016	USGS I-2547-11m
Nitrogen - Nitrite by auto colourimetry	8	2021/07/02	2021/07/05	ATL SOP 00017	SM 23 4500-NO2- B m
Nitrogen - Nitrite by auto colourimetry	7	2021/07/06	2021/07/06	ATL SOP 00017	SM 23 4500-NO2- B m
Nitrogen - Nitrite by auto colourimetry	33	2021/07/07	2021/07/07	ATL SOP 00017	SM 23 4500-NO2- B m
Nitrogen - Nitrite by auto colourimetry	14	2021/07/07	2021/07/08	ATL SOP 00017	SM 23 4500-NO2- B m
pH (5:1 DI Water Extract)	8	2021/06/29	2021/06/29	ATL SOP 00003	SM 23 4500-H+ B m
pH (5:1 DI Water Extract)	8	2021/07/05	2021/07/05	ATL SOP 00003	SM 23 4500-H+ B m

Your P.O. #: TO FOLLOW
Your Project #: 11222385
Site Location: GOLDBORO
Your C.O.C. #: N/A

Attention: Glen Merkley

GHD Limited
120 Western Parkway
Bedford, NS
CANADA B4B 0V2

Report Date: 2021/07/14
Report #: R6718985
Version: 3 - Final

CERTIFICATE OF ANALYSIS

BV LABS JOB #: C1H4101
Received: 2021/06/22, 16:33

Sample Matrix: Soil
Samples Received: 63

Analyses	Quantity	Date Extracted	Date Analyzed	Laboratory Method	Analytical Method
pH (5:1 DI Water Extract)	46	2021/07/06	2021/07/07	ATL SOP 00003	SM 23 4500-H+ B m
Phosphorus - ortho by auto Colourimetry	8	2021/07/02	2021/07/05	ATL SOP 00021	SM 23 4500-P E m
Phosphorus - ortho by auto Colourimetry	7	2021/07/06	2021/07/06	ATL SOP 00021	SM 23 4500-P E m
Phosphorus - ortho by auto Colourimetry	46	2021/07/07	2021/07/07	ATL SOP 00021	SM 23 4500-P E m
Phosphorus - ortho by auto Colourimetry	1	2021/07/07	2021/07/08	ATL SOP 00021	SM 23 4500-P E m
Particle size in solids (pipette&sieve) (4)	13	N/A	2021/07/14	ATL SOP 00012	MSAMS'78/WREP-125R3m
Sulphate in Soil by Auto Colourimetry	8	2021/07/02	2021/07/05	ATL SOP 00023	ASTM D516-16 m
Sulphate in Soil by Auto Colourimetry	7	2021/07/06	2021/07/06	ATL SOP 00023	ASTM D516-16 m
Sulphate in Soil by Auto Colourimetry	47	2021/07/07	2021/07/07	ATL SOP 00023	ASTM D516-16 m
Acid Rock Drain. in S (Sub from Bedford) (2)	7	2021/07/09	2021/07/12		
Methyl Mercury Soil (sub from Bedford) (3)	8	2021/07/09	2021/07/06		
Methyl Mercury Soil (sub from Bedford) (3)	5	2021/07/09	2021/07/08		
Total Carbon in Solids by Ind.	7	2021/07/07	2021/07/07	ATL SOP 00044	LECO203601224 1991 m
TIC in soil	7	2021/06/25	2021/07/07	ATL SOP 00044	LECO203601224 1991m
Total Organic Carbon in Soil	4	2021/07/02	2021/07/02	ATL SOP 00044	LECO203601224 1991 m
Total Organic Carbon in Soil	1	2021/07/02	2021/07/06	ATL SOP 00044	LECO203601224 1991 m
Total Organic Carbon in Soil	2	2021/07/06	2021/07/06	ATL SOP 00044	LECO203601224 1991 m
Total Organic Carbon in Soil	7	2021/07/07	2021/07/07	ATL SOP 00044	LECO203601224 1991 m

Remarks:

Bureau Veritas is accredited to ISO/IEC 17025 for specific parameters on scopes of accreditation. Unless otherwise noted, procedures used by Bureau Veritas are based upon recognized Provincial, Federal or US method compendia such as CCME, MELCC, EPA, APHA.

All work recorded herein has been done in accordance with procedures and practices ordinarily exercised by professionals in Bureau Veritas' profession using accepted testing methodologies, quality assurance and quality control procedures (except where otherwise agreed by the client and Bureau Veritas in writing). All data is in statistical control and has met quality control and method performance criteria unless otherwise noted. All method blanks are reported; unless indicated otherwise, associated sample data are not blank corrected. Where applicable, unless otherwise noted, Measurement Uncertainty has not been accounted for when stating conformity to the referenced standard.

Bureau Veritas liability is limited to the actual cost of the requested analyses, unless otherwise agreed in writing. There is no other warranty expressed or implied. Bureau Veritas has been retained to provide analysis of samples provided by the Client using the testing methodology referenced in this report. Interpretation and use of test results are the sole responsibility of the Client and are not within the scope of services provided by Bureau Veritas, unless otherwise agreed in writing. Bureau Veritas is not responsible for the accuracy or any data impacts, that result from the information provided by the

Your P.O. #: TO FOLLOW
Your Project #: 11222385
Site Location: GOLDBORO
Your C.O.C. #: N/A

Attention: Glen Merkley

GHD Limited
120 Western Parkway
Bedford, NS
CANADA B4B 0V2

Report Date: 2021/07/14
Report #: R6718985
Version: 3 - Final

CERTIFICATE OF ANALYSIS

BV LABS JOB #: C1H4101
Received: 2021/06/22, 16:33
customer or their agent.

Solid sample results, except biota, are based on dry weight unless otherwise indicated. Organic analyses are not recovery corrected except for isotope dilution methods.
Results relate to samples tested. When sampling is not conducted by Bureau Veritas, results relate to the supplied samples tested.

Reference Method suffix "m" indicates test methods incorporate validated modifications from specific reference methods to improve performance.
* RPDs calculated using raw data. The rounding of final results may result in the apparent difference.
(1) This test was performed by Bureau Veritas Montreal via Bedford
(2) This test was performed by Bedford to RPC Subcontract
(3) This test was performed by Sub Bedford to Flett Research
(4) Note: Graphical representation of larger fractions (PHI-4, PHI -3 and PHI -2) not applicable unless these optional parameters are specifically requested.

Encryption Key

Please direct all questions regarding this Certificate of Analysis to your Project Manager.
Atena Georgescu, Project Manager II
Email: Atena.Georgescu@bureauveritas.com
Phone# (902)420-0203 Ext:239
==========
BV Labs has procedures in place to guard against improper use of the electronic signature and have the required "signatories", as per ISO/IEC 17025, signing the reports. For Service Group specific validation please refer to the Validation Signature Page.

Bureau Veritas Laboratories 200 Bluewater Rd, Suite 105, Bedford, Nova Scotia Canada B4B 1G9 Tel: 902-420-0203 Toll-free: 800-565-7227 Fax: 902-420-8612 www.bvlabs.com

BV Labs Job #: C1H4101
Report Date: 2021/07/14

GHD Limited
Client Project #: 11222385
Site Location: GOLDBORO
Your P.O. #: TO FOLLOW
Sampler Initials: JV

RESULTS OF ANALYSES OF SOIL

BV Labs ID		PXP276	PXP276	PXP277		PXP278			PXP279		
Sampling Date		2021/06/14 15:40	2021/06/14 15:40	2021/06/14 14:45		2021/06/14 17:35			2021/06/14 14:05		
COC Number		N/A	N/A	N/A		N/A			N/A		
	UNITS	A-05	A-05 Lab-Dup	A-08	RDL	A-13	RDL	QC Batch	A-14	RDL	QC Batch
Inorganics											
Ammonia-N	mg/kg	<0.38	<0.38	<0.38	0.38	<0.36	0.36	7446423	<0.41	0.41	7446423
Chloride (Cl-)	mg/kg	11	7.7	9.0	5.0	5.4	5.0	7440858	14	5.0	7440858
Conductivity	uS/cm	15	14	21	1.0	9.1	1.0	7435915	51	1.0	7435915
Moisture	%	30	31	29	1.0	27	1.0	7432666	36	1.0	7432666
Nitrate + Nitrite (N)	mg/kg	0.52	0.50	1.4	0.25	<0.25	0.25	7440867	6.9	0.25	7440867
Nitrite (N)	mg/kg	<0.050	<0.050	<0.050	0.050	<0.050	0.050	7440868	<0.050	0.050	7440868
Organic Carbon (TOC)	g/kg								32	0.50	7440667
Orthophosphate (P)	mg/kg	0.081	<0.050	0.16	0.050	<0.050	0.050	7440865	2.2	0.050	7440865
Soluble (5:1) pH	pH	5.54	5.34	5.10	N/A	5.60	N/A	7435909	6.07	N/A	7435909
Sulphate (SO4)	mg/kg	11 (1)	<11 (1)	11 (1)	11	<11 (1)	11	7440860	30 (1)	11	7440860
< -1 Phi (2 mm)	%								75 (2)	0.10	7444081
< 0 Phi (1 mm)	%								69 (2)	0.10	7444081
< +1 Phi (0.5 mm)	%								63	0.10	7444081
< +2 Phi (0.25 mm)	%								55	0.10	7444081
< +3 Phi (0.12 mm)	%								47	0.10	7444081
< +4 Phi (0.062 mm)	%								39	0.10	7444081
< +5 Phi (0.031 mm)	%								33	0.10	7444081
< +6 Phi (0.016 mm)	%								22	0.10	7444081
< +7 Phi (0.0078 mm)	%								11	0.10	7444081
< +8 Phi (0.0039 mm)	%								9.3	0.10	7444081
< +9 Phi (0.0020 mm)	%								6.3	0.10	7444081
Gravel	%								25	0.10	7444081
Sand	%								36	0.10	7444081
Silt	%								30	0.10	7444081
Clay	%								9.3	0.10	7444081
Subcontracted Analysis											
Subcontract Parameter	N/A								ATTACHED	N/A	7454407

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
Lab-Dup = Laboratory Initiated Duplicate
N/A = Not Applicable
(1) Elevated reporting limit due to blank performance.
(2) PSA sample observation comment: Fraction contained organic matter

Bureau Veritas Laboratories 200 Bluewater Rd, Suite 105, Bedford, Nova Scotia Canada B4B 1G9 Tel: 902-420-0203 Toll-free: 800-565-7227 Fax: 902-420-8612 www.bvlabs.com

BV Labs Job #: C1H4101
Report Date: 2021/07/14

GHD Limited
Client Project #: 11222385
Site Location: GOLDBORO
Your P.O. #: TO FOLLOW
Sampler Initials: JV

RESULTS OF ANALYSES OF SOIL

BV Labs ID		PXP279			PXP280			PXP280		
Sampling Date		2021/06/14 14:05			2021/06/15 09:10			2021/06/15 09:10		
COC Number		N/A			N/A			N/A		
	UNITS	A-14 Lab-Dup	RDL	QC Batch	A-24	RDL	QC Batch	A-24 Lab-Dup	RDL	QC Batch
Inorganics										
Ammonia-N	mg/kg				7.2	0.89	7446601	8.1	0.89	7446601
Chloride (Cl-)	mg/kg				29	5.0	7445697			
Conductivity	uS/cm				130	1.0	7444093			
Total Inorganic Carbon (C)	g/kg				4.8	0.5	7430582			
Moisture	%				68	1.0	7435465			
Nitrate + Nitrite (N)	mg/kg				<0.25	0.25	7445714			
Nitrite (N)	mg/kg				<0.050	0.050	7445715			
Organic Carbon (TOC)	g/kg	32	0.50	7440667	130	0.50	7445432	120	0.50	7445432
Orthophosphate (P)	mg/kg				0.068	0.050	7445711			
Soluble (5:1) pH	pH				5.73	N/A	7444104			
Sulphate (SO4)	mg/kg				100	10	7445708			
Total Carbon-combustion IR	g/kg				130	0.50	7448515			
< -1 Phi (2 mm)	%	76	0.10	7444081	99 (1)	0.10	7444081			
< 0 Phi (1 mm)	%	69 (1)	0.10	7444081	98 (1)	0.10	7444081			
< +1 Phi (0.5 mm)	%	62	0.10	7444081	97 (1)	0.10	7444081			
< +2 Phi (0.25 mm)	%	54	0.10	7444081	95 (1)	0.10	7444081			
< +3 Phi (0.12 mm)	%	46	0.10	7444081	95	0.10	7444081			
< +4 Phi (0.062 mm)	%	39	0.10	7444081	94	0.10	7444081			
< +5 Phi (0.031 mm)	%	34	0.10	7444081	92	0.10	7444081			
< +6 Phi (0.016 mm)	%	22	0.10	7444081	83	0.10	7444081			
< +7 Phi (0.0078 mm)	%	12	0.10	7444081	51	0.10	7444081			
< +8 Phi (0.0039 mm)	%	9.3	0.10	7444081	40	0.10	7444081			
< +9 Phi (0.0020 mm)	%	6.4	0.10	7444081	25	0.10	7444081			
Gravel	%	24	0.10	7444081	0.89	0.10	7444081			
Sand	%	37	0.10	7444081	5.4	0.10	7444081			
Silt	%	29	0.10	7444081	54	0.10	7444081			
Clay	%	9.3	0.10	7444081	40	0.10	7444081			
Subcontracted Analysis										
Subcontract Parameter	N/A				ATTACHED	N/A	7454407			

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
Lab-Dup = Laboratory Initiated Duplicate
N/A = Not Applicable
(1) PSA sample observation comment: Fraction contained organic matter

Bureau Veritas Laboratories 200 Bluewater Rd, Suite 105, Bedford, Nova Scotia Canada B4B 1G9 Tel: 902-420-0203 Toll-free: 800-565-7227 Fax: 902-420-8612 www.bvlabs.com

BV Labs Job #: C1H4101
Report Date: 2021/07/14

GHD Limited
Client Project #: 11222385
Site Location: GOLDBORO
Your P.O. #: TO FOLLOW
Sampler Initials: JV

RESULTS OF ANALYSES OF SOIL

BV Labs ID		PXP281			PXP282			PXP283		
Sampling Date		2021/06/14 15:40			2021/06/15 09:00			2021/06/15 09:30		
COC Number		N/A			N/A			N/A		
	UNITS	A-26	RDL	QC Batch	A-28	RDL	QC Batch	A-36	RDL	QC Batch
Inorganics										
Ammonia-N	mg/kg	<0.32	0.32	7446423	4.1	1.2	7446423	<0.38	0.38	7446423
Chloride (Cl-)	mg/kg	8.4	5.0	7440858	60	5.0	7445697	15	5.0	7445697
Conductivity	uS/cm	37	1.0	7435915	160	1.0	7444093	35	1.0	7444093
Moisture	%	20	1.0	7432666	75	1.0	7435465	31	1.0	7435465
Nitrate + Nitrite (N)	mg/kg	<0.25	0.25	7440867	0.73	0.25	7445714	0.69	0.25	7445714
Nitrite (N)	mg/kg	<0.050	0.050	7440868	<0.050	0.050	7445715	<0.050	0.050	7445715
Organic Carbon (TOC)	g/kg							31	0.50	7440667
Orthophosphate (P)	mg/kg	0.22	0.050	7440865	0.14	0.050	7445711	<0.050	0.050	7445711
Soluble (5:1) pH	pH	5.91	N/A	7435909	5.66	N/A	7444104	5.10	N/A	7444104
Sulphate (SO4)	mg/kg	45 (1)	11	7440860	100	10	7445708	<10	10	7445708
< -1 Phi (2 mm)	%							91	0.10	7444081
< 0 Phi (1 mm)	%							88	0.10	7444081
< +1 Phi (0.5 mm)	%							84	0.10	7444081
< +2 Phi (0.25 mm)	%							76	0.10	7444081
< +3 Phi (0.12 mm)	%							63	0.10	7444081
< +4 Phi (0.062 mm)	%							47	0.10	7444081
< +5 Phi (0.031 mm)	%							33	0.10	7444081
< +6 Phi (0.016 mm)	%							20	0.10	7444081
< +7 Phi (0.0078 mm)	%							11	0.10	7444081
< +8 Phi (0.0039 mm)	%							9.0	0.10	7444081
< +9 Phi (0.0020 mm)	%							7.3	0.10	7444081
Gravel	%							9.5	0.10	7444081
Sand	%							44	0.10	7444081
Silt	%							38	0.10	7444081
Clay	%							9.0	0.10	7444081
Subcontracted Analysis										
Subcontract Parameter	N/A							ATTACHED	N/A	7454407

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
N/A = Not Applicable
(1) Elevated reporting limit due to blank performance.

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BV Labs Job #: C1H4101
Report Date: 2021/07/14

GHD Limited
Client Project #: 11222385
Site Location: GOLDBORO
Your P.O. #: TO FOLLOW
Sampler Initials: JV

RESULTS OF ANALYSES OF SOIL

BV Labs ID		PXP284		PXP285			PXP287			PXP288		
Sampling Date		2021/06/14 16:55		2021/06/14 17:30			2021/06/15 14:50			2021/06/15 11:05		
COC Number		N/A		N/A			N/A			N/A		
	UNITS	A-41	RDL	A-45	RDL	QC Batch	B-04	RDL	QC Batch	B-06	RDL	QC Batch
Inorganics												
Ammonia-N	mg/kg	<0.35	0.35	<0.39	0.39	7446423	<0.42	0.42	7446423	3.1	1.9	7446423
Chloride (Cl-)	mg/kg	<5.0	5.0	<5.0	5.0	7440858	7.2	5.0	7445697	61	5.0	7448217
Conductivity	uS/cm	12	1.0	15	1.0	7435915	25	1.0	7444093	170	1.0	7448694
Moisture	%	25	1.0	33	1.0	7432666	37	1.0	7435465	84	1.0	7435465
Nitrate + Nitrite (N)	mg/kg	<0.25	0.25	0.55	0.25	7440867	<0.25	0.25	7445714	1.2	0.25	7448230
Nitrite (N)	mg/kg	<0.050	0.050	<0.050	0.050	7440868	<0.050	0.050	7445715	<0.050	0.050	7448231
Orthophosphate (P)	mg/kg	<0.050	0.050	<0.050	0.050	7440865	0.057	0.050	7445711	3.0	0.25	7448228
Soluble (5:1) pH	pH	5.12	N/A	5.18	N/A	7435909	5.16	N/A	7444104	4.23	N/A	7448682
Sulphate (SO4)	mg/kg	17 (1)	11	23 (1)	11	7440860	20	10	7445708	110	10	7448225

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
N/A = Not Applicable
(1) Elevated reporting limit due to blank performance.

BV Labs ID		PXP289		PXP290			PXP291		
Sampling Date		2021/06/15 12:40		2021/06/15 14:30			2021/06/15 11:30		
COC Number		N/A		N/A			N/A		
	UNITS	B-13	RDL	B-21	RDL	QC Batch	B-24	RDL	QC Batch
Inorganics									
Ammonia-N	mg/kg	<0.43	0.43	<0.45	0.45	7446423	<2.1	2.1	7446423
Chloride (Cl-)	mg/kg	9.0	5.0	8.7	5.0	7445697	16	5.0	7448087
Conductivity	uS/cm	29	1.0	74	1.0	7444093	47	1.0	7448618
Moisture	%	38	1.0	39	1.0	7435465	86	1.0	7435465
Nitrate + Nitrite (N)	mg/kg	<0.25	0.25	0.33	0.25	7445714	0.40	0.25	7448092
Nitrite (N)	mg/kg	<0.050	0.050	<0.050	0.050	7445715	<0.050	0.050	7448093
Orthophosphate (P)	mg/kg	<0.050	0.050	0.070	0.050	7445711	<0.050	0.050	7448091
Soluble (5:1) pH	pH	5.26	N/A	5.16	N/A	7444104	4.95	N/A	7448613
Sulphate (SO4)	mg/kg	<10	10	66	10	7445708	39	10	7448090

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N/A = Not Applicable

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Report Date: 2021/07/14

GHD Limited
Client Project #: 11222385
Site Location: GOLDBORO
Your P.O. #: TO FOLLOW
Sampler Initials: JV

RESULTS OF ANALYSES OF SOIL

BV Labs ID		PXP292			PXP293			PXP293		
Sampling Date		2021/06/15 13:45			2021/06/15 11:05			2021/06/15 11:05		
COC Number		N/A			N/A			N/A		
	UNITS	B-36	RDL	QC Batch	B-37	RDL	QC Batch	B-37 Lab-Dup	RDL	QC Batch
Inorganics										
Ammonia-N	mg/kg	2.6	0.40	7446423	<0.33	0.33	7446423			
Chloride (Cl-)	mg/kg	15	5.0	7448087	5.2	5.0	7448087			
Conductivity	uS/cm	41	1.0	7448618	29	1.0	7448618			
Total Inorganic Carbon (C)	g/kg				<0.5	0.5	7430582			
Moisture	%	34	1.0	7435465	22	1.0	7435465			
Nitrate + Nitrite (N)	mg/kg	<0.25	0.25	7448092	<0.25	0.25	7448092			
Nitrite (N)	mg/kg	<0.050	0.050	7448093	<0.050	0.050	7448093			
Organic Carbon (TOC)	g/kg	37	0.50	7440667	2.1	0.50	7440667			
Orthophosphate (P)	mg/kg	0.14	0.050	7448091	3.8	0.25	7448091			
Soluble (5:1) pH	pH	5.44	N/A	7448613	4.53	N/A	7448613			
Sulphate (SO4)	mg/kg	25	10	7448090	15	10	7448090			
Total Carbon-combustion IR	g/kg				2.0	0.50	7448515	2.0	0.50	7448515
< -1 Phi (2 mm)	%	87	0.10	7444081	100	0.10	7444081			
< 0 Phi (1 mm)	%	83	0.10	7444081	100	0.10	7444081			
< +1 Phi (0.5 mm)	%	80	0.10	7444081	99	0.10	7444081			
< +2 Phi (0.25 mm)	%	74	0.10	7444081	94	0.10	7444081			
< +3 Phi (0.12 mm)	%	63	0.10	7444081	66	0.10	7444081			
< +4 Phi (0.062 mm)	%	47	0.10	7444081	32	0.10	7444081			
< +5 Phi (0.031 mm)	%	33	0.10	7444081	14	0.10	7444081			
< +6 Phi (0.016 mm)	%	22	0.10	7444081	4.6	0.10	7444081			
< +7 Phi (0.0078 mm)	%	13	0.10	7444081	1.1	0.10	7444081			
< +8 Phi (0.0039 mm)	%	9.8	0.10	7444081	0.49	0.10	7444081			
< +9 Phi (0.0020 mm)	%	6.8	0.10	7444081	0.53	0.10	7444081			
Gravel	%	13	0.10	7444081	<0.10	0.10	7444081			
Sand	%	40	0.10	7444081	68	0.10	7444081			
Silt	%	37	0.10	7444081	32	0.10	7444081			
Clay	%	9.8	0.10	7444081	0.49	0.10	7444081			
Subcontracted Analysis										
Subcontract Parameter	N/A	ATTACHED	N/A	7454407	ATTACHED	N/A	7454407			

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
Lab-Dup = Laboratory Initiated Duplicate
N/A = Not Applicable

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Report Date: 2021/07/14

GHD Limited
Client Project #: 11222385
Site Location: GOLDBORO
Your P.O. #: TO FOLLOW
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RESULTS OF ANALYSES OF SOIL

BV Labs ID		PXP294			PXP294			PXP295		
Sampling Date		2021/06/15 12:00			2021/06/15 12:00			2021/06/15 10:15		
COC Number		N/A			N/A			N/A		
	UNITS	B-38	RDL	QC Batch	B-38 Lab-Dup	RDL	QC Batch	B-40	RDL	QC Batch
Inorganics										
Ammonia-N	mg/kg	2.2	0.92	7446423				<0.32	0.32	7446423
Chloride (Cl-)	mg/kg	23	5.0	7448087				7.4	5.0	7445697
Conductivity	uS/cm	71	1.0	7448618				21	1.0	7444093
Total Inorganic Carbon (C)	g/kg	<0.5	0.5	7430582						
Moisture	%	69	1.0	7436182				20	1.0	7436182
Nitrate + Nitrite (N)	mg/kg	<0.25	0.25	7448092				<0.25	0.25	7445714
Nitrite (N)	mg/kg	<0.050	0.050	7448093				<0.050	0.050	7445715
Organic Carbon (TOC)	g/kg	89	0.50	7448009	89	0.50	7448009			
Orthophosphate (P)	mg/kg	0.25	0.050	7448091				2.4	0.25	7445711
Soluble (5:1) pH	pH	5.63	N/A	7448613				5.00	N/A	7444104
Sulphate (SO4)	mg/kg	41	10	7448090				<10	10	7445708
Total Carbon-combustion IR	g/kg	86	0.50	7448515						
Subcontracted Analysis										
Subcontract Parameter	N/A	ATTACHED	N/A	7454387						

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
Lab-Dup = Laboratory Initiated Duplicate
N/A = Not Applicable

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Report Date: 2021/07/14

GHD Limited
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Site Location: GOLDBORO
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RESULTS OF ANALYSES OF SOIL

BV Labs ID		PXP295			PXP296			PXP301		
Sampling Date		2021/06/15 10:15			2021/06/15 15:45			2021/06/15 15:10		
COC Number		N/A			N/A			N/A		
	UNITS	B-40 Lab-Dup	RDL	QC Batch	B-46	RDL	QC Batch	B-47	RDL	QC Batch
Inorganics										
Ammonia-N	mg/kg				<0.71	0.71	7446423	<0.28	0.28	7446423
Chloride (Cl-)	mg/kg	9.5	5.0	7445697	220	5.0	7448087	7.9	5.0	7448087
Conductivity	uS/cm	21	1.0	7444093	300	1.0	7448618	28	1.0	7448618
Moisture	%	21	1.0	7436182	60	1.0	7436182	10	1.0	7441029
Nitrate + Nitrite (N)	mg/kg	<0.25	0.25	7445714	0.33	0.25	7448092	0.29	0.25	7448092
Nitrite (N)	mg/kg	<0.050	0.050	7445715	<0.050	0.050	7448093	<0.050	0.050	7448093
Orthophosphate (P)	mg/kg	2.3	0.25	7445711	66	6.0	7448091	0.36 (1)	0.050	7448091
Soluble (5:1) pH	pH	4.91	N/A	7444104	3.75 (2)	N/A	7448613	5.52	N/A	7448613
Sulphate (SO4)	mg/kg	<10	10	7445708	<10	10	7448090	<10	10	7448090

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
Lab-Dup = Laboratory Initiated Duplicate
N/A = Not Applicable
(1) Poor duplicate agreement due to sample inhomogeniety, results confirmed by repeat anaylsis.
(2) pH value is beyond linear range, extended linearity has been confirmed.

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BV Labs Job #: C1H4101
Report Date: 2021/07/14

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RESULTS OF ANALYSES OF SOIL

BV Labs ID		PXP301			PXP302		PXP303		PXP304		
Sampling Date		2021/06/15 15:10			2021/06/15 13:05		2021/06/15 16:30		2021/06/15 12:40		
COC Number		N/A			N/A		N/A		N/A		
	UNITS	B-47 Lab-Dup	RDL	QC Batch	B-56	RDL	B-63	RDL	B-67	RDL	QC Batch
Inorganics											
Ammonia-N	mg/kg				<0.29	0.29	<0.31	0.31	<0.37	0.37	7446574
Chloride (Cl-)	mg/kg	8.3	5.0	7448087	11	5.0	10	5.0	17	5.0	7448087
Conductivity	uS/cm	34	1.0	7448618	31	1.0	34	1.0	48	1.0	7448618
Moisture	%				11	1.0	16	1.0	28	1.0	7441029
Nitrate + Nitrite (N)	mg/kg	0.27	0.25	7448092	<0.25	0.25	0.52	0.25	0.72	0.25	7448092
Nitrite (N)	mg/kg	<0.050	0.050	7448093	<0.050	0.050	<0.050	0.050	<0.050	0.050	7448093
Orthophosphate (P)	mg/kg	0.68 (1)	0.050	7448091	0.22	0.050	0.13	0.050	<0.050	0.050	7448091
Soluble (5:1) pH	pH	5.39	N/A	7448613	5.18	N/A	5.26	N/A	4.94	N/A	7448613
Sulphate (SO4)	mg/kg	<10	10	7448090	<10	10	<10	10	<10	10	7448090

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
Lab-Dup = Laboratory Initiated Duplicate
N/A = Not Applicable
(1) Poor duplicate agreement due to sample inhomogeniety, results confirmed by repeat anaylsis.

BV Labs ID		PXP305		PXP306		PXP307		PXP308		
Sampling Date		2021/06/16 15:20		2021/06/16 09:50		2021/06/16 11:10		2021/06/16 09:10		
COC Number		N/A		N/A		N/A		N/A		
	UNITS	B-69	RDL	C-1	RDL	C-03	RDL	C-07	RDL	QC Batch
Inorganics										
Ammonia-N	mg/kg	<0.64	0.64	0.86	0.56	0.61	0.37	<0.34	0.34	7446574
Chloride (Cl-)	mg/kg	29	5.0	46	5.0	8.5	5.0	8.1	5.0	7448087
Conductivity	uS/cm	81	1.0	66	1.0	33	1.0	22	1.0	7448618
Moisture	%	57	1.0	50	1.0	27	1.0	23	1.0	7441029
Nitrate + Nitrite (N)	mg/kg	1.2	0.25	0.65	0.25	0.60	0.25	<0.25	0.25	7448092
Nitrite (N)	mg/kg	<0.050	0.050	0.053	0.050	<0.050	0.050	<0.050	0.050	7448093
Orthophosphate (P)	mg/kg	0.23	0.050	<0.050	0.050	0.074	0.050	0.24	0.050	7448091
Soluble (5:1) pH	pH	4.89	N/A	4.87	N/A	4.62	N/A	5.38	N/A	7448613
Sulphate (SO4)	mg/kg	10	10	<10	10	<10	10	<10	10	7448090

RDL = Reportable Detection Limit
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N/A = Not Applicable

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Report Date: 2021/07/14

GHD Limited
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Site Location: GOLDBORO
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RESULTS OF ANALYSES OF SOIL

BV Labs ID		PXP308			PXP309		PXP310		
Sampling Date		2021/06/16 09:10			2021/06/16 10:25		2021/06/16 08:40		
COC Number		N/A			N/A		N/A		
	UNITS	C-07 Lab-Dup	RDL	QC Batch	C-13	RDL	C-18	RDL	QC Batch
Inorganics									
Ammonia-N	mg/kg	<0.34	0.34	7446574	<0.33	0.33	0.99	0.54	7446574
Chloride (Cl-)	mg/kg				12	5.0	23	5.0	7448087
Conductivity	uS/cm				58	1.0	66	1.0	7448618
Moisture	%				22	1.0	48	1.0	7441029
Nitrate + Nitrite (N)	mg/kg				0.30	0.25	0.51	0.25	7448092
Nitrite (N)	mg/kg				<0.050	0.050	<0.050	0.050	7448093
Organic Carbon (TOC)	g/kg				3.5	0.50	25	0.50	7448009
Orthophosphate (P)	mg/kg				0.32	0.050	0.12	0.050	7448091
Soluble (5:1) pH	pH				5.19	N/A	4.78	N/A	7448613
Sulphate (SO4)	mg/kg				63	10	16	10	7448090
< -1 Phi (2 mm)	%				100	0.10	81	0.10	7444081
< 0 Phi (1 mm)	%				100	0.10	67	0.10	7444081
< +1 Phi (0.5 mm)	%				100	0.10	50	0.10	7444081
< +2 Phi (0.25 mm)	%				95	0.10	33	0.10	7444081
< +3 Phi (0.12 mm)	%				89	0.10	21	0.10	7444081
< +4 Phi (0.062 mm)	%				79	0.10	15	0.10	7444081
< +5 Phi (0.031 mm)	%				67	0.10	11	0.10	7444081
< +6 Phi (0.016 mm)	%				41	0.10	8.3	0.10	7444081
< +7 Phi (0.0078 mm)	%				11	0.10	5.7	0.10	7444081
< +8 Phi (0.0039 mm)	%				6.4	0.10	4.9	0.10	7444081
< +9 Phi (0.0020 mm)	%				2.6	0.10	3.8	0.10	7444081
Gravel	%				<0.10	0.10	19	0.10	7444081
Sand	%				21	0.10	66	0.10	7444081
Silt	%				73	0.10	9.9	0.10	7444081
Clay	%				6.4	0.10	4.9	0.10	7444081
Subcontracted Analysis									
Subcontract Parameter	N/A				ATTACHED	N/A	ATTACHED	N/A	7454407

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
Lab-Dup = Laboratory Initiated Duplicate
N/A = Not Applicable

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BV Labs Job #: C1H4101
Report Date: 2021/07/14

GHD Limited
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RESULTS OF ANALYSES OF SOIL

BV Labs ID		PXP311		PXP312			PXP313		
Sampling Date		2021/06/16 12:00		2021/06/16 10:30			2021/06/16 11:00		
COC Number									
	UNITS	C-22	RDL	D-02	RDL	QC Batch	D-07	RDL	QC Batch
Inorganics									
Ammonia-N	mg/kg	<0.38	0.38	<0.34	0.34	7446574	<0.33	0.33	7446574
Chloride (Cl-)	mg/kg	8.9	5.0	6.7	5.0	7448087	<5.0	5.0	7448087
Conductivity	uS/cm	35	1.0	21	1.0	7448618	16	1.0	7448618
Total Inorganic Carbon (C)	g/kg						<0.5	0.5	7430582
Moisture	%	30	1.0	24	1.0	7441029	20	1.0	7441029
Nitrate + Nitrite (N)	mg/kg	0.29	0.25	0.32	0.25	7448092	<0.25	0.25	7448092
Nitrite (N)	mg/kg	<0.050	0.050	<0.050	0.050	7448093	<0.050	0.050	7448093
Organic Carbon (TOC)	g/kg						1.7	0.50	7448009
Orthophosphate (P)	mg/kg	5.8	0.25	4.2	0.25	7448091	9.0	0.25	7448091
Soluble (5:1) pH	pH	4.51	N/A	5.34	N/A	7448613	4.93	N/A	7448613
Sulphate (SO4)	mg/kg	<10	10	<10	10	7448090	<10	10	7448090
Total Carbon-combustion IR	g/kg						1.6	0.50	7448515
< -1 Phi (2 mm)	%						100	0.10	7444081
< 0 Phi (1 mm)	%						100	0.10	7444081
< +1 Phi (0.5 mm)	%						98	0.10	7444081
< +2 Phi (0.25 mm)	%						74	0.10	7444081
< +3 Phi (0.12 mm)	%						36	0.10	7444081
< +4 Phi (0.062 mm)	%						13	0.10	7444081
< +5 Phi (0.031 mm)	%						6.4	0.10	7444081
< +6 Phi (0.016 mm)	%						4.2	0.10	7444081
< +7 Phi (0.0078 mm)	%						1.5	0.10	7444081
< +8 Phi (0.0039 mm)	%						0.98	0.10	7444081
< +9 Phi (0.0020 mm)	%						0.72	0.10	7444081
Gravel	%						<0.10	0.10	7444081
Sand	%						87	0.10	7444081
Silt	%						12	0.10	7444081
Clay	%						0.98	0.10	7444081
Subcontracted Analysis									
Subcontract Parameter	N/A						ATTACHED	N/A	7454407

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
N/A = Not Applicable

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BV Labs Job #: C1H4101
Report Date: 2021/07/14

GHD Limited
Client Project #: 11222385
Site Location: GOLDBORO
Your P.O. #: TO FOLLOW
Sampler Initials: JV

RESULTS OF ANALYSES OF SOIL

BV Labs ID		PXP314		PXP315			PXP316		PXP317		
Sampling Date		2021/06/16 14:35		2021/06/16 13:45			2021/06/16 13:20		2021/06/16 11:25		
COC Number											
	UNITS	D-08	RDL	D-09	RDL	QC Batch	D-12	RDL	D-19	RDL	QC Batch
Inorganics											
Ammonia-N	mg/kg	<0.39	0.39	<0.41	0.41	7446574	5.0	3.0	<0.35	0.35	7446574
Chloride (Cl-)	mg/kg	20	5.0	15	5.0	7448087	85	5.0	8.8	5.0	7448080
Conductivity	uS/cm	55	1.0	47	1.0	7448618	210	1.0	28	1.0	7448671
Moisture	%	31	1.0	35	1.0	7441029	90	1.0	23	1.0	7441029
Nitrate + Nitrite (N)	mg/kg	0.36	0.25	0.98	0.25	7448092	0.52	0.25	0.26	0.25	7448084
Nitrite (N)	mg/kg	<0.050	0.050	<0.050	0.050	7448093	<0.050	0.050	<0.050	0.050	7448085
Orthophosphate (P)	mg/kg	0.25	0.050	<0.050	0.050	7448091	4.3	0.25	0.42	0.050	7448083
Soluble (5:1) pH	pH	4.41	N/A	5.02	N/A	7448613	3.95 (1)	N/A	5.21	N/A	7448651
Sulphate (SO4)	mg/kg	<10	10	<10	10	7448090	46	10	<10	10	7448082

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
N/A = Not Applicable
(1) pH value is beyond linear range, extended linearity has been confirmed.

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RESULTS OF ANALYSES OF SOIL

BV Labs ID		PXP318			PXP319			PXP320		
Sampling Date		2021/06/16 16:35			2021/06/16 16:20			2021/06/16 11:45		
COC Number										
	UNITS	D-21	RDL	QC Batch	D-22	RDL	QC Batch	D-34	RDL	QC Batch
Inorganics										
Ammonia-N	mg/kg	0.43	0.33	7446574	4.8	1.7	7446574	<0.37	0.37	7446574
Chloride (Cl-)	mg/kg	9.1	5.0	7448080	50	5.0	7448080	13	5.0	7448080
Conductivity	uS/cm	49	1.0	7448671	230	1.0	7448671	53	1.0	7448671
Total Inorganic Carbon (C)	g/kg				<1	1	7430582			
Moisture	%	22	1.0	7441029	83	1.0	7441029	29	1.0	7441351
Nitrate + Nitrite (N)	mg/kg	<0.25	0.25	7448084	1.0	0.25	7448084	0.49	0.25	7448084
Nitrite (N)	mg/kg	<0.050	0.050	7448085	<0.050	0.050	7448085	<0.050	0.050	7448085
Organic Carbon (TOC)	g/kg				460	1.3	7448009			
Orthophosphate (P)	mg/kg	0.28	0.050	7448083	0.20	0.050	7448083	0.059	0.050	7448083
Soluble (5:1) pH	pH	5.13	N/A	7448651	4.30	N/A	7448651	4.72	N/A	7448651
Sulphate (SO4)	mg/kg	37	10	7448082	170	10	7448082	<10	10	7448082
Total Carbon-combustion IR	g/kg				460	1.3	7448515			
< -1 Phi (2 mm)	%				99	0.10	7444081			
< 0 Phi (1 mm)	%				96	0.10	7444081			
< +1 Phi (0.5 mm)	%				91	0.10	7444081			
< +2 Phi (0.25 mm)	%				86	0.10	7444081			
< +3 Phi (0.12 mm)	%				83	0.10	7444081			
< +4 Phi (0.062 mm)	%				81	0.10	7444081			
< +5 Phi (0.031 mm)	%				79	0.10	7444081			
< +6 Phi (0.016 mm)	%				76	0.10	7444081			
< +7 Phi (0.0078 mm)	%				70	0.10	7444081			
< +8 Phi (0.0039 mm)	%				65	0.10	7444081			
< +9 Phi (0.0020 mm)	%				60	0.10	7444081			
Gravel	%				0.73	0.10	7444081			
Sand	%				18	0.10	7444081			
Silt	%				16	0.10	7444081			
Clay	%				65	0.10	7444081			
Subcontracted Analysis										
Subcontract Parameter	N/A				ATTACHED	N/A	7454407			

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
N/A = Not Applicable

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Report Date: 2021/07/14

GHD Limited
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RESULTS OF ANALYSES OF SOIL

BV Labs ID		PXP320			PXP334			PXP334		
Sampling Date		2021/06/16 11:45			2021/06/16 16:11			2021/06/16 16:11		
COC Number					N/A			N/A		
	UNITS	D-34 Lab-Dup	RDL	QC Batch	E-05	RDL	QC Batch	E-05 Lab-Dup	RDL	QC Batch
Inorganics										
Ammonia-N	mg/kg				<0.40	0.40	7446574			
Chloride (Cl-)	mg/kg				7.0	5.0	7448080			
Conductivity	uS/cm				29	1.0	7448671			
Moisture	%	27	1.0	7441351	33	1.0	7440816	32	1.0	7440816
Nitrate + Nitrite (N)	mg/kg				<0.25	0.25	7448084			
Nitrite (N)	mg/kg				<0.050	0.050	7448085			
Orthophosphate (P)	mg/kg				0.081	0.050	7448083			
Soluble (5:1) pH	pH				4.85	N/A	7448651			
Sulphate (SO4)	mg/kg				<10	10	7448082			

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
Lab-Dup = Laboratory Initiated Duplicate
N/A = Not Applicable

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Report Date: 2021/07/14

GHD Limited
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Site Location: GOLDBORO
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Sampler Initials: JV

RESULTS OF ANALYSES OF SOIL

BV Labs ID		PXP335		PXP336		PXP337			PXP338		
Sampling Date		2021/06/16 15:15		2021/06/17 08:35		2021/06/17 09:15			2021/06/16 14:15		
COC Number		N/A		N/A		N/A			N/A		
	UNITS	**E-08**	**RDL**	**E-11**	**RDL**	**E-22**	**RDL**	**QC Batch**	**E-31**	**RDL**	**QC Batch**
Inorganics											
Ammonia-N	mg/kg	<0.41	0.41	<0.33	0.33	0.68	0.39	7446594	<0.33	0.33	7446594
Chloride (Cl-)	mg/kg	13	5.0	<5.0	5.0	11	5.0	7448080	6.3	5.0	7448080
Conductivity	uS/cm	33	1.0	14	1.0	46	1.0	7448671	23	1.0	7448671
Moisture	%	35	1.0	22	1.0	32	1.0	7440816	21	1.0	7440816
Nitrate + Nitrite (N)	mg/kg	0.38	0.25	<0.25	0.25	0.26	0.25	7448084	<0.25	0.25	7448084
Nitrite (N)	mg/kg	<0.050	0.050	<0.050	0.050	<0.050	0.050	7448085	<0.050	0.050	7448085
Organic Carbon (TOC)	g/kg								3.8	0.50	7445432
Orthophosphate (P)	mg/kg	0.064	0.050	1.8	0.25	11	1.0	7448083	0.69	0.050	7448083
Soluble (5:1) pH	pH	4.72	N/A	5.05	N/A	4.22	N/A	7448651	5.50	N/A	7448651
Sulphate (SO4)	mg/kg	<10	10	<10	10	<10	10	7448082	18	10	7448082
< -1 Phi (2 mm)	%								100	0.10	7444081
< 0 Phi (1 mm)	%								100	0.10	7444081
< +1 Phi (0.5 mm)	%								99	0.10	7444081
< +2 Phi (0.25 mm)	%								90	0.10	7444081
< +3 Phi (0.12 mm)	%								67	0.10	7444081
< +4 Phi (0.062 mm)	%								42	0.10	7444081
< +5 Phi (0.031 mm)	%								24	0.10	7444081
< +6 Phi (0.016 mm)	%								10	0.10	7444081
< +7 Phi (0.0078 mm)	%								2.8	0.10	7444081
< +8 Phi (0.0039 mm)	%								1.8	0.10	7444081
< +9 Phi (0.0020 mm)	%								0.84	0.10	7444081
Gravel	%								<0.10	0.10	7444081
Sand	%								58	0.10	7444081
Silt	%								41	0.10	7444081
Clay	%								1.8	0.10	7444081
Subcontracted Analysis											
Subcontract Parameter	N/A								ATTACHED	N/A	7454407

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
N/A = Not Applicable

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GHD Limited
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RESULTS OF ANALYSES OF SOIL

BV Labs ID		PXP339			PXP340			PXP340		
Sampling Date		2021/06/17 08:55			2021/06/17 09:15			2021/06/17 09:15		
COC Number		N/A			N/A			N/A		
	UNITS	E-33	RDL	QC Batch	E-35	RDL	QC Batch	E-35 Lab-Dup	RDL	QC Batch
Inorganics										
Ammonia-N	mg/kg	1.8	0.41	7446594	<0.41	0.41	7446594			
Chloride (Cl-)	mg/kg	17	5.0	7448080	10	5.0	7448080	11	5.0	7448080
Conductivity	uS/cm	43	1.0	7448671	47	1.0	7448671	50	1.0	7448671
Total Inorganic Carbon (C)	g/kg				<0.5	0.5	7430582			
Moisture	%	35	1.0	7440816	34	1.0	7440816			
Nitrate + Nitrite (N)	mg/kg	0.77	0.25	7448084	0.41	0.25	7448084	0.42	0.25	7448084
Nitrite (N)	mg/kg	<0.050	0.050	7448085	<0.050	0.050	7448085	<0.050	0.050	7448085
Organic Carbon (TOC)	g/kg				16	0.50	7445432			
Orthophosphate (P)	mg/kg	0.051	0.050	7448083	9.5	0.25	7448083	9.2	0.25	7448083
Soluble (5:1) pH	pH	4.70	N/A	7448651	4.42	N/A	7448651	4.41	N/A	7448651
Sulphate (SO4)	mg/kg	<10	10	7448082	24	10	7448082	24	10	7448082
Total Carbon-combustion IR	g/kg				13	0.50	7448515			
< -1 Phi (2 mm)	%				98 (1)	0.10	7444081			
< 0 Phi (1 mm)	%				96 (1)	0.10	7444081			
< +1 Phi (0.5 mm)	%				92 (1)	0.10	7444081			
< +2 Phi (0.25 mm)	%				79	0.10	7444081			
< +3 Phi (0.12 mm)	%				51	0.10	7444081			
< +4 Phi (0.062 mm)	%				34	0.10	7444081			
< +5 Phi (0.031 mm)	%				27	0.10	7444081			
< +6 Phi (0.016 mm)	%				21	0.10	7444081			
< +7 Phi (0.0078 mm)	%				14	0.10	7444081			
< +8 Phi (0.0039 mm)	%				11	0.10	7444081			
< +9 Phi (0.0020 mm)	%				7.2	0.10	7444081			
Gravel	%				1.7	0.10	7444081			
Sand	%				65	0.10	7444081			
Silt	%				23	0.10	7444081			
Clay	%				11	0.10	7444081			
Subcontracted Analysis										
Subcontract Parameter	N/A				ATTACHED	N/A	7454407			

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
Lab-Dup = Laboratory Initiated Duplicate
N/A = Not Applicable
(1) PSA sample observation comment: Fraction contained organic matter

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RESULTS OF ANALYSES OF SOIL

BV Labs ID		PXP341			PXP341			PXP342		
Sampling Date		2021/06/17 10:05			2021/06/17 10:05			2021/06/16 13:30		
COC Number		N/A			N/A			N/A		
	UNITS	E-40	RDL	QC Batch	E-40 Lab-Dup	RDL	QC Batch	E-45	RDL	QC Batch
Inorganics										
Ammonia-N	mg/kg	<0.45	0.45	7446594	<0.45	0.45	7446594	11	2.3	7446594
Chloride (Cl-)	mg/kg	17	5.0	7448080				70	5.0	7448080
Conductivity	uS/cm	80	1.0	7448671				290	1.0	7448671
Moisture	%	40	1.0	7440816				87	1.0	7440816
Nitrate + Nitrite (N)	mg/kg	0.27	0.25	7448084				0.38	0.25	7448084
Nitrite (N)	mg/kg	<0.050	0.050	7448085				<0.050	0.050	7448085
Organic Carbon (TOC)	g/kg							520	1.3	7448009
Orthophosphate (P)	mg/kg	3.2	0.25	7448083				1.3	0.050	7448083
Soluble (5:1) pH	pH	4.31	N/A	7448651				4.36	N/A	7448651
Sulphate (SO4)	mg/kg	<10	10	7448082				220	10	7448082
< -1 Phi (2 mm)	%							99	0.10	7444081
< 0 Phi (1 mm)	%							90	0.10	7444081
< +1 Phi (0.5 mm)	%							82	0.10	7444081
< +2 Phi (0.25 mm)	%							76	0.10	7444081
< +3 Phi (0.12 mm)	%							73	0.10	7444081
< +4 Phi (0.062 mm)	%							71	0.10	7444081
< +5 Phi (0.031 mm)	%							67	0.10	7444081
< +6 Phi (0.016 mm)	%							66	0.10	7444081
< +7 Phi (0.0078 mm)	%							59	0.10	7444081
< +8 Phi (0.0039 mm)	%							53	0.10	7444081
< +9 Phi (0.0020 mm)	%							54	0.10	7444081
Gravel	%							0.77	0.10	7444081
Sand	%							28	0.10	7444081
Silt	%							18	0.10	7444081
Clay	%							53	0.10	7444081
Subcontracted Analysis										
Subcontract Parameter	N/A							ATTACHED	N/A	7454407

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
Lab-Dup = Laboratory Initiated Duplicate
N/A = Not Applicable

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BV Labs Job #: C1H4101
Report Date: 2021/07/14

GHD Limited
Client Project #: 11222385
Site Location: GOLDBORO
Your P.O. #: TO FOLLOW
Sampler Initials: JV

RESULTS OF ANALYSES OF SOIL

BV Labs ID		PXP343		PXP344		PXP345		PXP346		PXP347		
Sampling Date		2021/06/17 09:30		2021/06/17 10:20		2021/06/17 11:00		2021/06/17 09:45		2021/06/17 10:20		
COC Number		N/A		N/A		N/A		N/A		N/A		
	UNITS	E-46	RDL	E-47	RDL	E-55	RDL	E-56	RDL	E-62	RDL	QC Batch
Inorganics												
Ammonia-N	mg/kg	1.7	0.39	3.4	0.58	1.8	0.54	<0.37	0.37	<3.3	3.3	7446594
Chloride (Cl-)	mg/kg	17	5.0	34	5.0	9.8	5.0	11	5.0	97	5.0	7448080
Conductivity	uS/cm	80	1.0	130	1.0	45	1.0	39	1.0	140	1.0	7448671
Moisture	%	31	1.0	53	1.0	49	1.0	29	1.0	91	1.0	7440816
Nitrate + Nitrite (N)	mg/kg	1.6	0.25	3.4	0.25	0.33	0.25	<0.25	0.25	0.75	0.25	7448084
Nitrite (N)	mg/kg	<0.050	0.050	<0.050	0.050	<0.050	0.050	<0.050	0.050	<0.050	0.050	7448085
Orthophosphate (P)	mg/kg	0.92	0.050	1.6	0.050	0.67	0.050	0.18	0.050	37	1.0	7448083
Soluble (5:1) pH	pH	4.95	N/A	4.27	N/A	4.95	N/A	5.15	N/A	3.64 (1)	N/A	7448651
Sulphate (SO4)	mg/kg	<10	10	17	10	<10	10	<10	10	50	10	7448082

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
N/A = Not Applicable
(1) pH value is beyond linear range, extended linearity has been confirmed.

BV Labs ID		PXP348			PXP348			PXP349		
Sampling Date		2021/06/16 08:45			2021/06/16 08:45			2021/06/16 08:55		
COC Number		N/A			N/A			N/A		
	UNITS	E-68	RDL	QC Batch	E-68 Lab-Dup	RDL	QC Batch	E-74	RDL	QC Batch
Inorganics										
Ammonia-N	mg/kg	<0.42	0.42	7446594				<0.36	0.36	7446594
Chloride (Cl-)	mg/kg	12	5.0	7448096	12	5.0	7448096	12	5.0	7448080
Conductivity	uS/cm	39	1.0	7448637	40	1.0	7448637	36	1.0	7448671
Moisture	%	37	1.0	7440816				28	1.0	7440816
Nitrate + Nitrite (N)	mg/kg	<0.25	0.25	7448099	<0.25	0.25	7448099	0.39	0.25	7448084
Nitrite (N)	mg/kg	<0.050	0.050	7448100	<0.050	0.050	7448100	<0.050	0.050	7448085
Orthophosphate (P)	mg/kg	0.83	0.050	7448098	0.90	0.050	7448098	0.073	0.050	7448083
Soluble (5:1) pH	pH	4.84	N/A	7448631	4.82	N/A	7448631	4.76	N/A	7448651
Sulphate (SO4)	mg/kg	<10	10	7448097	<10	10	7448097	<10	10	7448082

RDL = Reportable Detection Limit
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Lab-Dup = Laboratory Initiated Duplicate
N/A = Not Applicable

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Report Date: 2021/07/14

GHD Limited
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RESULTS OF ANALYSES OF SOIL

BV Labs ID		PXP350			PXP351		PXP352		PXP353		
Sampling Date		2021/06/14			2021/06/15		2021/06/16		2021/06/16		
COC Number		N/A			N/A		N/A		N/A		
	UNITS	DUP-A	RDL	QC Batch	DUP-B	RDL	DUP-C	RDL	DUP-D	RDL	QC Batch
Inorganics											
Ammonia-N	mg/kg	<0.42	0.42	7446594	<0.33	0.33	0.43	0.43	<0.32	0.32	7446594
Chloride (Cl-)	mg/kg	6.1	5.0	7440858	10	5.0	13	5.0	<5.0	5.0	7448096
Conductivity	uS/cm	19	1.0	7435915	38	1.0	45	1.0	19	1.0	7448637
Moisture	%	36	1.0	7432666	23	1.0	38	1.0	20	1.0	7440816
Nitrate + Nitrite (N)	mg/kg	1.5	0.25	7440867	0.42	0.25	0.25	0.25	<0.25	0.25	7448099
Nitrite (N)	mg/kg	<0.050	0.050	7440868	<0.050	0.050	<0.050	0.050	<0.050	0.050	7448100
Orthophosphate (P)	mg/kg	<0.050	0.050	7440865	14	1.0	0.13	0.050	13	1.0	7448098
Soluble (5:1) pH	pH	5.20	N/A	7435909	4.71	N/A	4.63	N/A	4.68	N/A	7448631
Sulphate (SO4)	mg/kg	19 (1)	11	7440860	12	10	<10	10	<10	10	7448097

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
N/A = Not Applicable
(1) Elevated reporting limit due to blank performance.

BV Labs ID		PXP355			PXP356			PXP356		
Sampling Date		2021/06/16			2021/06/17			2021/06/17		
COC Number		N/A			N/A			N/A		
	UNITS	DUP-E	RDL	QC Batch	DUP-F	RDL	QC Batch	DUP-F Lab-Dup	RDL	QC Batch
Inorganics										
Ammonia-N	mg/kg	<0.35	0.35	7446594	<0.43	0.43	7446601			
Chloride (Cl-)	mg/kg	9.7	5.0	7448096	8.6	5.0	7448096			
Conductivity	uS/cm	28	1.0	7448637	55	1.0	7448637			
Moisture	%	26	1.0	7440816	37	1.0	7441029	36	1.0	7441029
Nitrate + Nitrite (N)	mg/kg	<0.25	0.25	7448099	0.53	0.25	7448099			
Nitrite (N)	mg/kg	<0.050	0.050	7448100	<0.050	0.050	7448100			
Orthophosphate (P)	mg/kg	0.10	0.050	7448098	11	0.25	7448098			
Soluble (5:1) pH	pH	4.75	N/A	7448631	4.28	N/A	7448631			
Sulphate (SO4)	mg/kg	<10	10	7448097	<10	10	7448097			

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
Lab-Dup = Laboratory Initiated Duplicate
N/A = Not Applicable

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BV Labs Job #: C1H4101
Report Date: 2021/07/14

GHD Limited
Client Project #: 11222385
Site Location: GOLDBORO
Your P.O. #: TO FOLLOW
Sampler Initials: JV

RESULTS OF ANALYSES OF SOIL

BV Labs ID		PXP357		
Sampling Date		2021/06/15		
COC Number		N/A		
	UNITS	DUP-T	RDL	QC Batch
Inorganics				
Total Inorganic Carbon (C)	g/kg	<0.5	0.5	7430582
Organic Carbon (TOC)	g/kg	3.7	0.50	7448009
Total Carbon-combustion IR	g/kg	3.6	0.50	7448515
< -1 Phi (2 mm)	%	100	0.10	7444081
< 0 Phi (1 mm)	%	100	0.10	7444081
< +1 Phi (0.5 mm)	%	99	0.10	7444081
< +2 Phi (0.25 mm)	%	91	0.10	7444081
< +3 Phi (0.12 mm)	%	64	0.10	7444081
< +4 Phi (0.062 mm)	%	36	0.10	7444081
< +5 Phi (0.031 mm)	%	15	0.10	7444081
< +6 Phi (0.016 mm)	%	5.7	0.10	7444081
< +7 Phi (0.0078 mm)	%	1.6	0.10	7444081
< +8 Phi (0.0039 mm)	%	1.2	0.10	7444081
< +9 Phi (0.0020 mm)	%	0.80	0.10	7444081
Gravel	%	<0.10	0.10	7444081
Sand	%	64	0.10	7444081
Silt	%	35	0.10	7444081
Clay	%	1.2	0.10	7444081
Subcontracted Analysis				
Subcontract Parameter	N/A	ATTACHED	N/A	7454387

RDL = Reportable Detection Limit
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N/A = Not Applicable

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CONVENTIONALS (SOIL)

BV Labs ID		PXP280	PXP280	PXP293	PXP294	PXP313	PXP319	PXP340		
Sampling Date		2021/06/15 09:10	2021/06/15 09:10	2021/06/15 11:05	2021/06/15 12:00	2021/06/16 11:00	2021/06/16 16:20	2021/06/17 09:15		
COC Number		N/A	N/A	N/A	N/A			N/A		
	UNITS	A-24	A-24 Lab-Dup	B-37	B-38	D-07	D-22	E-35	RDL	QC Batch
Inorganics										
Total Sulphur (S)	% g/g	0.24	0.24	0.013	0.16	0.021	0.66	0.38	0.010	7445881

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
Lab-Dup = Laboratory Initiated Duplicate

BV Labs ID		PXP357		
Sampling Date		2021/06/15		
COC Number		N/A		
	UNITS	DUP-T	RDL	QC Batch
Inorganics				
Total Sulphur (S)	% g/g	0.020	0.010	7445881

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

BV Labs Job #: C1H4101
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ELEMENTS BY ATOMIC SPECTROSCOPY (SOIL)

BV Labs ID		PXP276	PXP277	PXP278		PXP279		PXP280		
Sampling Date		2021/06/14 15:40	2021/06/14 14:45	2021/06/14 17:35		2021/06/14 14:05		2021/06/15 09:10		
COC Number		N/A	N/A	N/A		N/A		N/A		
	UNITS	A-05	A-08	A-13	RDL	A-14	QC Batch	A-24	RDL	QC Batch
Metals										
Acid Extractable Aluminum (Al)	mg/kg	3700	7800	7700	10	13000	7435136	13000	10	7437988
Acid Extractable Antimony (Sb)	mg/kg	<2.0	<2.0	<2.0	2.0	<2.0	7435136	<2.0	2.0	7437988
Acid Extractable Arsenic (As)	mg/kg	6.1	86	5.4	2.0	2000	7435136	1900	20	7437988
Acid Extractable Barium (Ba)	mg/kg	11	38	27	5.0	63	7435136	61	5.0	7437988
Acid Extractable Beryllium (Be)	mg/kg	<2.0	<2.0	<2.0	2.0	<2.0	7435136	<2.0	2.0	7437988
Acid Extractable Bismuth (Bi)	mg/kg	<2.0	<2.0	<2.0	2.0	<2.0	7435136	<2.0	2.0	7437988
Acid Extractable Boron (B)	mg/kg	<50	<50	<50	50	<50	7435136	<50	50	7437988
Acid Extractable Cadmium (Cd)	mg/kg	<0.30	<0.30	<0.30	0.30	0.35	7435136	0.38	0.30	7437988
Acid Extractable Chromium (Cr)	mg/kg	5.8	15	12	2.0	22	7435136	17	2.0	7437988
Acid Extractable Cobalt (Co)	mg/kg	<1.0	2.8	2.8	1.0	14	7435136	7.2	1.0	7437988
Acid Extractable Copper (Cu)	mg/kg	<2.0	4.5	2.0	2.0	26	7435136	17	2.0	7437988
Acid Extractable Iron (Fe)	mg/kg	3700	12000	7900	50	28000	7435136	20000	50	7437988
Acid Extractable Lead (Pb)	mg/kg	4.9	8.8	4.4	0.50	48	7435136	47	0.50	7437988
Acid Extractable Lithium (Li)	mg/kg	3.5	11	11	2.0	26	7435136	27	2.0	7437988
Acid Extractable Manganese (Mn)	mg/kg	51	140	110	2.0	890	7435136	1200	2.0	7437988
Acid Extractable Mercury (Hg)	mg/kg	<0.10	<0.10	<0.10	0.10	0.45	7435136	3.2	0.10	7437988
Acid Extractable Molybdenum (Mo)	mg/kg	<2.0	<2.0	<2.0	2.0	<2.0	7435136	<2.0	2.0	7437988
Acid Extractable Nickel (Ni)	mg/kg	2.9	8.7	7.8	2.0	23	7435136	15	2.0	7437988
Acid Extractable Rubidium (Rb)	mg/kg	4.6	14	12	2.0	23	7435136	17	2.0	7437988
Acid Extractable Selenium (Se)	mg/kg	<0.50	<0.50	<0.50	0.50	0.53	7435136	0.92	0.50	7437988
Acid Extractable Silver (Ag)	mg/kg	<0.50	<0.50	<0.50	0.50	<0.50	7435136	<0.50	0.50	7437988
Acid Extractable Strontium (Sr)	mg/kg	<5.0	<5.0	<5.0	5.0	18	7435136	46	5.0	7437988
Acid Extractable Thallium (Tl)	mg/kg	<0.10	0.12	<0.10	0.10	0.29	7435136	0.29	0.10	7437988
Acid Extractable Tin (Sn)	mg/kg	<1.0	<1.0	<1.0	1.0	1.3	7435136	1.3	1.0	7437988
Acid Extractable Uranium (U)	mg/kg	0.51	0.48	0.47	0.10	1.3	7435136	1.8	0.10	7437988
Acid Extractable Vanadium (V)	mg/kg	7.0	21	13	2.0	28	7435136	19	2.0	7437988
Acid Extractable Zinc (Zn)	mg/kg	7.0	19	16	5.0	84	7435136	80	5.0	7437988

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

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GHD Limited
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Site Location: GOLDBORO
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Sampler Initials: JV

ELEMENTS BY ATOMIC SPECTROSCOPY (SOIL)

BV Labs ID		PXP281			PXP282		PXP283		PXP284		
Sampling Date		2021/06/14 15:40			2021/06/15 09:00		2021/06/15 09:30		2021/06/14 16:55		
COC Number		N/A			N/A		N/A		N/A		
	UNITS	A-26	RDL	QC Batch	A-28	RDL	A-36	QC Batch	A-41	RDL	QC Batch
Metals											
Acid Extractable Aluminum (Al)	mg/kg	11000	10	7435136	9700	10	11000	7437988	5900	10	7435136
Acid Extractable Antimony (Sb)	mg/kg	<2.0	2.0	7435136	<2.0	2.0	<2.0	7437988	<2.0	2.0	7435136
Acid Extractable Arsenic (As)	mg/kg	160	2.0	7435136	560	20	15	7437988	13	2.0	7435136
Acid Extractable Barium (Ba)	mg/kg	51	5.0	7435136	51	5.0	18	7437988	7.9	5.0	7435136
Acid Extractable Beryllium (Be)	mg/kg	<2.0	2.0	7435136	<2.0	2.0	<2.0	7437988	<2.0	2.0	7435136
Acid Extractable Bismuth (Bi)	mg/kg	<2.0	2.0	7435136	<2.0	2.0	<2.0	7437988	<2.0	2.0	7435136
Acid Extractable Boron (B)	mg/kg	<50	50	7435136	<50	50	<50	7437988	<50	50	7435136
Acid Extractable Cadmium (Cd)	mg/kg	<0.30	0.30	7435136	0.54	0.30	<0.30	7437988	<0.30	0.30	7435136
Acid Extractable Chromium (Cr)	mg/kg	19	2.0	7435136	9.9	2.0	14	7437988	7.3	2.0	7435136
Acid Extractable Cobalt (Co)	mg/kg	20	1.0	7435136	8.1	1.0	2.2	7437988	<1.0	1.0	7435136
Acid Extractable Copper (Cu)	mg/kg	5.6	2.0	7435136	12	2.0	3.3	7437988	<2.0	2.0	7435136
Acid Extractable Iron (Fe)	mg/kg	13000	50	7435136	10000	50	13000	7437988	8400	50	7435136
Acid Extractable Lead (Pb)	mg/kg	8.7	0.50	7435136	39	0.50	6.4	7437988	3.1	0.50	7435136
Acid Extractable Lithium (Li)	mg/kg	17	2.0	7435136	8.0	2.0	9.0	7437988	6.8	2.0	7435136
Acid Extractable Manganese (Mn)	mg/kg	1500	2.0	7435136	1100	2.0	100	7437988	43	2.0	7435136
Acid Extractable Mercury (Hg)	mg/kg	<0.10	0.10	7435136	0.82	0.10	<0.10	7437988	<0.10	0.10	7435136
Acid Extractable Molybdenum (Mo)	mg/kg	<2.0	2.0	7435136	<2.0	2.0	<2.0	7437988	<2.0	2.0	7435136
Acid Extractable Nickel (Ni)	mg/kg	15	2.0	7435136	9.0	2.0	6.6	7437988	3.1	2.0	7435136
Acid Extractable Rubidium (Rb)	mg/kg	17	2.0	7435136	7.6	2.0	7.3	7437988	3.5	2.0	7435136
Acid Extractable Selenium (Se)	mg/kg	0.58	0.50	7435136	1.8	0.50	0.65	7437988	<0.50	0.50	7435136
Acid Extractable Silver (Ag)	mg/kg	<0.50	0.50	7435136	<0.50	0.50	<0.50	7437988	<0.50	0.50	7435136
Acid Extractable Strontium (Sr)	mg/kg	<5.0	5.0	7435136	57	5.0	<5.0	7437988	<5.0	5.0	7435136
Acid Extractable Thallium (Tl)	mg/kg	0.16	0.10	7435136	0.21	0.10	<0.10	7437988	<0.10	0.10	7435136
Acid Extractable Tin (Sn)	mg/kg	<1.0	1.0	7435136	<1.0	1.0	<1.0	7437988	<1.0	1.0	7435136
Acid Extractable Uranium (U)	mg/kg	0.66	0.10	7435136	1.6	0.10	0.61	7437988	0.46	0.10	7435136
Acid Extractable Vanadium (V)	mg/kg	23	2.0	7435136	16	2.0	29	7437988	18	2.0	7435136
Acid Extractable Zinc (Zn)	mg/kg	41	5.0	7435136	67	5.0	17	7437988	6.7	5.0	7435136

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

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BV Labs Job #: C1H4101
Report Date: 2021/07/14

GHD Limited
Client Project #: 11222385
Site Location: GOLDBORO
Your P.O. #: TO FOLLOW
Sampler Initials: JV

ELEMENTS BY ATOMIC SPECTROSCOPY (SOIL)

BV Labs ID		PXP285		PXP287	PXP287		PXP288	PXP289		
Sampling Date		2021/06/14 17:30		2021/06/15 14:50	2021/06/15 14:50		2021/06/15 11:05	2021/06/15 12:40		
COC Number		N/A		N/A	N/A		N/A	N/A		
	UNITS	A-45	QC Batch	B-04	B-04 Lab-Dup	QC Batch	B-06	B-13	RDL	QC Batch
Metals										
Acid Extractable Aluminum (Al)	mg/kg	20000	7435136	4900	5100	7443412	4100	12000	10	7437988
Acid Extractable Antimony (Sb)	mg/kg	<2.0	7435136	<2.0	<2.0	7443412	<2.0	<2.0	2.0	7437988
Acid Extractable Arsenic (As)	mg/kg	14	7435136	6.5	6.6	7443412	29	17	2.0	7437988
Acid Extractable Barium (Ba)	mg/kg	26	7435136	12	12	7443412	14	36	5.0	7437988
Acid Extractable Beryllium (Be)	mg/kg	<2.0	7435136	<2.0	<2.0	7443412	<2.0	<2.0	2.0	7437988
Acid Extractable Bismuth (Bi)	mg/kg	<2.0	7435136	<2.0	<2.0	7443412	<2.0	<2.0	2.0	7437988
Acid Extractable Boron (B)	mg/kg	<50	7435136	<50	<50	7443412	<50	<50	50	7437988
Acid Extractable Cadmium (Cd)	mg/kg	<0.30	7435136	<0.30	<0.30	7443412	<0.30	<0.30	0.30	7437988
Acid Extractable Chromium (Cr)	mg/kg	22	7435136	8.4	9.0	7443412	4.2	20	2.0	7437988
Acid Extractable Cobalt (Co)	mg/kg	4.3	7435136	1.6	1.7	7443412	<1.0	2.7	1.0	7437988
Acid Extractable Copper (Cu)	mg/kg	8.3	7435136	<2.0	<2.0	7443412	3.0	<2.0	2.0	7437988
Acid Extractable Iron (Fe)	mg/kg	19000	7435136	4300	4500	7443412	1300	15000	50	7437988
Acid Extractable Lead (Pb)	mg/kg	8.8	7435136	4.7	4.9	7443412	13	6.9	0.50	7437988
Acid Extractable Lithium (Li)	mg/kg	19	7435136	5.2	5.5	7443412	<2.0	12	2.0	7437988
Acid Extractable Manganese (Mn)	mg/kg	150	7435136	69	74	7443412	13	150	2.0	7437988
Acid Extractable Mercury (Hg)	mg/kg	<0.10	7435136	<0.10	<0.10	7443412	0.22	<0.10	0.10	7437988
Acid Extractable Molybdenum (Mo)	mg/kg	<2.0	7435136	<2.0	<2.0	7443412	<2.0	<2.0	2.0	7437988
Acid Extractable Nickel (Ni)	mg/kg	13	7435136	4.9	5.2	7443412	2.3	8.6	2.0	7437988
Acid Extractable Rubidium (Rb)	mg/kg	9.8	7435136	4.2	4.3	7443412	3.3	11	2.0	7437988
Acid Extractable Selenium (Se)	mg/kg	0.84	7435136	<0.50	<0.50	7443412	1.1	0.65	0.50	7437988
Acid Extractable Silver (Ag)	mg/kg	<0.50	7435136	<0.50	<0.50	7443412	<0.50	<0.50	0.50	7437988
Acid Extractable Strontium (Sr)	mg/kg	<5.0	7435136	<5.0	<5.0	7443412	8.9	<5.0	5.0	7437988
Acid Extractable Thallium (Tl)	mg/kg	0.10	7435136	<0.10	<0.10	7443412	<0.10	0.10	0.10	7437988
Acid Extractable Tin (Sn)	mg/kg	<1.0	7435136	<1.0	<1.0	7443412	<1.0	1.0	1.0	7437988
Acid Extractable Uranium (U)	mg/kg	0.70	7435136	0.40	0.42	7443412	0.62	0.61	0.10	7437988
Acid Extractable Vanadium (V)	mg/kg	23	7435136	14	14	7443412	5.7	38	2.0	7437988
Acid Extractable Zinc (Zn)	mg/kg	30	7435136	8.5	9.2	7443412	<5.0	17	5.0	7437988

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GHD Limited
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Site Location: GOLDBORO
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ELEMENTS BY ATOMIC SPECTROSCOPY (SOIL)

BV Labs ID		PXP290		PXP291	PXP292		PXP293		PXP294		
Sampling Date		2021/06/15 14:30		2021/06/15 11:30	2021/06/15 13:45		2021/06/15 11:05		2021/06/15 12:00		
COC Number		N/A		N/A	N/A		N/A		N/A		
	UNITS	B-21	RDL	B-24	B-36	RDL	B-37	RDL	B-38	RDL	QC Batch
Metals											
Acid Extractable Aluminum (Al)	mg/kg	8400	10	8600	8800	10	15000	10	19000	10	7437988
Acid Extractable Antimony (Sb)	mg/kg	<2.0	2.0	<2.0	<2.0	2.0	4.3	2.0	3.9	2.0	7437988
Acid Extractable Arsenic (As)	mg/kg	2400	20	4.3	280	2.0	9500	200	4000	20	7437988
Acid Extractable Barium (Ba)	mg/kg	38	5.0	19	37	5.0	82	5.0	84	5.0	7437988
Acid Extractable Beryllium (Be)	mg/kg	<2.0	2.0	<2.0	<2.0	2.0	<2.0	2.0	<2.0	2.0	7437988
Acid Extractable Bismuth (Bi)	mg/kg	<2.0	2.0	<2.0	<2.0	2.0	<2.0	2.0	<2.0	2.0	7437988
Acid Extractable Boron (B)	mg/kg	<50	50	<50	<50	50	<50	50	<50	50	7437988
Acid Extractable Cadmium (Cd)	mg/kg	0.32	0.30	<0.30	<0.30	0.30	<0.30	0.30	1.0	0.30	7437988
Acid Extractable Chromium (Cr)	mg/kg	15	2.0	11	14	2.0	23	2.0	22	2.0	7437988
Acid Extractable Cobalt (Co)	mg/kg	8.2	1.0	1.8	4.6	1.0	<1.0	1.0	20	1.0	7437988
Acid Extractable Copper (Cu)	mg/kg	6.7	2.0	2.4	11	2.0	3.0	2.0	45	2.0	7437988
Acid Extractable Iron (Fe)	mg/kg	12000	50	6000	13000	50	32000	50	33000	50	7437988
Acid Extractable Lead (Pb)	mg/kg	13	0.50	8.6	11	0.50	24	0.50	76	0.50	7437988
Acid Extractable Lithium (Li)	mg/kg	10	2.0	13	17	2.0	27	2.0	32	2.0	7437988
Acid Extractable Manganese (Mn)	mg/kg	140	2.0	100	260	2.0	380	2.0	550	2.0	7437988
Acid Extractable Mercury (Hg)	mg/kg	1.8	0.10	<0.10	0.75	0.10	6.2	0.10	7.2	0.10	7437988
Acid Extractable Molybdenum (Mo)	mg/kg	<2.0	2.0	<2.0	<2.0	2.0	<2.0	2.0	<2.0	2.0	7437988
Acid Extractable Nickel (Ni)	mg/kg	18	2.0	6.4	11	2.0	7.9	2.0	59	2.0	7437988
Acid Extractable Rubidium (Rb)	mg/kg	12	2.0	9.1	16	2.0	53	2.0	33	2.0	7437988
Acid Extractable Selenium (Se)	mg/kg	<0.50	0.50	<0.50	<0.50	0.50	<0.50	0.50	0.95	0.50	7437988
Acid Extractable Silver (Ag)	mg/kg	<0.50	0.50	<0.50	<0.50	0.50	<0.50	0.50	<0.50	0.50	7437988
Acid Extractable Strontium (Sr)	mg/kg	8.4	5.0	<5.0	<5.0	5.0	<5.0	5.0	24	5.0	7437988
Acid Extractable Thallium (Tl)	mg/kg	0.13	0.10	<0.10	0.12	0.10	0.37	0.10	0.33	0.10	7437988
Acid Extractable Tin (Sn)	mg/kg	<1.0	1.0	<1.0	<1.0	1.0	2.1	1.0	1.2	1.0	7437988
Acid Extractable Uranium (U)	mg/kg	0.58	0.10	1.2	0.65	0.10	0.53	0.10	1.1	0.10	7437988
Acid Extractable Vanadium (V)	mg/kg	20	2.0	10	18	2.0	26	2.0	26	2.0	7437988
Acid Extractable Zinc (Zn)	mg/kg	160	5.0	11	33	5.0	42	5.0	280	5.0	7437988

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

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BV Labs Job #: C1H4101
Report Date: 2021/07/14

GHD Limited
Client Project #: 11222385
Site Location: GOLDBORO
Your P.O. #: TO FOLLOW
Sampler Initials: JV

ELEMENTS BY ATOMIC SPECTROSCOPY (SOIL)

BV Labs ID		PXP295			PXP296		PXP301	PXP302		
Sampling Date		2021/06/15 10:15			2021/06/15 15:45		2021/06/15 15:10	2021/06/15 13:05		
COC Number		N/A			N/A		N/A	N/A		
	UNITS	B-40	RDL	QC Batch	B-46	QC Batch	B-47	B-56	RDL	QC Batch
Metals										
Acid Extractable Aluminum (Al)	mg/kg	6500	10	7437988	1000	7443412	6700	6600	10	7445462
Acid Extractable Antimony (Sb)	mg/kg	<2.0	2.0	7437988	<2.0	7443412	<2.0	<2.0	2.0	7445462
Acid Extractable Arsenic (As)	mg/kg	2200	20	7437988	5.3	7443412	23	8.3	2.0	7445462
Acid Extractable Barium (Ba)	mg/kg	29	5.0	7437988	33	7443412	29	31	5.0	7445462
Acid Extractable Beryllium (Be)	mg/kg	<2.0	2.0	7437988	<2.0	7443412	<2.0	<2.0	2.0	7445462
Acid Extractable Bismuth (Bi)	mg/kg	<2.0	2.0	7437988	<2.0	7443412	<2.0	<2.0	2.0	7445462
Acid Extractable Boron (B)	mg/kg	<50	50	7437988	<50	7443412	<50	<50	50	7445462
Acid Extractable Cadmium (Cd)	mg/kg	<0.30	0.30	7437988	0.33	7443412	<0.30	<0.30	0.30	7445462
Acid Extractable Chromium (Cr)	mg/kg	12	2.0	7437988	<2.0	7443412	11	11	2.0	7445462
Acid Extractable Cobalt (Co)	mg/kg	3.4	1.0	7437988	<1.0	7443412	4.4	4.2	1.0	7445462
Acid Extractable Copper (Cu)	mg/kg	9.6	2.0	7437988	5.1	7443412	7.7	7.7	2.0	7445462
Acid Extractable Iron (Fe)	mg/kg	14000	50	7437988	1400	7443412	10000	11000	50	7445462
Acid Extractable Lead (Pb)	mg/kg	12	0.50	7437988	25	7443412	4.1	3.3	0.50	7445462
Acid Extractable Lithium (Li)	mg/kg	15	2.0	7437988	<2.0	7443412	14	15	2.0	7445462
Acid Extractable Manganese (Mn)	mg/kg	140	2.0	7437988	43	7443412	150	160	2.0	7445462
Acid Extractable Mercury (Hg)	mg/kg	0.42	0.10	7437988	0.32	7443412	<0.10	<0.10	0.10	7445462
Acid Extractable Molybdenum (Mo)	mg/kg	<2.0	2.0	7437988	<2.0	7443412	<2.0	<2.0	2.0	7445462
Acid Extractable Nickel (Ni)	mg/kg	9.2	2.0	7437988	2.7	7443412	9.7	10	2.0	7445462
Acid Extractable Rubidium (Rb)	mg/kg	16	2.0	7437988	<2.0	7443412	15	14	2.0	7445462
Acid Extractable Selenium (Se)	mg/kg	<0.50	0.50	7437988	1.4	7443412	<0.50	<0.50	0.50	7445462
Acid Extractable Silver (Ag)	mg/kg	<0.50	0.50	7437988	<0.50	7443412	<0.50	<0.50	0.50	7445462
Acid Extractable Strontium (Sr)	mg/kg	<5.0	5.0	7437988	27	7443412	<5.0	<5.0	5.0	7445462
Acid Extractable Thallium (Tl)	mg/kg	<0.10	0.10	7437988	<0.10	7443412	0.11	<0.10	0.10	7445462
Acid Extractable Tin (Sn)	mg/kg	<1.0	1.0	7437988	<1.0	7443412	<1.0	<1.0	1.0	7445462
Acid Extractable Uranium (U)	mg/kg	0.58	0.10	7437988	0.17	7443412	0.56	0.52	0.10	7445462
Acid Extractable Vanadium (V)	mg/kg	14	2.0	7437988	3.6	7443412	14	14	2.0	7445462
Acid Extractable Zinc (Zn)	mg/kg	39	5.0	7437988	15	7443412	20	21	5.0	7445462

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

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BV Labs Job #: C1H4101
Report Date: 2021/07/14

GHD Limited
Client Project #: 11222385
Site Location: GOLDBORO
Your P.O. #: TO FOLLOW
Sampler Initials: JV

ELEMENTS BY ATOMIC SPECTROSCOPY (SOIL)

BV Labs ID		PXP303	PXP304	PXP305	PXP306	PXP307	PXP308		
Sampling Date		2021/06/15 16:30	2021/06/15 12:40	2021/06/16 15:20	2021/06/16 09:50	2021/06/16 11:10	2021/06/16 09:10		
COC Number		N/A	N/A	N/A	N/A	N/A	N/A		
	UNITS	B-63	B-67	B-69	C-1	C-03	C-07	RDL	QC Batch
Metals									
Acid Extractable Aluminum (Al)	mg/kg	11000	9600	6700	29000	5000	8900	10	7445462
Acid Extractable Antimony (Sb)	mg/kg	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	2.0	7445462
Acid Extractable Arsenic (As)	mg/kg	200	23	13	100	200	410	2.0	7445462
Acid Extractable Barium (Ba)	mg/kg	44	7.0	23	13	8.1	33	5.0	7445462
Acid Extractable Beryllium (Be)	mg/kg	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	2.0	7445462
Acid Extractable Bismuth (Bi)	mg/kg	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	2.0	7445462
Acid Extractable Boron (B)	mg/kg	<50	<50	<50	<50	<50	<50	50	7445462
Acid Extractable Cadmium (Cd)	mg/kg	<0.30	<0.30	<0.30	<0.30	<0.30	<0.30	0.30	7445462
Acid Extractable Chromium (Cr)	mg/kg	18	8.6	8.9	24	8.0	13	2.0	7445462
Acid Extractable Cobalt (Co)	mg/kg	5.4	<1.0	1.2	2.1	1.1	4.0	1.0	7445462
Acid Extractable Copper (Cu)	mg/kg	12	2.2	4.0	4.8	<2.0	11	2.0	7445462
Acid Extractable Iron (Fe)	mg/kg	17000	13000	3100	29000	14000	14000	50	7445462
Acid Extractable Lead (Pb)	mg/kg	9.5	5.1	15	13	4.6	17	0.50	7445462
Acid Extractable Lithium (Li)	mg/kg	19	11	4.6	12	3.0	15	2.0	7445462
Acid Extractable Manganese (Mn)	mg/kg	220	28	43	77	47	150	2.0	7445462
Acid Extractable Mercury (Hg)	mg/kg	0.12	<0.10	0.17	0.22	0.10	0.22	0.10	7445462
Acid Extractable Molybdenum (Mo)	mg/kg	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	2.0	7445462
Acid Extractable Nickel (Ni)	mg/kg	13	<2.0	3.3	6.3	3.0	11	2.0	7445462
Acid Extractable Rubidium (Rb)	mg/kg	19	2.7	6.6	5.1	3.7	15	2.0	7445462
Acid Extractable Selenium (Se)	mg/kg	<0.50	0.89	1.5	2.5	0.62	<0.50	0.50	7445462
Acid Extractable Silver (Ag)	mg/kg	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50	0.50	7445462
Acid Extractable Strontium (Sr)	mg/kg	<5.0	<5.0	6.8	<5.0	<5.0	<5.0	5.0	7445462
Acid Extractable Thallium (Tl)	mg/kg	0.13	<0.10	<0.10	<0.10	<0.10	0.11	0.10	7445462
Acid Extractable Tin (Sn)	mg/kg	<1.0	<1.0	<1.0	<1.0	<1.0	1.2	1.0	7445462
Acid Extractable Uranium (U)	mg/kg	0.65	0.62	0.74	0.90	0.47	0.50	0.10	7445462
Acid Extractable Vanadium (V)	mg/kg	21	20	9.0	34	29	16	2.0	7445462
Acid Extractable Zinc (Zn)	mg/kg	32	5.3	8.3	13	5.8	31	5.0	7445462

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

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BV Labs Job #: C1H4101
Report Date: 2021/07/14

GHD Limited
Client Project #: 11222385
Site Location: GOLDBORO
Your P.O. #: TO FOLLOW
Sampler Initials: JV

ELEMENTS BY ATOMIC SPECTROSCOPY (SOIL)

BV Labs ID		PXP309		PXP310		PXP311		PXP312		
Sampling Date		2021/06/16 10:25		2021/06/16 08:40		2021/06/16 12:00		2021/06/16 10:30		
COC Number		N/A		N/A						
	UNITS	C-13	RDL	C-18	RDL	C-22	RDL	D-02	RDL	QC Batch
Metals										
Acid Extractable Aluminum (Al)	mg/kg	22000	10	10000	10	14000	10	13000	10	7445462
Acid Extractable Antimony (Sb)	mg/kg	3.4	2.0	<2.0	2.0	4.8	2.0	2.3	2.0	7445462
Acid Extractable Arsenic (As)	mg/kg	4900	200	860	20	8600	200	3300	20	7445462
Acid Extractable Barium (Ba)	mg/kg	140	5.0	45	5.0	71	5.0	68	5.0	7445462
Acid Extractable Beryllium (Be)	mg/kg	<2.0	2.0	<2.0	2.0	<2.0	2.0	<2.0	2.0	7445462
Acid Extractable Bismuth (Bi)	mg/kg	<2.0	2.0	<2.0	2.0	<2.0	2.0	<2.0	2.0	7445462
Acid Extractable Boron (B)	mg/kg	<50	50	<50	50	<50	50	<50	50	7445462
Acid Extractable Cadmium (Cd)	mg/kg	0.35	0.30	<0.30	0.30	<0.30	0.30	<0.30	0.30	7445462
Acid Extractable Chromium (Cr)	mg/kg	33	2.0	29	2.0	21	2.0	21	2.0	7445462
Acid Extractable Cobalt (Co)	mg/kg	12	1.0	4.8	1.0	1.2	1.0	2.7	1.0	7445462
Acid Extractable Copper (Cu)	mg/kg	31	2.0	46	2.0	7.8	2.0	7.0	2.0	7445462
Acid Extractable Iron (Fe)	mg/kg	39000	50	53000	50	29000	50	25000	50	7445462
Acid Extractable Lead (Pb)	mg/kg	44	0.50	19	0.50	42	0.50	25	0.50	7445462
Acid Extractable Lithium (Li)	mg/kg	49	2.0	21	2.0	26	2.0	27	2.0	7445462
Acid Extractable Manganese (Mn)	mg/kg	620	2.0	270	2.0	330	2.0	350	2.0	7445462
Acid Extractable Mercury (Hg)	mg/kg	8.2	0.10	0.24	0.10	3.0	0.10	1.0	0.10	7445462
Acid Extractable Molybdenum (Mo)	mg/kg	<2.0	2.0	<2.0	2.0	<2.0	2.0	<2.0	2.0	7445462
Acid Extractable Nickel (Ni)	mg/kg	31	2.0	16	2.0	8.8	2.0	11	2.0	7445462
Acid Extractable Rubidium (Rb)	mg/kg	80	2.0	22	2.0	44	2.0	40	2.0	7445462
Acid Extractable Selenium (Se)	mg/kg	<0.50	0.50	<0.50	0.50	<0.50	0.50	<0.50	0.50	7445462
Acid Extractable Silver (Ag)	mg/kg	<0.50	0.50	<0.50	0.50	<0.50	0.50	<0.50	0.50	7445462
Acid Extractable Strontium (Sr)	mg/kg	15	5.0	5.6	5.0	12	5.0	13	5.0	7445462
Acid Extractable Thallium (Tl)	mg/kg	0.57	0.10	0.17	0.10	0.33	0.10	0.30	0.10	7445462
Acid Extractable Tin (Sn)	mg/kg	1.2	1.0	2.4	1.0	<1.0	1.0	<1.0	1.0	7445462
Acid Extractable Uranium (U)	mg/kg	0.72	0.10	0.44	0.10	0.51	0.10	0.50	0.10	7445462
Acid Extractable Vanadium (V)	mg/kg	39	2.0	21	2.0	23	2.0	22	2.0	7445462
Acid Extractable Zinc (Zn)	mg/kg	130	5.0	140	5.0	36	5.0	51	5.0	7445462

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

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BV Labs Job #: C1H4101
Report Date: 2021/07/14

GHD Limited
Client Project #: 11222385
Site Location: GOLDBORO
Your P.O. #: TO FOLLOW
Sampler Initials: JV

ELEMENTS BY ATOMIC SPECTROSCOPY (SOIL)

BV Labs ID		PXP313		PXP314	PXP315	PXP316	PXP317		PXP318		
Sampling Date		2021/06/16 11:00		2021/06/16 14:35	2021/06/16 13:45	2021/06/16 13:20	2021/06/16 11:25		2021/06/16 16:35		
COC Number											
	UNITS	D-07	RDL	D-08	D-09	D-12	D-19	RDL	D-21	RDL	QC Batch
Metals											
Acid Extractable Aluminum (Al)	mg/kg	12000	10	4300	22000	5100	7900	10	13000	10	7446049
Acid Extractable Antimony (Sb)	mg/kg	8.9	2.0	<2.0	<2.0	<2.0	<2.0	2.0	18	2.0	7446049
Acid Extractable Arsenic (As)	mg/kg	11000	200	380	110	28	220	2.0	9700	200	7446049
Acid Extractable Barium (Ba)	mg/kg	67	5.0	8.3	13	20	14	5.0	70	5.0	7446049
Acid Extractable Beryllium (Be)	mg/kg	<2.0	2.0	<2.0	<2.0	<2.0	<2.0	2.0	<2.0	2.0	7446049
Acid Extractable Bismuth (Bi)	mg/kg	<2.0	2.0	<2.0	<2.0	<2.0	<2.0	2.0	<2.0	2.0	7446049
Acid Extractable Boron (B)	mg/kg	<50	50	<50	<50	<50	<50	50	<50	50	7446049
Acid Extractable Cadmium (Cd)	mg/kg	<0.30	0.30	<0.30	<0.30	<0.30	<0.30	0.30	0.42	0.30	7446049
Acid Extractable Chromium (Cr)	mg/kg	19	2.0	5.9	26	<2.0	11	2.0	22	2.0	7446049
Acid Extractable Cobalt (Co)	mg/kg	1.0	1.0	<1.0	2.6	<1.0	1.8	1.0	15	1.0	7446049
Acid Extractable Copper (Cu)	mg/kg	7.6	2.0	<2.0	4.2	2.7	<2.0	2.0	39	2.0	7446049
Acid Extractable Iron (Fe)	mg/kg	29000	50	15000	39000	1900	7000	50	33000	50	7446049
Acid Extractable Lead (Pb)	mg/kg	52	0.50	6.3	9.9	14	7.5	0.50	120	0.50	7446049
Acid Extractable Lithium (Li)	mg/kg	21	2.0	<2.0	12	<2.0	9.0	2.0	25	2.0	7446049
Acid Extractable Manganese (Mn)	mg/kg	290	2.0	33	100	14	93	2.0	320	2.0	7446049
Acid Extractable Mercury (Hg)	mg/kg	2.9	0.10	0.12	0.16	0.24	0.21	0.10	9.6	0.10	7446049
Acid Extractable Molybdenum (Mo)	mg/kg	<2.0	2.0	<2.0	<2.0	<2.0	<2.0	2.0	<2.0	2.0	7446049
Acid Extractable Nickel (Ni)	mg/kg	7.9	2.0	2.3	7.3	2.2	6.1	2.0	30	2.0	7446049
Acid Extractable Rubidium (Rb)	mg/kg	40	2.0	2.9	6.5	<2.0	7.6	2.0	40	2.0	7446049
Acid Extractable Selenium (Se)	mg/kg	<0.50	0.50	<0.50	2.2	1.7	<0.50	0.50	<0.50	0.50	7446049
Acid Extractable Silver (Ag)	mg/kg	<0.50	0.50	<0.50	<0.50	<0.50	<0.50	0.50	0.64	0.50	7446049
Acid Extractable Strontium (Sr)	mg/kg	8.8	5.0	<5.0	<5.0	14	<5.0	5.0	13	5.0	7446049
Acid Extractable Thallium (Tl)	mg/kg	0.33	0.10	<0.10	<0.10	<0.10	<0.10	0.10	0.38	0.10	7446049
Acid Extractable Tin (Sn)	mg/kg	<1.0	1.0	<1.0	<1.0	<1.0	<1.0	1.0	1.7	1.0	7446049
Acid Extractable Uranium (U)	mg/kg	0.48	0.10	0.48	0.72	0.19	0.58	0.10	0.55	0.10	7446049
Acid Extractable Vanadium (V)	mg/kg	21	2.0	30	47	2.7	12	2.0	22	2.0	7446049
Acid Extractable Zinc (Zn)	mg/kg	39	5.0	<5.0	17	6.4	14	5.0	93	5.0	7446049

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

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BV Labs Job #: C1H4101
Report Date: 2021/07/14

GHD Limited
Client Project #: 11222385
Site Location: GOLDBORO
Your P.O. #: TO FOLLOW
Sampler Initials: JV

ELEMENTS BY ATOMIC SPECTROSCOPY (SOIL)

BV Labs ID		PXP319	PXP320	PXP334		PXP335		PXP336		
Sampling Date		2021/06/16 16:20	2021/06/16 11:45	2021/06/16 16:11		2021/06/16 15:15		2021/06/17 08:35		
COC Number				N/A		N/A		N/A		
	UNITS	D-22	D-34	E-05	QC Batch	E-08	RDL	E-11	RDL	QC Batch
Metals										
Acid Extractable Aluminum (Al)	mg/kg	13000	9200	3900	7446049	10000	10	10000	10	7445460
Acid Extractable Antimony (Sb)	mg/kg	<2.0	<2.0	<2.0	7446049	<2.0	2.0	5.7	2.0	7445460
Acid Extractable Arsenic (As)	mg/kg	24	8.3	26	7446049	99	2.0	9600	200	7445460
Acid Extractable Barium (Ba)	mg/kg	23	18	11	7446049	13	5.0	57	5.0	7445460
Acid Extractable Beryllium (Be)	mg/kg	<2.0	<2.0	<2.0	7446049	<2.0	2.0	<2.0	2.0	7445460
Acid Extractable Bismuth (Bi)	mg/kg	<2.0	<2.0	<2.0	7446049	<2.0	2.0	<2.0	2.0	7445460
Acid Extractable Boron (B)	mg/kg	<50	<50	<50	7446049	<50	50	<50	50	7445460
Acid Extractable Cadmium (Cd)	mg/kg	<0.30	<0.30	<0.30	7446049	<0.30	0.30	<0.30	0.30	7445460
Acid Extractable Chromium (Cr)	mg/kg	6.4	13	6.3	7446049	15	2.0	17	2.0	7445460
Acid Extractable Cobalt (Co)	mg/kg	<1.0	2.1	<1.0	7446049	2.9	1.0	1.1	1.0	7445460
Acid Extractable Copper (Cu)	mg/kg	8.3	<2.0	<2.0	7446049	3.1	2.0	12	2.0	7445460
Acid Extractable Iron (Fe)	mg/kg	1200	7100	3300	7446049	21000	50	27000	50	7445460
Acid Extractable Lead (Pb)	mg/kg	15	6.8	7.8	7446049	7.3	0.50	31	0.50	7445460
Acid Extractable Lithium (Li)	mg/kg	<2.0	12	2.8	7446049	7.8	2.0	18	2.0	7445460
Acid Extractable Manganese (Mn)	mg/kg	15	96	45	7446049	110	2.0	270	2.0	7445460
Acid Extractable Mercury (Hg)	mg/kg	0.48	<0.10	0.17	7446049	<0.10	0.10	8.5	0.10	7445460
Acid Extractable Molybdenum (Mo)	mg/kg	<2.0	<2.0	<2.0	7446049	<2.0	2.0	<2.0	2.0	7445460
Acid Extractable Nickel (Ni)	mg/kg	2.8	7.1	2.7	7446049	7.9	2.0	6.6	2.0	7445460
Acid Extractable Rubidium (Rb)	mg/kg	2.5	8.0	4.2	7446049	6.8	2.0	36	2.0	7445460
Acid Extractable Selenium (Se)	mg/kg	3.7	<0.50	<0.50	7446049	0.94	0.50	<0.50	0.50	7445460
Acid Extractable Silver (Ag)	mg/kg	<0.50	<0.50	<0.50	7446049	<0.50	0.50	<0.50	0.50	7445460
Acid Extractable Strontium (Sr)	mg/kg	22	<5.0	<5.0	7446049	<5.0	5.0	6.3	5.0	7445460
Acid Extractable Thallium (Tl)	mg/kg	<0.10	<0.10	<0.10	7446049	<0.10	0.10	0.31	0.10	7445460
Acid Extractable Tin (Sn)	mg/kg	<1.0	<1.0	<1.0	7446049	<1.0	1.0	<1.0	1.0	7445460
Acid Extractable Uranium (U)	mg/kg	1.5	0.53	0.49	7446049	0.62	0.10	0.38	0.10	7445460
Acid Extractable Vanadium (V)	mg/kg	7.4	12	6.8	7446049	28	2.0	19	2.0	7445460
Acid Extractable Zinc (Zn)	mg/kg	<5.0	14	5.1	7446049	19	5.0	31	5.0	7445460

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

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BV Labs Job #: C1H4101
Report Date: 2021/07/14

GHD Limited
Client Project #: 11222385
Site Location: GOLDBORO
Your P.O. #: TO FOLLOW
Sampler Initials: JV

ELEMENTS BY ATOMIC SPECTROSCOPY (SOIL)

BV Labs ID		PXP337			PXP338			PXP339		PXP340		
Sampling Date		2021/06/17 09:15			2021/06/16 14:15			2021/06/17 08:55		2021/06/17 09:15		
COC Number		N/A			N/A			N/A		N/A		
	UNITS	E-22	RDL	QC Batch	E-31	RDL	QC Batch	E-33	RDL	E-35	RDL	QC Batch
Metals												
Acid Extractable Aluminum (Al)	mg/kg	9000	10	7445462	18000	10	7445460	16000	10	9700	10	7445462
Acid Extractable Antimony (Sb)	mg/kg	14	2.0	7445462	3.0	2.0	7445460	<2.0	2.0	20	2.0	7445462
Acid Extractable Arsenic (As)	mg/kg	25000	200	7445462	790	20	7445460	84	2.0	28000	200	7445462
Acid Extractable Barium (Ba)	mg/kg	52	5.0	7445462	97	5.0	7445460	7.8	5.0	47	5.0	7445462
Acid Extractable Beryllium (Be)	mg/kg	<2.0	2.0	7445462	<2.0	2.0	7445460	<2.0	2.0	<2.0	2.0	7445462
Acid Extractable Bismuth (Bi)	mg/kg	<2.0	2.0	7445462	<2.0	2.0	7445460	<2.0	2.0	<2.0	2.0	7445462
Acid Extractable Boron (B)	mg/kg	<50	50	7445462	<50	50	7445460	<50	50	<50	50	7445462
Acid Extractable Cadmium (Cd)	mg/kg	<0.30	0.30	7445462	<0.30	0.30	7445460	<0.30	0.30	<0.30	0.30	7445462
Acid Extractable Chromium (Cr)	mg/kg	17	2.0	7445462	27	2.0	7445460	17	2.0	16	2.0	7445462
Acid Extractable Cobalt (Co)	mg/kg	<1.0	1.0	7445462	6.1	1.0	7445460	1.3	1.0	2.7	1.0	7445462
Acid Extractable Copper (Cu)	mg/kg	6.9	2.0	7445462	21	2.0	7445460	2.3	2.0	8.2	2.0	7445462
Acid Extractable Iron (Fe)	mg/kg	36000	50	7445462	28000	50	7445460	33000	50	40000	50	7445462
Acid Extractable Lead (Pb)	mg/kg	86	0.50	7445462	36	0.50	7445460	8.9	0.50	96	0.50	7445462
Acid Extractable Lithium (Li)	mg/kg	13	2.0	7445462	39	2.0	7445460	6.1	2.0	14	2.0	7445462
Acid Extractable Manganese (Mn)	mg/kg	180	2.0	7445462	500	2.0	7445460	49	2.0	200	2.0	7445462
Acid Extractable Mercury (Hg)	mg/kg	11	0.10	7445462	1.3	0.10	7445460	<0.10	0.10	15	0.10	7445462
Acid Extractable Molybdenum (Mo)	mg/kg	<2.0	2.0	7445462	<2.0	2.0	7445460	<2.0	2.0	<2.0	2.0	7445462
Acid Extractable Nickel (Ni)	mg/kg	4.9	2.0	7445462	19	2.0	7445460	3.8	2.0	9.4	2.0	7445462
Acid Extractable Rubidium (Rb)	mg/kg	28	2.0	7445462	65	2.0	7445460	3.6	2.0	27	2.0	7445462
Acid Extractable Selenium (Se)	mg/kg	<0.50	0.50	7445462	<0.50	0.50	7445460	1.5	0.50	<0.50	0.50	7445462
Acid Extractable Silver (Ag)	mg/kg	1.1	0.50	7445462	<0.50	0.50	7445460	<0.50	0.50	0.87	0.50	7445462
Acid Extractable Strontium (Sr)	mg/kg	<5.0	5.0	7445462	14	5.0	7445460	<5.0	5.0	6.5	5.0	7445462
Acid Extractable Thallium (Tl)	mg/kg	0.28	0.10	7445462	0.47	0.10	7445460	<0.10	0.10	0.27	0.10	7445462
Acid Extractable Tin (Sn)	mg/kg	<1.0	1.0	7445462	<1.0	1.0	7445460	1.1	1.0	<1.0	1.0	7445462
Acid Extractable Uranium (U)	mg/kg	0.41	0.10	7445462	0.80	0.10	7445460	0.55	0.10	0.42	0.10	7445462
Acid Extractable Vanadium (V)	mg/kg	20	2.0	7445462	31	2.0	7445460	56	2.0	19	2.0	7445462
Acid Extractable Zinc (Zn)	mg/kg	22	5.0	7445462	78	5.0	7445460	7.3	5.0	31	5.0	7445462

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

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BV Labs Job #: C1H4101
Report Date: 2021/07/14

GHD Limited
Client Project #: 11222385
Site Location: GOLDBORO
Your P.O. #: TO FOLLOW
Sampler Initials: JV

ELEMENTS BY ATOMIC SPECTROSCOPY (SOIL)

BV Labs ID		PXP340		PXP341		PXP342		PXP343		
Sampling Date		2021/06/17 09:15		2021/06/17 10:05		2021/06/16 13:30		2021/06/17 09:30		
COC Number		N/A		N/A		N/A		N/A		
	UNITS	E-35 Lab-Dup	QC Batch	E-40	RDL	E-45	RDL	E-46	RDL	QC Batch
Metals										
Acid Extractable Aluminum (Al)	mg/kg	9500	7445462	9500	10	7800	10	9900	10	7446049
Acid Extractable Antimony (Sb)	mg/kg	21	7445462	7.5	2.0	<2.0	2.0	<2.0	2.0	7446049
Acid Extractable Arsenic (As)	mg/kg	30000	7445462	22000	200	180	2.0	940	20	7446049
Acid Extractable Barium (Ba)	mg/kg	47	7445462	71	5.0	39	5.0	44	5.0	7446049
Acid Extractable Beryllium (Be)	mg/kg	<2.0	7445462	<2.0	2.0	<2.0	2.0	<2.0	2.0	7446049
Acid Extractable Bismuth (Bi)	mg/kg	<2.0	7445462	<2.0	2.0	<2.0	2.0	<2.0	2.0	7446049
Acid Extractable Boron (B)	mg/kg	<50	7445462	<50	50	<50	50	<50	50	7446049
Acid Extractable Cadmium (Cd)	mg/kg	<0.30	7445462	<0.30	0.30	<0.30	0.30	<0.30	0.30	7446049
Acid Extractable Chromium (Cr)	mg/kg	16	7445462	17	2.0	4.4	2.0	15	2.0	7446049
Acid Extractable Cobalt (Co)	mg/kg	2.7	7445462	1.9	1.0	2.4	1.0	7.1	1.0	7446049
Acid Extractable Copper (Cu)	mg/kg	8.5	7445462	7.7	2.0	11	2.0	24	2.0	7446049
Acid Extractable Iron (Fe)	mg/kg	41000	7445462	45000	50	4700	50	18000	50	7446049
Acid Extractable Lead (Pb)	mg/kg	100	7445462	75	0.50	15	0.50	37	0.50	7446049
Acid Extractable Lithium (Li)	mg/kg	13	7445462	13	2.0	<2.0	2.0	13	2.0	7446049
Acid Extractable Manganese (Mn)	mg/kg	200	7445462	190	2.0	210	2.0	290	2.0	7446049
Acid Extractable Mercury (Hg)	mg/kg	16	7445462	11	0.10	0.39	0.10	0.23	0.10	7446049
Acid Extractable Molybdenum (Mo)	mg/kg	<2.0	7445462	<2.0	2.0	<2.0	2.0	<2.0	2.0	7446049
Acid Extractable Nickel (Ni)	mg/kg	9.4	7445462	7.6	2.0	6.9	2.0	14	2.0	7446049
Acid Extractable Rubidium (Rb)	mg/kg	26	7445462	21	2.0	<2.0	2.0	17	2.0	7446049
Acid Extractable Selenium (Se)	mg/kg	<0.50	7445462	0.77	0.50	3.0	0.50	0.58	0.50	7446049
Acid Extractable Silver (Ag)	mg/kg	0.75	7445462	0.85	0.50	<0.50	0.50	1.1	0.50	7446049
Acid Extractable Strontium (Sr)	mg/kg	6.1	7445462	10	5.0	45	5.0	12	5.0	7446049
Acid Extractable Thallium (Tl)	mg/kg	0.28	7445462	0.22	0.10	<0.10	0.10	0.15	0.10	7446049
Acid Extractable Tin (Sn)	mg/kg	<1.0	7445462	<1.0	1.0	<1.0	1.0	<1.0	1.0	7446049
Acid Extractable Uranium (U)	mg/kg	0.44	7445462	0.49	0.10	1.2	0.10	0.61	0.10	7446049
Acid Extractable Vanadium (V)	mg/kg	19	7445462	18	2.0	4.5	2.0	22	2.0	7446049
Acid Extractable Zinc (Zn)	mg/kg	29	7445462	23	5.0	49	5.0	46	5.0	7446049

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
Lab-Dup = Laboratory Initiated Duplicate

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BV Labs Job #: C1H4101
Report Date: 2021/07/14

GHD Limited
Client Project #: 11222385
Site Location: GOLDBORO
Your P.O. #: TO FOLLOW
Sampler Initials: JV

ELEMENTS BY ATOMIC SPECTROSCOPY (SOIL)

BV Labs ID		PXP344	PXP344		PXP345	PXP346		PXP347	PXP348		
Sampling Date		2021/06/17 10:20	2021/06/17 10:20		2021/06/17 11:00	2021/06/17 09:45		2021/06/17 10:20	2021/06/16 08:45		
COC Number		N/A	N/A		N/A	N/A		N/A	N/A		
	UNITS	E-47	E-47 Lab-Dup	RDL	E-55	E-56	RDL	E-62	E-68	RDL	QC Batch
Metals											
Acid Extractable Aluminum (Al)	mg/kg	9800	9700	10	18000	23000	10	1200	1900	10	7446049
Acid Extractable Antimony (Sb)	mg/kg	16	15	2.0	<2.0	<2.0	2.0	<2.0	<2.0	2.0	7446049
Acid Extractable Arsenic (As)	mg/kg	20000	18000	200	580	1600	20	15	12	2.0	7446049
Acid Extractable Barium (Ba)	mg/kg	45	44	5.0	87	140	5.0	17	8.6	5.0	7446049
Acid Extractable Beryllium (Be)	mg/kg	<2.0	<2.0	2.0	<2.0	<2.0	2.0	<2.0	<2.0	2.0	7446049
Acid Extractable Bismuth (Bi)	mg/kg	<2.0	<2.0	2.0	<2.0	<2.0	2.0	<2.0	<2.0	2.0	7446049
Acid Extractable Boron (B)	mg/kg	<50	<50	50	<50	<50	50	<50	<50	50	7446049
Acid Extractable Cadmium (Cd)	mg/kg	<0.30	<0.30	0.30	<0.30	<0.30	0.30	<0.30	<0.30	0.30	7446049
Acid Extractable Chromium (Cr)	mg/kg	18	17	2.0	24	34	2.0	<2.0	3.0	2.0	7446049
Acid Extractable Cobalt (Co)	mg/kg	3.0	3.1	1.0	1.6	5.2	1.0	<1.0	<1.0	1.0	7446049
Acid Extractable Copper (Cu)	mg/kg	5.8	5.6	2.0	13	30	2.0	2.9	<2.0	2.0	7446049
Acid Extractable Iron (Fe)	mg/kg	41000	38000	50	23000	37000	50	1000	1600	50	7446049
Acid Extractable Lead (Pb)	mg/kg	64	60	0.50	28	34	0.50	11	6.3	0.50	7446049
Acid Extractable Lithium (Li)	mg/kg	11	12	2.0	31	46	2.0	<2.0	<2.0	2.0	7446049
Acid Extractable Manganese (Mn)	mg/kg	180	180	2.0	370	600	2.0	32	26	2.0	7446049
Acid Extractable Mercury (Hg)	mg/kg	6.6	5.0	0.10	5.1	4.5	0.10	0.21	<0.10	0.10	7446049
Acid Extractable Molybdenum (Mo)	mg/kg	<2.0	<2.0	2.0	<2.0	<2.0	2.0	<2.0	<2.0	2.0	7446049
Acid Extractable Nickel (Ni)	mg/kg	9.0	9.0	2.0	11	22	2.0	<2.0	<2.0	2.0	7446049
Acid Extractable Rubidium (Rb)	mg/kg	14	13	2.0	46	78	2.0	<2.0	3.2	2.0	7446049
Acid Extractable Selenium (Se)	mg/kg	1.2	1.1	0.50	<0.50	<0.50	0.50	1.3	<0.50	0.50	7446049
Acid Extractable Silver (Ag)	mg/kg	0.88	0.65	0.50	<0.50	<0.50	0.50	<0.50	<0.50	0.50	7446049
Acid Extractable Strontium (Sr)	mg/kg	11	9.8	5.0	15	21	5.0	27	<5.0	5.0	7446049
Acid Extractable Thallium (Tl)	mg/kg	0.15	0.14	0.10	0.37	0.57	0.10	<0.10	<0.10	0.10	7446049
Acid Extractable Tin (Sn)	mg/kg	1.3	1.2	1.0	<1.0	<1.0	1.0	2.1	<1.0	1.0	7446049
Acid Extractable Uranium (U)	mg/kg	0.57	0.52	0.10	1.7	1.2	0.10	<0.10	0.26	0.10	7446049
Acid Extractable Vanadium (V)	mg/kg	21	20	2.0	26	38	2.0	<2.0	3.0	2.0	7446049
Acid Extractable Zinc (Zn)	mg/kg	23	23	5.0	42	92	5.0	26	<5.0	5.0	7446049

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
Lab-Dup = Laboratory Initiated Duplicate

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BV Labs Job #: C1H4101
Report Date: 2021/07/14

GHD Limited
Client Project #: 11222385
Site Location: GOLDBORO
Your P.O. #: TO FOLLOW
Sampler Initials: JV

ELEMENTS BY ATOMIC SPECTROSCOPY (SOIL)

BV Labs ID		PXP349		PXP350			PXP351		PXP352		
Sampling Date		2021/06/16 08:55		2021/06/14			2021/06/15		2021/06/16		
COC Number		N/A		N/A			N/A		N/A		
	UNITS	E-74	QC Batch	DUP-A	RDL	QC Batch	DUP-B	RDL	DUP-C	RDL	QC Batch
Metals											
Acid Extractable Aluminum (Al)	mg/kg	3400	7446049	19000	10	7435136	13000	10	6800	10	7446049
Acid Extractable Antimony (Sb)	mg/kg	<2.0	7446049	<2.0	2.0	7435136	5.1	2.0	<2.0	2.0	7446049
Acid Extractable Arsenic (As)	mg/kg	3.0	7446049	15	2.0	7435136	11000	200	250	2.0	7446049
Acid Extractable Barium (Ba)	mg/kg	6.5	7446049	27	5.0	7435136	72	5.0	13	5.0	7446049
Acid Extractable Beryllium (Be)	mg/kg	<2.0	7446049	<2.0	2.0	7435136	<2.0	2.0	<2.0	2.0	7446049
Acid Extractable Bismuth (Bi)	mg/kg	<2.0	7446049	<2.0	2.0	7435136	<2.0	2.0	<2.0	2.0	7446049
Acid Extractable Boron (B)	mg/kg	<50	7446049	<50	50	7435136	<50	50	<50	50	7446049
Acid Extractable Cadmium (Cd)	mg/kg	<0.30	7446049	<0.30	0.30	7435136	<0.30	0.30	<0.30	0.30	7446049
Acid Extractable Chromium (Cr)	mg/kg	3.8	7446049	24	2.0	7435136	20	2.0	11	2.0	7446049
Acid Extractable Cobalt (Co)	mg/kg	<1.0	7446049	4.5	1.0	7435136	1.4	1.0	1.7	1.0	7446049
Acid Extractable Copper (Cu)	mg/kg	<2.0	7446049	9.1	2.0	7435136	7.6	2.0	2.3	2.0	7446049
Acid Extractable Iron (Fe)	mg/kg	1700	7446049	19000	50	7435136	31000	50	15000	50	7446049
Acid Extractable Lead (Pb)	mg/kg	4.7	7446049	9.3	0.50	7435136	48	0.50	6.5	0.50	7446049
Acid Extractable Lithium (Li)	mg/kg	<2.0	7446049	19	2.0	7435136	22	2.0	5.0	2.0	7446049
Acid Extractable Manganese (Mn)	mg/kg	30	7446049	160	2.0	7435136	310	2.0	77	2.0	7446049
Acid Extractable Mercury (Hg)	mg/kg	<0.10	7446049	<0.10	0.10	7435136	4.5	0.10	0.18	0.10	7446049
Acid Extractable Molybdenum (Mo)	mg/kg	<2.0	7446049	<2.0	2.0	7435136	<2.0	2.0	<2.0	2.0	7446049
Acid Extractable Nickel (Ni)	mg/kg	<2.0	7446049	13	2.0	7435136	8.0	2.0	4.8	2.0	7446049
Acid Extractable Rubidium (Rb)	mg/kg	3.4	7446049	11	2.0	7435136	43	2.0	5.1	2.0	7446049
Acid Extractable Selenium (Se)	mg/kg	<0.50	7446049	0.87	0.50	7435136	<0.50	0.50	0.61	0.50	7446049
Acid Extractable Silver (Ag)	mg/kg	<0.50	7446049	<0.50	0.50	7435136	<0.50	0.50	<0.50	0.50	7446049
Acid Extractable Strontium (Sr)	mg/kg	<5.0	7446049	<5.0	5.0	7435136	<5.0	5.0	<5.0	5.0	7446049
Acid Extractable Thallium (Tl)	mg/kg	<0.10	7446049	0.11	0.10	7435136	0.33	0.10	<0.10	0.10	7446049
Acid Extractable Tin (Sn)	mg/kg	<1.0	7446049	<1.0	1.0	7435136	<1.0	1.0	<1.0	1.0	7446049
Acid Extractable Uranium (U)	mg/kg	0.44	7446049	0.81	0.10	7435136	0.39	0.10	0.56	0.10	7446049
Acid Extractable Vanadium (V)	mg/kg	4.7	7446049	24	2.0	7435136	24	2.0	31	2.0	7446049
Acid Extractable Zinc (Zn)	mg/kg	<5.0	7446049	30	5.0	7435136	39	5.0	9.8	5.0	7446049

RDL = Reportable Detection Limit
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GHD Limited
Client Project #: 11222385
Site Location: GOLDBORO
Your P.O. #: TO FOLLOW
Sampler Initials: JV

ELEMENTS BY ATOMIC SPECTROSCOPY (SOIL)

BV Labs ID		PXP353		PXP355		PXP356		
Sampling Date		2021/06/16		2021/06/16		2021/06/17		
COC Number		N/A		N/A		N/A		
	UNITS	DUP-D	RDL	DUP-E	RDL	DUP-F	RDL	QC Batch
Metals								
Acid Extractable Aluminum (Al)	mg/kg	11000	10	3100	10	8600	10	7446056
Acid Extractable Antimony (Sb)	mg/kg	8.0	2.0	<2.0	2.0	15	2.0	7446056
Acid Extractable Arsenic (As)	mg/kg	9900	200	4.9	2.0	22000	200	7446056
Acid Extractable Barium (Ba)	mg/kg	61	5.0	6.4	5.0	44	5.0	7446056
Acid Extractable Beryllium (Be)	mg/kg	<2.0	2.0	<2.0	2.0	<2.0	2.0	7446056
Acid Extractable Bismuth (Bi)	mg/kg	<2.0	2.0	<2.0	2.0	<2.0	2.0	7446056
Acid Extractable Boron (B)	mg/kg	<50	50	<50	50	<50	50	7446056
Acid Extractable Cadmium (Cd)	mg/kg	<0.30	0.30	<0.30	0.30	<0.30	0.30	7446056
Acid Extractable Chromium (Cr)	mg/kg	19	2.0	4.0	2.0	16	2.0	7446056
Acid Extractable Cobalt (Co)	mg/kg	<1.0	1.0	<1.0	1.0	1.4	1.0	7446056
Acid Extractable Copper (Cu)	mg/kg	6.9	2.0	<2.0	2.0	8.0	2.0	7446056
Acid Extractable Iron (Fe)	mg/kg	26000	50	1600	50	35000	50	7446056
Acid Extractable Lead (Pb)	mg/kg	39	0.50	4.7	0.50	74	0.50	7446056
Acid Extractable Lithium (Li)	mg/kg	20	2.0	<2.0	2.0	12	2.0	7446056
Acid Extractable Manganese (Mn)	mg/kg	260	2.0	30	2.0	170	2.0	7446056
Acid Extractable Mercury (Hg)	mg/kg	2.7	0.10	<0.10	0.10	15	0.10	7446056
Acid Extractable Molybdenum (Mo)	mg/kg	<2.0	2.0	<2.0	2.0	<2.0	2.0	7446056
Acid Extractable Nickel (Ni)	mg/kg	7.3	2.0	<2.0	2.0	6.1	2.0	7446056
Acid Extractable Rubidium (Rb)	mg/kg	38	2.0	3.0	2.0	22	2.0	7446056
Acid Extractable Selenium (Se)	mg/kg	<0.50	0.50	<0.50	0.50	0.54	0.50	7446056
Acid Extractable Silver (Ag)	mg/kg	<0.50	0.50	<0.50	0.50	0.66	0.50	7446056
Acid Extractable Strontium (Sr)	mg/kg	8.0	5.0	<5.0	5.0	5.0	5.0	7446056
Acid Extractable Thallium (Tl)	mg/kg	0.30	0.10	<0.10	0.10	0.24	0.10	7446056
Acid Extractable Tin (Sn)	mg/kg	<1.0	1.0	<1.0	1.0	<1.0	1.0	7446056
Acid Extractable Uranium (U)	mg/kg	0.42	0.10	0.36	0.10	0.46	0.10	7446056
Acid Extractable Vanadium (V)	mg/kg	19	2.0	5.0	2.0	18	2.0	7446056
Acid Extractable Zinc (Zn)	mg/kg	31	5.0	<5.0	5.0	21	5.0	7446056

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

BV Labs Job #: C1H4101
Report Date: 2021/07/14

GHD Limited
Client Project #: 11222385
Site Location: GOLDBORO
Your P.O. #: TO FOLLOW
Sampler Initials: JV

GENERAL COMMENTS

Each temperature is the average of up to three cooler temperatures taken at receipt

Package 1	7.7°C
Package 2	7.7°C
Package 3	7.3°C

Results relate only to the items tested.

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QUALITY ASSURANCE REPORT

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
7432666	ZMR	RPD [PXP276-01]	Moisture	2021/06/29	4.0		%	25
7435136	MLB	Matrix Spike	Acid Extractable Antimony (Sb)	2021/06/30		105	%	75 - 125
			Acid Extractable Arsenic (As)	2021/06/30		100	%	75 - 125
			Acid Extractable Barium (Ba)	2021/06/30		120	%	75 - 125
			Acid Extractable Beryllium (Be)	2021/06/30		102	%	75 - 125
			Acid Extractable Bismuth (Bi)	2021/06/30		106	%	75 - 125
			Acid Extractable Boron (B)	2021/06/30		75	%	75 - 125
			Acid Extractable Cadmium (Cd)	2021/06/30		101	%	75 - 125
			Acid Extractable Chromium (Cr)	2021/06/30		106	%	75 - 125
			Acid Extractable Cobalt (Co)	2021/06/30		103	%	75 - 125
			Acid Extractable Copper (Cu)	2021/06/30		102	%	75 - 125
			Acid Extractable Lead (Pb)	2021/06/30		NC	%	75 - 125
			Acid Extractable Lithium (Li)	2021/06/30		107	%	75 - 125
			Acid Extractable Manganese (Mn)	2021/06/30		NC	%	75 - 125
			Acid Extractable Mercury (Hg)	2021/06/30		98	%	75 - 125
			Acid Extractable Molybdenum (Mo)	2021/06/30		104	%	75 - 125
			Acid Extractable Nickel (Ni)	2021/06/30		103	%	75 - 125
			Acid Extractable Rubidium (Rb)	2021/06/30		100	%	75 - 125
			Acid Extractable Selenium (Se)	2021/06/30		101	%	75 - 125
			Acid Extractable Silver (Ag)	2021/06/30		105	%	75 - 125
			Acid Extractable Strontium (Sr)	2021/06/30		109	%	75 - 125
			Acid Extractable Thallium (Tl)	2021/06/30		105	%	75 - 125
			Acid Extractable Tin (Sn)	2021/06/30		103	%	75 - 125
			Acid Extractable Uranium (U)	2021/06/30		110	%	75 - 125
			Acid Extractable Vanadium (V)	2021/06/30		104	%	75 - 125
			Acid Extractable Zinc (Zn)	2021/06/30		101	%	75 - 125
7435136	MLB	Spiked Blank	Acid Extractable Antimony (Sb)	2021/06/30		109	%	75 - 125
			Acid Extractable Arsenic (As)	2021/06/30		100	%	75 - 125
			Acid Extractable Barium (Ba)	2021/06/30		99	%	75 - 125
			Acid Extractable Beryllium (Be)	2021/06/30		97	%	75 - 125
			Acid Extractable Bismuth (Bi)	2021/06/30		100	%	75 - 125
			Acid Extractable Boron (B)	2021/06/30		97	%	75 - 125
			Acid Extractable Cadmium (Cd)	2021/06/30		97	%	75 - 125
			Acid Extractable Chromium (Cr)	2021/06/30		101	%	75 - 125
			Acid Extractable Cobalt (Co)	2021/06/30		99	%	75 - 125
			Acid Extractable Copper (Cu)	2021/06/30		99	%	75 - 125
			Acid Extractable Lead (Pb)	2021/06/30		100	%	75 - 125
			Acid Extractable Lithium (Li)	2021/06/30		105	%	75 - 125
			Acid Extractable Manganese (Mn)	2021/06/30		100	%	75 - 125
			Acid Extractable Mercury (Hg)	2021/06/30		105	%	75 - 125
			Acid Extractable Molybdenum (Mo)	2021/06/30		103	%	75 - 125
			Acid Extractable Nickel (Ni)	2021/06/30		99	%	75 - 125
			Acid Extractable Rubidium (Rb)	2021/06/30		100	%	75 - 125
			Acid Extractable Selenium (Se)	2021/06/30		101	%	75 - 125
			Acid Extractable Silver (Ag)	2021/06/30		100	%	75 - 125
			Acid Extractable Strontium (Sr)	2021/06/30		99	%	75 - 125
			Acid Extractable Thallium (Tl)	2021/06/30		100	%	75 - 125
			Acid Extractable Tin (Sn)	2021/06/30		101	%	75 - 125
			Acid Extractable Uranium (U)	2021/06/30		104	%	75 - 125
			Acid Extractable Vanadium (V)	2021/06/30		101	%	75 - 125
			Acid Extractable Zinc (Zn)	2021/06/30		102	%	75 - 125
7435136	MLB	Method Blank	Acid Extractable Aluminum (Al)	2021/06/29	<10		mg/kg	

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QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Acid Extractable Antimony (Sb)	2021/06/29	<2.0		mg/kg	
			Acid Extractable Arsenic (As)	2021/06/29	<2.0		mg/kg	
			Acid Extractable Barium (Ba)	2021/06/29	<5.0		mg/kg	
			Acid Extractable Beryllium (Be)	2021/06/29	<2.0		mg/kg	
			Acid Extractable Bismuth (Bi)	2021/06/29	<2.0		mg/kg	
			Acid Extractable Boron (B)	2021/06/29	<50		mg/kg	
			Acid Extractable Cadmium (Cd)	2021/06/29	<0.30		mg/kg	
			Acid Extractable Chromium (Cr)	2021/06/29	<2.0		mg/kg	
			Acid Extractable Cobalt (Co)	2021/06/29	<1.0		mg/kg	
			Acid Extractable Copper (Cu)	2021/06/29	<2.0		mg/kg	
			Acid Extractable Iron (Fe)	2021/06/29	<50		mg/kg	
			Acid Extractable Lead (Pb)	2021/06/29	<0.50		mg/kg	
			Acid Extractable Lithium (Li)	2021/06/29	<2.0		mg/kg	
			Acid Extractable Manganese (Mn)	2021/06/29	<2.0		mg/kg	
			Acid Extractable Mercury (Hg)	2021/06/29	<0.10		mg/kg	
			Acid Extractable Molybdenum (Mo)	2021/06/29	<2.0		mg/kg	
			Acid Extractable Nickel (Ni)	2021/06/29	<2.0		mg/kg	
			Acid Extractable Rubidium (Rb)	2021/06/29	<2.0		mg/kg	
			Acid Extractable Selenium (Se)	2021/06/29	<0.50		mg/kg	
			Acid Extractable Silver (Ag)	2021/06/29	<0.50		mg/kg	
			Acid Extractable Strontium (Sr)	2021/06/29	<5.0		mg/kg	
			Acid Extractable Thallium (Tl)	2021/06/29	<0.10		mg/kg	
			Acid Extractable Tin (Sn)	2021/06/29	<1.0		mg/kg	
			Acid Extractable Uranium (U)	2021/06/29	<0.10		mg/kg	
			Acid Extractable Vanadium (V)	2021/06/29	<2.0		mg/kg	
			Acid Extractable Zinc (Zn)	2021/06/29	<5.0		mg/kg	
7435136	MLB	RPD	Acid Extractable Lead (Pb)	2021/06/30	4.2		%	35
7435465	ZMR	RPD	Moisture	2021/06/30	1.1		%	25
7435909	SSI	RPD [PXP276-01]	Soluble (5:1) pH	2021/06/29	3.7		%	N/A
7435915	SSI	RPD [PXP276-01]	Conductivity	2021/06/29	6.4		%	20
7436182	ZMR	RPD [PXP295-01]	Moisture	2021/06/30	3.9		%	25
7437988	BAN	Matrix Spike	Acid Extractable Antimony (Sb)	2021/07/02		106	%	75 - 125
			Acid Extractable Arsenic (As)	2021/07/02		103	%	75 - 125
			Acid Extractable Barium (Ba)	2021/07/02		NC	%	75 - 125
			Acid Extractable Beryllium (Be)	2021/07/02		100	%	75 - 125
			Acid Extractable Bismuth (Bi)	2021/07/02		100	%	75 - 125
			Acid Extractable Boron (B)	2021/07/02		93	%	75 - 125
			Acid Extractable Cadmium (Cd)	2021/07/02		99	%	75 - 125
			Acid Extractable Chromium (Cr)	2021/07/02		84	%	75 - 125
			Acid Extractable Cobalt (Co)	2021/07/02		101	%	75 - 125
			Acid Extractable Copper (Cu)	2021/07/02		105	%	75 - 125
			Acid Extractable Lead (Pb)	2021/07/02		97	%	75 - 125
			Acid Extractable Lithium (Li)	2021/07/02		105	%	75 - 125
			Acid Extractable Manganese (Mn)	2021/07/02		NC	%	75 - 125
			Acid Extractable Mercury (Hg)	2021/07/02		99	%	75 - 125
			Acid Extractable Molybdenum (Mo)	2021/07/02		107	%	75 - 125
			Acid Extractable Nickel (Ni)	2021/07/02		103	%	75 - 125
			Acid Extractable Rubidium (Rb)	2021/07/02		101	%	75 - 125
			Acid Extractable Selenium (Se)	2021/07/02		104	%	75 - 125
			Acid Extractable Silver (Ag)	2021/07/02		103	%	75 - 125
			Acid Extractable Strontium (Sr)	2021/07/02		102	%	75 - 125
			Acid Extractable Thallium (Tl)	2021/07/02		102	%	75 - 125

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QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Acid Extractable Tin (Sn)	2021/07/02		104	%	75 - 125
			Acid Extractable Uranium (U)	2021/07/02		102	%	75 - 125
			Acid Extractable Vanadium (V)	2021/07/02		95	%	75 - 125
			Acid Extractable Zinc (Zn)	2021/07/02		NC	%	75 - 125
7437988	BAN	Spiked Blank	Acid Extractable Antimony (Sb)	2021/07/02		111	%	75 - 125
			Acid Extractable Arsenic (As)	2021/07/02		103	%	75 - 125
			Acid Extractable Barium (Ba)	2021/07/02		98	%	75 - 125
			Acid Extractable Beryllium (Be)	2021/07/02		99	%	75 - 125
			Acid Extractable Bismuth (Bi)	2021/07/02		101	%	75 - 125
			Acid Extractable Boron (B)	2021/07/02		98	%	75 - 125
			Acid Extractable Cadmium (Cd)	2021/07/02		100	%	75 - 125
			Acid Extractable Chromium (Cr)	2021/07/02		103	%	75 - 125
			Acid Extractable Cobalt (Co)	2021/07/02		101	%	75 - 125
			Acid Extractable Copper (Cu)	2021/07/02		103	%	75 - 125
			Acid Extractable Lead (Pb)	2021/07/02		101	%	75 - 125
			Acid Extractable Lithium (Li)	2021/07/02		107	%	75 - 125
			Acid Extractable Manganese (Mn)	2021/07/02		103	%	75 - 125
			Acid Extractable Mercury (Hg)	2021/07/02		107	%	75 - 125
			Acid Extractable Molybdenum (Mo)	2021/07/02		108	%	75 - 125
			Acid Extractable Nickel (Ni)	2021/07/02		103	%	75 - 125
			Acid Extractable Rubidium (Rb)	2021/07/02		100	%	75 - 125
			Acid Extractable Selenium (Se)	2021/07/02		106	%	75 - 125
			Acid Extractable Silver (Ag)	2021/07/02		103	%	75 - 125
			Acid Extractable Strontium (Sr)	2021/07/02		105	%	75 - 125
			Acid Extractable Thallium (Tl)	2021/07/02		102	%	75 - 125
			Acid Extractable Tin (Sn)	2021/07/02		102	%	75 - 125
			Acid Extractable Uranium (U)	2021/07/02		104	%	75 - 125
			Acid Extractable Vanadium (V)	2021/07/02		101	%	75 - 125
			Acid Extractable Zinc (Zn)	2021/07/02		104	%	75 - 125
7437988	BAN	Method Blank	Acid Extractable Aluminum (Al)	2021/07/02	<10		mg/kg	
			Acid Extractable Antimony (Sb)	2021/07/02	<2.0		mg/kg	
			Acid Extractable Arsenic (As)	2021/07/02	<2.0		mg/kg	
			Acid Extractable Barium (Ba)	2021/07/02	<5.0		mg/kg	
			Acid Extractable Beryllium (Be)	2021/07/02	<2.0		mg/kg	
			Acid Extractable Bismuth (Bi)	2021/07/02	<2.0		mg/kg	
			Acid Extractable Boron (B)	2021/07/02	<50		mg/kg	
			Acid Extractable Cadmium (Cd)	2021/07/02	<0.30		mg/kg	
			Acid Extractable Chromium (Cr)	2021/07/02	<2.0		mg/kg	
			Acid Extractable Cobalt (Co)	2021/07/02	<1.0		mg/kg	
			Acid Extractable Copper (Cu)	2021/07/02	<2.0		mg/kg	
			Acid Extractable Iron (Fe)	2021/07/02	<50		mg/kg	
			Acid Extractable Lead (Pb)	2021/07/02	<0.50		mg/kg	
			Acid Extractable Lithium (Li)	2021/07/02	<2.0		mg/kg	
			Acid Extractable Manganese (Mn)	2021/07/02	<2.0		mg/kg	
			Acid Extractable Mercury (Hg)	2021/07/02	<0.10		mg/kg	
			Acid Extractable Molybdenum (Mo)	2021/07/02	<2.0		mg/kg	
			Acid Extractable Nickel (Ni)	2021/07/02	<2.0		mg/kg	
			Acid Extractable Rubidium (Rb)	2021/07/02	<2.0		mg/kg	
			Acid Extractable Selenium (Se)	2021/07/02	<0.50		mg/kg	
			Acid Extractable Silver (Ag)	2021/07/02	<0.50		mg/kg	
			Acid Extractable Strontium (Sr)	2021/07/02	<5.0		mg/kg	
			Acid Extractable Thallium (Tl)	2021/07/02	<0.10		mg/kg	

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QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Acid Extractable Tin (Sn)	2021/07/02	<1.0		mg/kg	
			Acid Extractable Uranium (U)	2021/07/02	<0.10		mg/kg	
			Acid Extractable Vanadium (V)	2021/07/02	<2.0		mg/kg	
			Acid Extractable Zinc (Zn)	2021/07/02	<5.0		mg/kg	
7437988	BAN	RPD	Acid Extractable Aluminum (Al)	2021/07/02	6.5		%	35
			Acid Extractable Antimony (Sb)	2021/07/02	NC		%	35
			Acid Extractable Arsenic (As)	2021/07/02	12		%	35
			Acid Extractable Barium (Ba)	2021/07/02	30		%	35
			Acid Extractable Beryllium (Be)	2021/07/02	NC		%	35
			Acid Extractable Bismuth (Bi)	2021/07/02	NC		%	35
			Acid Extractable Boron (B)	2021/07/02	NC		%	35
			Acid Extractable Cadmium (Cd)	2021/07/02	NC		%	35
			Acid Extractable Chromium (Cr)	2021/07/02	19		%	35
			Acid Extractable Cobalt (Co)	2021/07/02	5.3		%	35
			Acid Extractable Copper (Cu)	2021/07/02	14		%	35
			Acid Extractable Iron (Fe)	2021/07/02	11		%	35
			Acid Extractable Lead (Pb)	2021/07/02	18		%	35
			Acid Extractable Lithium (Li)	2021/07/02	2.8		%	35
			Acid Extractable Manganese (Mn)	2021/07/02	6.1		%	35
			Acid Extractable Mercury (Hg)	2021/07/02	NC		%	35
			Acid Extractable Molybdenum (Mo)	2021/07/02	NC		%	35
			Acid Extractable Nickel (Ni)	2021/07/02	6.6		%	35
			Acid Extractable Rubidium (Rb)	2021/07/02	6.0		%	35
			Acid Extractable Selenium (Se)	2021/07/02	NC		%	35
			Acid Extractable Silver (Ag)	2021/07/02	NC		%	35
			Acid Extractable Strontium (Sr)	2021/07/02	11		%	35
			Acid Extractable Thallium (Tl)	2021/07/02	5.0		%	35
			Acid Extractable Tin (Sn)	2021/07/02	NC		%	35
			Acid Extractable Uranium (U)	2021/07/02	6.5		%	35
			Acid Extractable Vanadium (V)	2021/07/02	16		%	35
			Acid Extractable Zinc (Zn)	2021/07/02	16		%	35
7440667	BBD	QC Standard	Organic Carbon (TOC)	2021/07/02		111	%	75 - 125
7440667	BBD	Method Blank	Organic Carbon (TOC)	2021/07/02	<0.50		g/kg	
7440667	BBD	RPD [PXP279-01]	Organic Carbon (TOC)	2021/07/02	1.5		%	35
7440816	KKE	RPD [PXP334-01]	Moisture	2021/07/03	4.3		%	25
7440858	EMT	Matrix Spike [PXP276-01]	Chloride (Cl-)	2021/07/05		103	%	75 - 125
7440858	EMT	Spiked Blank	Chloride (Cl-)	2021/07/05		101	%	80 - 120
7440858	EMT	Method Blank	Chloride (Cl-)	2021/07/05	<5.0		mg/kg	
7440858	EMT	RPD [PXP276-01]	Chloride (Cl-)	2021/07/05	NC		%	30
7440860	EMT	Matrix Spike [PXP276-01]	Sulphate (SO4)	2021/07/05		114	%	75 - 125
7440860	EMT	Spiked Blank	Sulphate (SO4)	2021/07/05		106	%	80 - 120
7440860	EMT	Method Blank	Sulphate (SO4)	2021/07/05	11, RDL=10		mg/kg	
7440860	EMT	RPD [PXP276-01]	Sulphate (SO4)	2021/07/05	2.6 (1)		%	30
7440865	EMT	Matrix Spike [PXP276-01]	Orthophosphate (P)	2021/07/05		95	%	75 - 125
7440865	EMT	Spiked Blank	Orthophosphate (P)	2021/07/05		97	%	80 - 120
7440865	EMT	Method Blank	Orthophosphate (P)	2021/07/05	<0.050		mg/kg	
7440865	EMT	RPD [PXP276-01]	Orthophosphate (P)	2021/07/05	NC		%	30
7440867	EMT	Matrix Spike [PXP276-01]	Nitrate + Nitrite (N)	2021/07/05		86	%	75 - 125
7440867	EMT	Spiked Blank	Nitrate + Nitrite (N)	2021/07/05		92	%	80 - 120
7440867	EMT	Method Blank	Nitrate + Nitrite (N)	2021/07/05	<0.25		mg/kg	
7440867	EMT	RPD [PXP276-01]	Nitrate + Nitrite (N)	2021/07/05	2.7		%	30

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QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
7440868	EMT	Matrix Spike [PXP276-01]	Nitrite (N)	2021/07/05		88	%	75 - 125
7440868	EMT	Spiked Blank	Nitrite (N)	2021/07/05		94	%	80 - 120
7440868	EMT	Method Blank	Nitrite (N)	2021/07/05	<0.050		mg/kg	
7440868	EMT	RPD [PXP276-01]	Nitrite (N)	2021/07/05	NC		%	30
7441029	KKE	RPD [PXP356-01]	Moisture	2021/07/03	3.8		%	25
7441351	KKE	RPD [PXP320-01]	Moisture	2021/07/03	7.4		%	25
7443412	MLB	Matrix Spike [PXP287-01]	Acid Extractable Antimony (Sb)	2021/07/05		100	%	75 - 125
			Acid Extractable Arsenic (As)	2021/07/05		102	%	75 - 125
			Acid Extractable Barium (Ba)	2021/07/05		108	%	75 - 125
			Acid Extractable Beryllium (Be)	2021/07/05		102	%	75 - 125
			Acid Extractable Bismuth (Bi)	2021/07/05		103	%	75 - 125
			Acid Extractable Boron (B)	2021/07/05		93	%	75 - 125
			Acid Extractable Cadmium (Cd)	2021/07/05		102	%	75 - 125
			Acid Extractable Chromium (Cr)	2021/07/05		107	%	75 - 125
			Acid Extractable Cobalt (Co)	2021/07/05		105	%	75 - 125
			Acid Extractable Copper (Cu)	2021/07/05		108	%	75 - 125
			Acid Extractable Lead (Pb)	2021/07/05		103	%	75 - 125
			Acid Extractable Lithium (Li)	2021/07/05		104	%	75 - 125
			Acid Extractable Manganese (Mn)	2021/07/05		NC	%	75 - 125
			Acid Extractable Mercury (Hg)	2021/07/05		98	%	75 - 125
			Acid Extractable Molybdenum (Mo)	2021/07/05		105	%	75 - 125
			Acid Extractable Nickel (Ni)	2021/07/05		107	%	75 - 125
			Acid Extractable Rubidium (Rb)	2021/07/05		102	%	75 - 125
			Acid Extractable Selenium (Se)	2021/07/05		104	%	75 - 125
			Acid Extractable Silver (Ag)	2021/07/05		103	%	75 - 125
			Acid Extractable Strontium (Sr)	2021/07/05		104	%	75 - 125
			Acid Extractable Thallium (Tl)	2021/07/05		103	%	75 - 125
			Acid Extractable Tin (Sn)	2021/07/05		101	%	75 - 125
			Acid Extractable Uranium (U)	2021/07/05		105	%	75 - 125
			Acid Extractable Vanadium (V)	2021/07/05		109	%	75 - 125
			Acid Extractable Zinc (Zn)	2021/07/05		107	%	75 - 125
7443412	MLB	Spiked Blank	Acid Extractable Antimony (Sb)	2021/07/05		102	%	75 - 125
			Acid Extractable Arsenic (As)	2021/07/05		101	%	75 - 125
			Acid Extractable Barium (Ba)	2021/07/05		100	%	75 - 125
			Acid Extractable Beryllium (Be)	2021/07/05		103	%	75 - 125
			Acid Extractable Bismuth (Bi)	2021/07/05		99	%	75 - 125
			Acid Extractable Boron (B)	2021/07/05		103	%	75 - 125
			Acid Extractable Cadmium (Cd)	2021/07/05		101	%	75 - 125
			Acid Extractable Chromium (Cr)	2021/07/05		100	%	75 - 125
			Acid Extractable Cobalt (Co)	2021/07/05		102	%	75 - 125
			Acid Extractable Copper (Cu)	2021/07/05		102	%	75 - 125
			Acid Extractable Lead (Pb)	2021/07/05		99	%	75 - 125
			Acid Extractable Lithium (Li)	2021/07/05		101	%	75 - 125
			Acid Extractable Manganese (Mn)	2021/07/05		100	%	75 - 125
			Acid Extractable Mercury (Hg)	2021/07/05		101	%	75 - 125
			Acid Extractable Molybdenum (Mo)	2021/07/05		102	%	75 - 125
			Acid Extractable Nickel (Ni)	2021/07/05		102	%	75 - 125
			Acid Extractable Rubidium (Rb)	2021/07/05		97	%	75 - 125
			Acid Extractable Selenium (Se)	2021/07/05		106	%	75 - 125
			Acid Extractable Silver (Ag)	2021/07/05		100	%	75 - 125
			Acid Extractable Strontium (Sr)	2021/07/05		98	%	75 - 125
			Acid Extractable Thallium (Tl)	2021/07/05		101	%	75 - 125

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QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Acid Extractable Tin (Sn)	2021/07/05		103	%	75 - 125
			Acid Extractable Uranium (U)	2021/07/05		100	%	75 - 125
			Acid Extractable Vanadium (V)	2021/07/05		100	%	75 - 125
			Acid Extractable Zinc (Zn)	2021/07/05		100	%	75 - 125
7443412	MLB	Method Blank	Acid Extractable Aluminum (Al)	2021/07/05	<10		mg/kg	
			Acid Extractable Antimony (Sb)	2021/07/05	<2.0		mg/kg	
			Acid Extractable Arsenic (As)	2021/07/05	<2.0		mg/kg	
			Acid Extractable Barium (Ba)	2021/07/05	<5.0		mg/kg	
			Acid Extractable Beryllium (Be)	2021/07/05	<2.0		mg/kg	
			Acid Extractable Bismuth (Bi)	2021/07/05	<2.0		mg/kg	
			Acid Extractable Boron (B)	2021/07/05	<50		mg/kg	
			Acid Extractable Cadmium (Cd)	2021/07/05	<0.30		mg/kg	
			Acid Extractable Chromium (Cr)	2021/07/05	<2.0		mg/kg	
			Acid Extractable Cobalt (Co)	2021/07/05	<1.0		mg/kg	
			Acid Extractable Copper (Cu)	2021/07/05	<2.0		mg/kg	
			Acid Extractable Iron (Fe)	2021/07/05	<50		mg/kg	
			Acid Extractable Lead (Pb)	2021/07/05	<0.50		mg/kg	
			Acid Extractable Lithium (Li)	2021/07/05	<2.0		mg/kg	
			Acid Extractable Manganese (Mn)	2021/07/05	<2.0		mg/kg	
			Acid Extractable Mercury (Hg)	2021/07/05	<0.10		mg/kg	
			Acid Extractable Molybdenum (Mo)	2021/07/05	<2.0		mg/kg	
			Acid Extractable Nickel (Ni)	2021/07/05	<2.0		mg/kg	
			Acid Extractable Rubidium (Rb)	2021/07/05	<2.0		mg/kg	
			Acid Extractable Selenium (Se)	2021/07/05	<0.50		mg/kg	
			Acid Extractable Silver (Ag)	2021/07/05	<0.50		mg/kg	
			Acid Extractable Strontium (Sr)	2021/07/05	<5.0		mg/kg	
			Acid Extractable Thallium (Tl)	2021/07/05	<0.10		mg/kg	
			Acid Extractable Tin (Sn)	2021/07/05	<1.0		mg/kg	
			Acid Extractable Uranium (U)	2021/07/05	<0.10		mg/kg	
			Acid Extractable Vanadium (V)	2021/07/05	<2.0		mg/kg	
			Acid Extractable Zinc (Zn)	2021/07/05	<5.0		mg/kg	
7443412	MLB	RPD [PXP287-01]	Acid Extractable Aluminum (Al)	2021/07/05	3.5		%	35
			Acid Extractable Antimony (Sb)	2021/07/05	NC		%	35
			Acid Extractable Arsenic (As)	2021/07/05	1.2		%	35
			Acid Extractable Barium (Ba)	2021/07/05	0.41		%	35
			Acid Extractable Beryllium (Be)	2021/07/05	NC		%	35
			Acid Extractable Bismuth (Bi)	2021/07/05	NC		%	35
			Acid Extractable Boron (B)	2021/07/05	NC		%	35
			Acid Extractable Cadmium (Cd)	2021/07/05	NC		%	35
			Acid Extractable Chromium (Cr)	2021/07/05	7.1		%	35
			Acid Extractable Cobalt (Co)	2021/07/05	8.7		%	35
			Acid Extractable Copper (Cu)	2021/07/05	NC		%	35
			Acid Extractable Iron (Fe)	2021/07/05	4.8		%	35
			Acid Extractable Lead (Pb)	2021/07/05	5.2		%	35
			Acid Extractable Lithium (Li)	2021/07/05	5.9		%	35
			Acid Extractable Manganese (Mn)	2021/07/05	7.1		%	35
			Acid Extractable Mercury (Hg)	2021/07/05	NC		%	35
			Acid Extractable Molybdenum (Mo)	2021/07/05	NC		%	35
			Acid Extractable Nickel (Ni)	2021/07/05	6.6		%	35
			Acid Extractable Rubidium (Rb)	2021/07/05	2.3		%	35
			Acid Extractable Selenium (Se)	2021/07/05	NC		%	35
			Acid Extractable Silver (Ag)	2021/07/05	NC		%	35

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QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Acid Extractable Strontium (Sr)	2021/07/05	NC		%	35
			Acid Extractable Thallium (Tl)	2021/07/05	NC		%	35
			Acid Extractable Tin (Sn)	2021/07/05	NC		%	35
			Acid Extractable Uranium (U)	2021/07/05	3.2		%	35
			Acid Extractable Vanadium (V)	2021/07/05	3.8		%	35
			Acid Extractable Zinc (Zn)	2021/07/05	8.8		%	35
7444081	KLE	RPD [PXP279-01]	Gravel	2021/07/14	3.3		%	35
			Sand	2021/07/14	4.1		%	35
			Silt	2021/07/14	2.4		%	35
			Clay	2021/07/14	0.29		%	35
7444093	SSI	RPD [PXP295-01]	Conductivity	2021/07/05	1.9		%	20
7444104	SSI	RPD [PXP295-01]	Soluble (5:1) pH	2021/07/05	1.8		%	N/A
7445432	BBD	QC Standard	Organic Carbon (TOC)	2021/07/06		102	%	75 - 125
7445432	BBD	Method Blank	Organic Carbon (TOC)	2021/07/06	<0.50		g/kg	
7445432	BBD	RPD [PXP280-01]	Organic Carbon (TOC)	2021/07/06	4.9		%	35
7445460	BAN	Matrix Spike	Acid Extractable Antimony (Sb)	2021/07/06		106	%	75 - 125
			Acid Extractable Arsenic (As)	2021/07/06		103	%	75 - 125
			Acid Extractable Barium (Ba)	2021/07/06		102	%	75 - 125
			Acid Extractable Beryllium (Be)	2021/07/06		106	%	75 - 125
			Acid Extractable Bismuth (Bi)	2021/07/06		108	%	75 - 125
			Acid Extractable Boron (B)	2021/07/06		100	%	75 - 125
			Acid Extractable Cadmium (Cd)	2021/07/06		107	%	75 - 125
			Acid Extractable Chromium (Cr)	2021/07/06		101	%	75 - 125
			Acid Extractable Cobalt (Co)	2021/07/06		106	%	75 - 125
			Acid Extractable Copper (Cu)	2021/07/06		107	%	75 - 125
			Acid Extractable Lead (Pb)	2021/07/06		107	%	75 - 125
			Acid Extractable Lithium (Li)	2021/07/06		112	%	75 - 125
			Acid Extractable Manganese (Mn)	2021/07/06		NC	%	75 - 125
			Acid Extractable Mercury (Hg)	2021/07/06		102	%	75 - 125
			Acid Extractable Molybdenum (Mo)	2021/07/06		102	%	75 - 125
			Acid Extractable Nickel (Ni)	2021/07/06		106	%	75 - 125
			Acid Extractable Rubidium (Rb)	2021/07/06		101	%	75 - 125
			Acid Extractable Selenium (Se)	2021/07/06		101	%	75 - 125
			Acid Extractable Silver (Ag)	2021/07/06		105	%	75 - 125
			Acid Extractable Strontium (Sr)	2021/07/06		102	%	75 - 125
			Acid Extractable Thallium (Tl)	2021/07/06		108	%	75 - 125
			Acid Extractable Tin (Sn)	2021/07/06		102	%	75 - 125
			Acid Extractable Uranium (U)	2021/07/06		107	%	75 - 125
			Acid Extractable Vanadium (V)	2021/07/06		97	%	75 - 125
			Acid Extractable Zinc (Zn)	2021/07/06		NC	%	75 - 125
7445460	BAN	Spiked Blank	Acid Extractable Antimony (Sb)	2021/07/06		110	%	75 - 125
			Acid Extractable Arsenic (As)	2021/07/06		105	%	75 - 125
			Acid Extractable Barium (Ba)	2021/07/06		103	%	75 - 125
			Acid Extractable Beryllium (Be)	2021/07/06		102	%	75 - 125
			Acid Extractable Bismuth (Bi)	2021/07/06		103	%	75 - 125
			Acid Extractable Boron (B)	2021/07/06		106	%	75 - 125
			Acid Extractable Cadmium (Cd)	2021/07/06		103	%	75 - 125
			Acid Extractable Chromium (Cr)	2021/07/06		103	%	75 - 125
			Acid Extractable Cobalt (Co)	2021/07/06		103	%	75 - 125
			Acid Extractable Copper (Cu)	2021/07/06		106	%	75 - 125
			Acid Extractable Lead (Pb)	2021/07/06		103	%	75 - 125
			Acid Extractable Lithium (Li)	2021/07/06		108	%	75 - 125

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QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Acid Extractable Manganese (Mn)	2021/07/06		104	%	75 - 125
			Acid Extractable Mercury (Hg)	2021/07/06		107	%	75 - 125
			Acid Extractable Molybdenum (Mo)	2021/07/06		106	%	75 - 125
			Acid Extractable Nickel (Ni)	2021/07/06		104	%	75 - 125
			Acid Extractable Rubidium (Rb)	2021/07/06		102	%	75 - 125
			Acid Extractable Selenium (Se)	2021/07/06		107	%	75 - 125
			Acid Extractable Silver (Ag)	2021/07/06		102	%	75 - 125
			Acid Extractable Strontium (Sr)	2021/07/06		104	%	75 - 125
			Acid Extractable Thallium (Tl)	2021/07/06		104	%	75 - 125
			Acid Extractable Tin (Sn)	2021/07/06		105	%	75 - 125
			Acid Extractable Uranium (U)	2021/07/06		104	%	75 - 125
			Acid Extractable Vanadium (V)	2021/07/06		101	%	75 - 125
			Acid Extractable Zinc (Zn)	2021/07/06		102	%	75 - 125
7445460	BAN	Method Blank	Acid Extractable Aluminum (Al)	2021/07/06	<10		mg/kg	
			Acid Extractable Antimony (Sb)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Arsenic (As)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Barium (Ba)	2021/07/06	<5.0		mg/kg	
			Acid Extractable Beryllium (Be)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Bismuth (Bi)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Boron (B)	2021/07/06	<50		mg/kg	
			Acid Extractable Cadmium (Cd)	2021/07/06	<0.30		mg/kg	
			Acid Extractable Chromium (Cr)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Cobalt (Co)	2021/07/06	<1.0		mg/kg	
			Acid Extractable Copper (Cu)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Iron (Fe)	2021/07/06	<50		mg/kg	
			Acid Extractable Lead (Pb)	2021/07/06	<0.50		mg/kg	
			Acid Extractable Lithium (Li)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Manganese (Mn)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Mercury (Hg)	2021/07/06	<0.10		mg/kg	
			Acid Extractable Molybdenum (Mo)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Nickel (Ni)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Rubidium (Rb)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Selenium (Se)	2021/07/06	<0.50		mg/kg	
			Acid Extractable Silver (Ag)	2021/07/06	<0.50		mg/kg	
			Acid Extractable Strontium (Sr)	2021/07/06	<5.0		mg/kg	
			Acid Extractable Thallium (Tl)	2021/07/06	<0.10		mg/kg	
			Acid Extractable Tin (Sn)	2021/07/06	<1.0		mg/kg	
			Acid Extractable Uranium (U)	2021/07/06	<0.10		mg/kg	
			Acid Extractable Vanadium (V)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Zinc (Zn)	2021/07/06	<5.0		mg/kg	
7445460	BAN	RPD	Acid Extractable Aluminum (Al)	2021/07/06	2.8		%	35
			Acid Extractable Antimony (Sb)	2021/07/06	NC		%	35
			Acid Extractable Arsenic (As)	2021/07/06	8.5		%	35
			Acid Extractable Barium (Ba)	2021/07/06	2.4		%	35
			Acid Extractable Beryllium (Be)	2021/07/06	NC		%	35
			Acid Extractable Bismuth (Bi)	2021/07/06	NC		%	35
			Acid Extractable Boron (B)	2021/07/06	NC		%	35
			Acid Extractable Cadmium (Cd)	2021/07/06	NC		%	35
			Acid Extractable Chromium (Cr)	2021/07/06	5.5		%	35
			Acid Extractable Cobalt (Co)	2021/07/06	4.4		%	35
			Acid Extractable Copper (Cu)	2021/07/06	16		%	35
			Acid Extractable Iron (Fe)	2021/07/06	3.3		%	35

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QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Acid Extractable Lead (Pb)	2021/07/06	2.6		%	35
			Acid Extractable Lithium (Li)	2021/07/06	0.31		%	35
			Acid Extractable Manganese (Mn)	2021/07/06	2.7		%	35
			Acid Extractable Mercury (Hg)	2021/07/06	NC		%	35
			Acid Extractable Molybdenum (Mo)	2021/07/06	NC		%	35
			Acid Extractable Nickel (Ni)	2021/07/06	24		%	35
			Acid Extractable Rubidium (Rb)	2021/07/06	3.7		%	35
			Acid Extractable Selenium (Se)	2021/07/06	NC		%	35
			Acid Extractable Silver (Ag)	2021/07/06	NC		%	35
			Acid Extractable Strontium (Sr)	2021/07/06	17		%	35
			Acid Extractable Thallium (Tl)	2021/07/06	NC		%	35
			Acid Extractable Tin (Sn)	2021/07/06	NC		%	35
			Acid Extractable Uranium (U)	2021/07/06	9.9		%	35
			Acid Extractable Vanadium (V)	2021/07/06	1.1		%	35
			Acid Extractable Zinc (Zn)	2021/07/06	0.91		%	35
7445462	MLB	Matrix Spike [PXP340-01]	Acid Extractable Antimony (Sb)	2021/07/07		NC	%	75 - 125
			Acid Extractable Arsenic (As)	2021/07/07		NC	%	75 - 125
			Acid Extractable Barium (Ba)	2021/07/07		103	%	75 - 125
			Acid Extractable Beryllium (Be)	2021/07/07		94	%	75 - 125
			Acid Extractable Bismuth (Bi)	2021/07/07		104	%	75 - 125
			Acid Extractable Boron (B)	2021/07/07		92	%	75 - 125
			Acid Extractable Cadmium (Cd)	2021/07/07		100	%	75 - 125
			Acid Extractable Chromium (Cr)	2021/07/07		99	%	75 - 125
			Acid Extractable Cobalt (Co)	2021/07/07		100	%	75 - 125
			Acid Extractable Copper (Cu)	2021/07/07		100	%	75 - 125
			Acid Extractable Lead (Pb)	2021/07/07		NC	%	75 - 125
			Acid Extractable Lithium (Li)	2021/07/07		100	%	75 - 125
			Acid Extractable Manganese (Mn)	2021/07/07		NC	%	75 - 125
			Acid Extractable Mercury (Hg)	2021/07/07		NC	%	75 - 125
			Acid Extractable Molybdenum (Mo)	2021/07/07		102	%	75 - 125
			Acid Extractable Nickel (Ni)	2021/07/07		100	%	75 - 125
			Acid Extractable Rubidium (Rb)	2021/07/07		99	%	75 - 125
			Acid Extractable Selenium (Se)	2021/07/07		102	%	75 - 125
			Acid Extractable Silver (Ag)	2021/07/07		98	%	75 - 125
			Acid Extractable Strontium (Sr)	2021/07/07		102	%	75 - 125
			Acid Extractable Thallium (Tl)	2021/07/07		105	%	75 - 125
			Acid Extractable Tin (Sn)	2021/07/07		101	%	75 - 125
			Acid Extractable Uranium (U)	2021/07/07		105	%	75 - 125
			Acid Extractable Vanadium (V)	2021/07/07		101	%	75 - 125
			Acid Extractable Zinc (Zn)	2021/07/07		97	%	75 - 125
7445462	MLB	Spiked Blank	Acid Extractable Antimony (Sb)	2021/07/06		100	%	75 - 125
			Acid Extractable Arsenic (As)	2021/07/06		99	%	75 - 125
			Acid Extractable Barium (Ba)	2021/07/06		95	%	75 - 125
			Acid Extractable Beryllium (Be)	2021/07/06		90	%	75 - 125
			Acid Extractable Bismuth (Bi)	2021/07/06		97	%	75 - 125
			Acid Extractable Boron (B)	2021/07/06		94	%	75 - 125
			Acid Extractable Cadmium (Cd)	2021/07/06		95	%	75 - 125
			Acid Extractable Chromium (Cr)	2021/07/06		97	%	75 - 125
			Acid Extractable Cobalt (Co)	2021/07/06		97	%	75 - 125
			Acid Extractable Copper (Cu)	2021/07/06		97	%	75 - 125
			Acid Extractable Lead (Pb)	2021/07/06		97	%	75 - 125
			Acid Extractable Lithium (Li)	2021/07/06		96	%	75 - 125

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QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Acid Extractable Manganese (Mn)	2021/07/06		98	%	75 - 125
			Acid Extractable Mercury (Hg)	2021/07/06		97	%	75 - 125
			Acid Extractable Molybdenum (Mo)	2021/07/06		97	%	75 - 125
			Acid Extractable Nickel (Ni)	2021/07/06		97	%	75 - 125
			Acid Extractable Rubidium (Rb)	2021/07/06		94	%	75 - 125
			Acid Extractable Selenium (Se)	2021/07/06		100	%	75 - 125
			Acid Extractable Silver (Ag)	2021/07/06		96	%	75 - 125
			Acid Extractable Strontium (Sr)	2021/07/06		96	%	75 - 125
			Acid Extractable Thallium (Tl)	2021/07/06		98	%	75 - 125
			Acid Extractable Tin (Sn)	2021/07/06		96	%	75 - 125
			Acid Extractable Uranium (U)	2021/07/06		94	%	75 - 125
			Acid Extractable Vanadium (V)	2021/07/06		96	%	75 - 125
			Acid Extractable Zinc (Zn)	2021/07/06		95	%	75 - 125
7445462	MLB	Method Blank	Acid Extractable Aluminum (Al)	2021/07/06	<10		mg/kg	
			Acid Extractable Antimony (Sb)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Arsenic (As)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Barium (Ba)	2021/07/06	<5.0		mg/kg	
			Acid Extractable Beryllium (Be)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Bismuth (Bi)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Boron (B)	2021/07/06	<50		mg/kg	
			Acid Extractable Cadmium (Cd)	2021/07/06	<0.30		mg/kg	
			Acid Extractable Chromium (Cr)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Cobalt (Co)	2021/07/06	<1.0		mg/kg	
			Acid Extractable Copper (Cu)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Iron (Fe)	2021/07/06	<50		mg/kg	
			Acid Extractable Lead (Pb)	2021/07/06	<0.50		mg/kg	
			Acid Extractable Lithium (Li)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Manganese (Mn)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Mercury (Hg)	2021/07/06	<0.10		mg/kg	
			Acid Extractable Molybdenum (Mo)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Nickel (Ni)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Rubidium (Rb)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Selenium (Se)	2021/07/06	<0.50		mg/kg	
			Acid Extractable Silver (Ag)	2021/07/06	<0.50		mg/kg	
			Acid Extractable Strontium (Sr)	2021/07/06	<5.0		mg/kg	
			Acid Extractable Thallium (Tl)	2021/07/06	<0.10		mg/kg	
			Acid Extractable Tin (Sn)	2021/07/06	<1.0		mg/kg	
			Acid Extractable Uranium (U)	2021/07/06	<0.10		mg/kg	
			Acid Extractable Vanadium (V)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Zinc (Zn)	2021/07/06	<5.0		mg/kg	
7445462	MLB	RPD [PXP340-01]	Acid Extractable Aluminum (Al)	2021/07/07	2.7		%	35
			Acid Extractable Antimony (Sb)	2021/07/07	1.4		%	35
			Acid Extractable Arsenic (As)	2021/07/07	5.3		%	35
			Acid Extractable Barium (Ba)	2021/07/07	0.83		%	35
			Acid Extractable Beryllium (Be)	2021/07/07	NC		%	35
			Acid Extractable Bismuth (Bi)	2021/07/07	NC		%	35
			Acid Extractable Boron (B)	2021/07/07	NC		%	35
			Acid Extractable Cadmium (Cd)	2021/07/07	NC		%	35
			Acid Extractable Chromium (Cr)	2021/07/07	0.48		%	35
			Acid Extractable Cobalt (Co)	2021/07/07	0.26		%	35
			Acid Extractable Copper (Cu)	2021/07/07	3.7		%	35
			Acid Extractable Iron (Fe)	2021/07/07	2.9		%	35

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QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Acid Extractable Lead (Pb)	2021/07/07	4.4		%	35
			Acid Extractable Lithium (Li)	2021/07/07	3.0		%	35
			Acid Extractable Manganese (Mn)	2021/07/07	0.31		%	35
			Acid Extractable Mercury (Hg)	2021/07/07	2.9		%	35
			Acid Extractable Molybdenum (Mo)	2021/07/07	NC		%	35
			Acid Extractable Nickel (Ni)	2021/07/07	0.34		%	35
			Acid Extractable Rubidium (Rb)	2021/07/07	1.4		%	35
			Acid Extractable Selenium (Se)	2021/07/07	NC		%	35
			Acid Extractable Silver (Ag)	2021/07/07	14		%	35
			Acid Extractable Strontium (Sr)	2021/07/07	6.0		%	35
			Acid Extractable Thallium (Tl)	2021/07/07	0.78		%	35
			Acid Extractable Tin (Sn)	2021/07/07	NC		%	35
			Acid Extractable Uranium (U)	2021/07/07	4.7		%	35
			Acid Extractable Vanadium (V)	2021/07/07	0.66		%	35
			Acid Extractable Zinc (Zn)	2021/07/07	6.4		%	35
7445697	EMT	Matrix Spike [PXP295-01]	Chloride (Cl-)	2021/07/06		99	%	75 - 125
7445697	EMT	Spiked Blank	Chloride (Cl-)	2021/07/06		102	%	80 - 120
7445697	EMT	Method Blank	Chloride (Cl-)	2021/07/06	<5.0		mg/kg	
7445697	EMT	RPD [PXP295-01]	Chloride (Cl-)	2021/07/06	25		%	30
7445708	EMT	Matrix Spike [PXP295-01]	Sulphate (SO4)	2021/07/06		111	%	75 - 125
7445708	EMT	Spiked Blank	Sulphate (SO4)	2021/07/06		106	%	80 - 120
7445708	EMT	Method Blank	Sulphate (SO4)	2021/07/06	<10		mg/kg	
7445708	EMT	RPD [PXP295-01]	Sulphate (SO4)	2021/07/06	NC		%	30
7445711	EMT	Matrix Spike [PXP295-01]	Orthophosphate (P)	2021/07/06		NC	%	75 - 125
7445711	EMT	Spiked Blank	Orthophosphate (P)	2021/07/06		97	%	80 - 120
7445711	EMT	Method Blank	Orthophosphate (P)	2021/07/06	<0.050		mg/kg	
7445711	EMT	RPD [PXP295-01]	Orthophosphate (P)	2021/07/06	5.1		%	30
7445714	EMT	Matrix Spike [PXP295-01]	Nitrate + Nitrite (N)	2021/07/06		86	%	75 - 125
7445714	EMT	Spiked Blank	Nitrate + Nitrite (N)	2021/07/06		88	%	80 - 120
7445714	EMT	Method Blank	Nitrate + Nitrite (N)	2021/07/06	<0.25		mg/kg	
7445714	EMT	RPD [PXP295-01]	Nitrate + Nitrite (N)	2021/07/06	NC		%	30
7445715	EMT	Matrix Spike [PXP295-01]	Nitrite (N)	2021/07/06		93	%	75 - 125
7445715	EMT	Spiked Blank	Nitrite (N)	2021/07/06		100	%	80 - 120
7445715	EMT	Method Blank	Nitrite (N)	2021/07/06	<0.050		mg/kg	
7445715	EMT	RPD [PXP295-01]	Nitrite (N)	2021/07/06	NC		%	30
7445881	AHK	QC Standard	Total Sulphur (S)	2021/07/05		94	%	77 - 128
7445881	AHK	Method Blank	Total Sulphur (S)	2021/07/05	<0.010		% g/g	
7445881	AHK	RPD [PXP280-03]	Total Sulphur (S)	2021/07/05	0.26		%	30
7446049	MLB	Matrix Spike [PXP344-01]	Acid Extractable Antimony (Sb)	2021/07/07		NC	%	75 - 125
			Acid Extractable Arsenic (As)	2021/07/07		NC	%	75 - 125
			Acid Extractable Barium (Ba)	2021/07/07		120	%	75 - 125
			Acid Extractable Beryllium (Be)	2021/07/07		97	%	75 - 125
			Acid Extractable Bismuth (Bi)	2021/07/07		110	%	75 - 125
			Acid Extractable Boron (B)	2021/07/07		93	%	75 - 125
			Acid Extractable Cadmium (Cd)	2021/07/07		104	%	75 - 125
			Acid Extractable Chromium (Cr)	2021/07/07		104	%	75 - 125
			Acid Extractable Cobalt (Co)	2021/07/07		104	%	75 - 125
			Acid Extractable Copper (Cu)	2021/07/07		109	%	75 - 125
			Acid Extractable Lead (Pb)	2021/07/07		NC	%	75 - 125
			Acid Extractable Lithium (Li)	2021/07/07		104	%	75 - 125
			Acid Extractable Manganese (Mn)	2021/07/07		NC	%	75 - 125
			Acid Extractable Mercury (Hg)	2021/07/07		84	%	75 - 125

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QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Acid Extractable Molybdenum (Mo)	2021/07/07		107	%	75 - 125
			Acid Extractable Nickel (Ni)	2021/07/07		104	%	75 - 125
			Acid Extractable Rubidium (Rb)	2021/07/07		104	%	75 - 125
			Acid Extractable Selenium (Se)	2021/07/07		107	%	75 - 125
			Acid Extractable Silver (Ag)	2021/07/07		110	%	75 - 125
			Acid Extractable Strontium (Sr)	2021/07/07		109	%	75 - 125
			Acid Extractable Thallium (Tl)	2021/07/07		108	%	75 - 125
			Acid Extractable Tin (Sn)	2021/07/07		108	%	75 - 125
			Acid Extractable Uranium (U)	2021/07/07		113	%	75 - 125
			Acid Extractable Vanadium (V)	2021/07/07		107	%	75 - 125
			Acid Extractable Zinc (Zn)	2021/07/07		107	%	75 - 125
7446049	MLB	Spiked Blank	Acid Extractable Antimony (Sb)	2021/07/06		105	%	75 - 125
			Acid Extractable Arsenic (As)	2021/07/06		100	%	75 - 125
			Acid Extractable Barium (Ba)	2021/07/06		97	%	75 - 125
			Acid Extractable Beryllium (Be)	2021/07/06		92	%	75 - 125
			Acid Extractable Bismuth (Bi)	2021/07/06		99	%	75 - 125
			Acid Extractable Boron (B)	2021/07/06		95	%	75 - 125
			Acid Extractable Cadmium (Cd)	2021/07/06		97	%	75 - 125
			Acid Extractable Chromium (Cr)	2021/07/06		98	%	75 - 125
			Acid Extractable Cobalt (Co)	2021/07/06		99	%	75 - 125
			Acid Extractable Copper (Cu)	2021/07/06		98	%	75 - 125
			Acid Extractable Lead (Pb)	2021/07/06		99	%	75 - 125
			Acid Extractable Lithium (Li)	2021/07/06		100	%	75 - 125
			Acid Extractable Manganese (Mn)	2021/07/06		100	%	75 - 125
			Acid Extractable Mercury (Hg)	2021/07/06		100	%	75 - 125
			Acid Extractable Molybdenum (Mo)	2021/07/06		102	%	75 - 125
			Acid Extractable Nickel (Ni)	2021/07/06		99	%	75 - 125
			Acid Extractable Rubidium (Rb)	2021/07/06		95	%	75 - 125
			Acid Extractable Selenium (Se)	2021/07/06		102	%	75 - 125
			Acid Extractable Silver (Ag)	2021/07/06		98	%	75 - 125
			Acid Extractable Strontium (Sr)	2021/07/06		100	%	75 - 125
			Acid Extractable Thallium (Tl)	2021/07/06		101	%	75 - 125
			Acid Extractable Tin (Sn)	2021/07/06		102	%	75 - 125
			Acid Extractable Uranium (U)	2021/07/06		98	%	75 - 125
			Acid Extractable Vanadium (V)	2021/07/06		98	%	75 - 125
			Acid Extractable Zinc (Zn)	2021/07/06		101	%	75 - 125
7446049	MLB	Method Blank	Acid Extractable Aluminum (Al)	2021/07/06	<10		mg/kg	
			Acid Extractable Antimony (Sb)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Arsenic (As)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Barium (Ba)	2021/07/06	<5.0		mg/kg	
			Acid Extractable Beryllium (Be)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Bismuth (Bi)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Boron (B)	2021/07/06	<50		mg/kg	
			Acid Extractable Cadmium (Cd)	2021/07/06	<0.30		mg/kg	
			Acid Extractable Chromium (Cr)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Cobalt (Co)	2021/07/06	<1.0		mg/kg	
			Acid Extractable Copper (Cu)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Iron (Fe)	2021/07/06	<50		mg/kg	
			Acid Extractable Lead (Pb)	2021/07/06	<0.50		mg/kg	
			Acid Extractable Lithium (Li)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Manganese (Mn)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Mercury (Hg)	2021/07/06	<0.10		mg/kg	

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QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Acid Extractable Molybdenum (Mo)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Nickel (Ni)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Rubidium (Rb)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Selenium (Se)	2021/07/06	<0.50		mg/kg	
			Acid Extractable Silver (Ag)	2021/07/06	<0.50		mg/kg	
			Acid Extractable Strontium (Sr)	2021/07/06	<5.0		mg/kg	
			Acid Extractable Thallium (Tl)	2021/07/06	<0.10		mg/kg	
			Acid Extractable Tin (Sn)	2021/07/06	<1.0		mg/kg	
			Acid Extractable Uranium (U)	2021/07/06	<0.10		mg/kg	
			Acid Extractable Vanadium (V)	2021/07/06	<2.0		mg/kg	
			Acid Extractable Zinc (Zn)	2021/07/06	<5.0		mg/kg	
7446049	MLB	RPD [PXP344-01]	Acid Extractable Aluminum (Al)	2021/07/07	0.37		%	35
			Acid Extractable Antimony (Sb)	2021/07/07	12		%	35
			Acid Extractable Arsenic (As)	2021/07/07	9.7		%	35
			Acid Extractable Barium (Ba)	2021/07/07	3.3		%	35
			Acid Extractable Beryllium (Be)	2021/07/07	NC		%	35
			Acid Extractable Bismuth (Bi)	2021/07/07	NC		%	35
			Acid Extractable Boron (B)	2021/07/07	NC		%	35
			Acid Extractable Cadmium (Cd)	2021/07/07	NC		%	35
			Acid Extractable Chromium (Cr)	2021/07/07	3.1		%	35
			Acid Extractable Cobalt (Co)	2021/07/07	1.8		%	35
			Acid Extractable Copper (Cu)	2021/07/07	4.3		%	35
			Acid Extractable Iron (Fe)	2021/07/07	7.5		%	35
			Acid Extractable Lead (Pb)	2021/07/07	6.5		%	35
			Acid Extractable Lithium (Li)	2021/07/07	1.2		%	35
			Acid Extractable Manganese (Mn)	2021/07/07	1.3		%	35
			Acid Extractable Mercury (Hg)	2021/07/07	26		%	35
			Acid Extractable Molybdenum (Mo)	2021/07/07	NC		%	35
			Acid Extractable Nickel (Ni)	2021/07/07	0.15		%	35
			Acid Extractable Rubidium (Rb)	2021/07/07	6.2		%	35
			Acid Extractable Selenium (Se)	2021/07/07	3.3		%	35
			Acid Extractable Silver (Ag)	2021/07/07	31		%	35
			Acid Extractable Strontium (Sr)	2021/07/07	11		%	35
			Acid Extractable Thallium (Tl)	2021/07/07	9.5		%	35
			Acid Extractable Tin (Sn)	2021/07/07	3.7		%	35
			Acid Extractable Uranium (U)	2021/07/07	9.8		%	35
			Acid Extractable Vanadium (V)	2021/07/07	0.77		%	35
			Acid Extractable Zinc (Zn)	2021/07/07	2.5		%	35
7446056	BAN	Matrix Spike	Acid Extractable Antimony (Sb)	2021/07/07		90	%	75 - 125
			Acid Extractable Arsenic (As)	2021/07/07		98	%	75 - 125
			Acid Extractable Barium (Ba)	2021/07/07		NC	%	75 - 125
			Acid Extractable Beryllium (Be)	2021/07/07		100	%	75 - 125
			Acid Extractable Bismuth (Bi)	2021/07/07		99	%	75 - 125
			Acid Extractable Boron (B)	2021/07/07		93	%	75 - 125
			Acid Extractable Cadmium (Cd)	2021/07/07		96	%	75 - 125
			Acid Extractable Chromium (Cr)	2021/07/07		102	%	75 - 125
			Acid Extractable Cobalt (Co)	2021/07/07		99	%	75 - 125
			Acid Extractable Copper (Cu)	2021/07/07		100	%	75 - 125
			Acid Extractable Lead (Pb)	2021/07/07		98	%	75 - 125
			Acid Extractable Lithium (Li)	2021/07/07		109	%	75 - 125
			Acid Extractable Manganese (Mn)	2021/07/07		NC	%	75 - 125
			Acid Extractable Mercury (Hg)	2021/07/07		95	%	75 - 125

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QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Acid Extractable Molybdenum (Mo)	2021/07/07		99	%	75 - 125
			Acid Extractable Nickel (Ni)	2021/07/07		99	%	75 - 125
			Acid Extractable Rubidium (Rb)	2021/07/07		96	%	75 - 125
			Acid Extractable Selenium (Se)	2021/07/07		100	%	75 - 125
			Acid Extractable Silver (Ag)	2021/07/07		100	%	75 - 125
			Acid Extractable Strontium (Sr)	2021/07/07		103	%	75 - 125
			Acid Extractable Thallium (Tl)	2021/07/07		99	%	75 - 125
			Acid Extractable Tin (Sn)	2021/07/07		101	%	75 - 125
			Acid Extractable Uranium (U)	2021/07/07		98	%	75 - 125
			Acid Extractable Vanadium (V)	2021/07/07		103	%	75 - 125
			Acid Extractable Zinc (Zn)	2021/07/07		NC	%	75 - 125
7446056	BAN	Spiked Blank	Acid Extractable Antimony (Sb)	2021/07/07		99	%	75 - 125
			Acid Extractable Arsenic (As)	2021/07/07		100	%	75 - 125
			Acid Extractable Barium (Ba)	2021/07/07		98	%	75 - 125
			Acid Extractable Beryllium (Be)	2021/07/07		95	%	75 - 125
			Acid Extractable Bismuth (Bi)	2021/07/07		99	%	75 - 125
			Acid Extractable Boron (B)	2021/07/07		95	%	75 - 125
			Acid Extractable Cadmium (Cd)	2021/07/07		94	%	75 - 125
			Acid Extractable Chromium (Cr)	2021/07/07		100	%	75 - 125
			Acid Extractable Cobalt (Co)	2021/07/07		100	%	75 - 125
			Acid Extractable Copper (Cu)	2021/07/07		100	%	75 - 125
			Acid Extractable Lead (Pb)	2021/07/07		98	%	75 - 125
			Acid Extractable Lithium (Li)	2021/07/07		99	%	75 - 125
			Acid Extractable Manganese (Mn)	2021/07/07		102	%	75 - 125
			Acid Extractable Mercury (Hg)	2021/07/07		98	%	75 - 125
			Acid Extractable Molybdenum (Mo)	2021/07/07		99	%	75 - 125
			Acid Extractable Nickel (Ni)	2021/07/07		101	%	75 - 125
			Acid Extractable Rubidium (Rb)	2021/07/07		98	%	75 - 125
			Acid Extractable Selenium (Se)	2021/07/07		101	%	75 - 125
			Acid Extractable Silver (Ag)	2021/07/07		99	%	75 - 125
			Acid Extractable Strontium (Sr)	2021/07/07		97	%	75 - 125
			Acid Extractable Thallium (Tl)	2021/07/07		99	%	75 - 125
			Acid Extractable Tin (Sn)	2021/07/07		97	%	75 - 125
			Acid Extractable Uranium (U)	2021/07/07		97	%	75 - 125
			Acid Extractable Vanadium (V)	2021/07/07		100	%	75 - 125
			Acid Extractable Zinc (Zn)	2021/07/07		101	%	75 - 125
7446056	BAN	Method Blank	Acid Extractable Aluminum (Al)	2021/07/07	<10		mg/kg	
			Acid Extractable Antimony (Sb)	2021/07/07	<2.0		mg/kg	
			Acid Extractable Arsenic (As)	2021/07/07	<2.0		mg/kg	
			Acid Extractable Barium (Ba)	2021/07/07	<5.0		mg/kg	
			Acid Extractable Beryllium (Be)	2021/07/07	<2.0		mg/kg	
			Acid Extractable Bismuth (Bi)	2021/07/07	<2.0		mg/kg	
			Acid Extractable Boron (B)	2021/07/07	<50		mg/kg	
			Acid Extractable Cadmium (Cd)	2021/07/07	<0.30		mg/kg	
			Acid Extractable Chromium (Cr)	2021/07/07	<2.0		mg/kg	
			Acid Extractable Cobalt (Co)	2021/07/07	<1.0		mg/kg	
			Acid Extractable Copper (Cu)	2021/07/07	<2.0		mg/kg	
			Acid Extractable Iron (Fe)	2021/07/07	<50		mg/kg	
			Acid Extractable Lead (Pb)	2021/07/07	<0.50		mg/kg	
			Acid Extractable Lithium (Li)	2021/07/07	<2.0		mg/kg	
			Acid Extractable Manganese (Mn)	2021/07/07	<2.0		mg/kg	
			Acid Extractable Mercury (Hg)	2021/07/07	<0.10		mg/kg	

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QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Acid Extractable Molybdenum (Mo)	2021/07/07	<2.0		mg/kg	
			Acid Extractable Nickel (Ni)	2021/07/07	<2.0		mg/kg	
			Acid Extractable Rubidium (Rb)	2021/07/07	<2.0		mg/kg	
			Acid Extractable Selenium (Se)	2021/07/07	<0.50		mg/kg	
			Acid Extractable Silver (Ag)	2021/07/07	<0.50		mg/kg	
			Acid Extractable Strontium (Sr)	2021/07/07	<5.0		mg/kg	
			Acid Extractable Thallium (Tl)	2021/07/07	<0.10		mg/kg	
			Acid Extractable Tin (Sn)	2021/07/07	<1.0		mg/kg	
			Acid Extractable Uranium (U)	2021/07/07	<0.10		mg/kg	
			Acid Extractable Vanadium (V)	2021/07/07	<2.0		mg/kg	
			Acid Extractable Zinc (Zn)	2021/07/07	<5.0		mg/kg	
7446056	BAN	RPD	Acid Extractable Aluminum (Al)	2021/07/07	0.47		%	35
			Acid Extractable Antimony (Sb)	2021/07/07	NC		%	35
			Acid Extractable Arsenic (As)	2021/07/07	5.3		%	35
			Acid Extractable Barium (Ba)	2021/07/07	2.5		%	35
			Acid Extractable Beryllium (Be)	2021/07/07	NC		%	35
			Acid Extractable Bismuth (Bi)	2021/07/07	NC		%	35
			Acid Extractable Boron (B)	2021/07/07	NC		%	35
			Acid Extractable Cadmium (Cd)	2021/07/07	NC		%	35
			Acid Extractable Chromium (Cr)	2021/07/07	2.2		%	35
			Acid Extractable Cobalt (Co)	2021/07/07	0.29		%	35
			Acid Extractable Copper (Cu)	2021/07/07	1.8		%	35
			Acid Extractable Iron (Fe)	2021/07/07	1.0		%	35
			Acid Extractable Lead (Pb)	2021/07/07	2.0		%	35
			Acid Extractable Lithium (Li)	2021/07/07	0.46		%	35
			Acid Extractable Manganese (Mn)	2021/07/07	1.9		%	35
			Acid Extractable Mercury (Hg)	2021/07/07	NC		%	35
			Acid Extractable Molybdenum (Mo)	2021/07/07	NC		%	35
			Acid Extractable Nickel (Ni)	2021/07/07	1.8		%	35
			Acid Extractable Rubidium (Rb)	2021/07/07	3.5		%	35
			Acid Extractable Selenium (Se)	2021/07/07	NC		%	35
			Acid Extractable Silver (Ag)	2021/07/07	NC		%	35
			Acid Extractable Strontium (Sr)	2021/07/07	0.94		%	35
			Acid Extractable Thallium (Tl)	2021/07/07	0.11		%	35
			Acid Extractable Tin (Sn)	2021/07/07	NC		%	35
			Acid Extractable Uranium (U)	2021/07/07	0.77		%	35
			Acid Extractable Vanadium (V)	2021/07/07	0.63		%	35
			Acid Extractable Zinc (Zn)	2021/07/07	0.12		%	35
7446423	EMT	Matrix Spike [PXP276-01]	Ammonia-N	2021/07/07		83	%	75 - 125
7446423	EMT	Spiked Blank	Ammonia-N	2021/07/07		105	%	80 - 120
7446423	EMT	Method Blank	Ammonia-N	2021/07/07	<1.3		mg/kg	
7446423	EMT	RPD [PXP276-01]	Ammonia-N	2021/07/07	NC		%	30
7446574	EMT	Matrix Spike [PXP308-01]	Ammonia-N	2021/07/07		85	%	75 - 125
7446574	EMT	Spiked Blank	Ammonia-N	2021/07/07		102	%	80 - 120
7446574	EMT	Method Blank	Ammonia-N	2021/07/07	<1.3		mg/kg	
7446574	EMT	RPD [PXP308-01]	Ammonia-N	2021/07/07	NC		%	30
7446594	EMT	Matrix Spike [PXP341-01]	Ammonia-N	2021/07/07		56 (2)	%	75 - 125
7446594	EMT	Spiked Blank	Ammonia-N	2021/07/07		105	%	80 - 120
7446594	EMT	Method Blank	Ammonia-N	2021/07/07	<1.3		mg/kg	
7446594	EMT	RPD [PXP341-01]	Ammonia-N	2021/07/07	NC		%	30
7446601	EMT	Matrix Spike [PXP280-01]	Ammonia-N	2021/07/07		NC	%	75 - 125
7446601	EMT	Spiked Blank	Ammonia-N	2021/07/07		107	%	80 - 120

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QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
7446601	EMT	Method Blank	Ammonia-N	2021/07/07	<1.3		mg/kg	
7446601	EMT	RPD [PXP280-01]	Ammonia-N	2021/07/07	12		%	30
7448009	BBD	QC Standard	Organic Carbon (TOC)	2021/07/07		107	%	75 - 125
7448009	BBD	Method Blank	Organic Carbon (TOC)	2021/07/07	<0.50		g/kg	
7448009	BBD	RPD [PXP294-01]	Organic Carbon (TOC)	2021/07/07	0.55		%	35
7448080	EMT	Matrix Spike [PXP340-01]	Chloride (Cl-)	2021/07/08		96	%	75 - 125
7448080	EMT	Spiked Blank	Chloride (Cl-)	2021/07/08		99	%	80 - 120
7448080	EMT	Method Blank	Chloride (Cl-)	2021/07/08	<5.0		mg/kg	
7448080	EMT	RPD [PXP340-01]	Chloride (Cl-)	2021/07/08	8.5		%	30
7448082	EMT	Matrix Spike [PXP340-01]	Sulphate (SO4)	2021/07/07		110	%	75 - 125
7448082	EMT	Spiked Blank	Sulphate (SO4)	2021/07/07		108	%	80 - 120
7448082	EMT	Method Blank	Sulphate (SO4)	2021/07/07	<10		mg/kg	
7448082	EMT	RPD [PXP340-01]	Sulphate (SO4)	2021/07/07	0.85		%	30
7448083	EMT	Matrix Spike [PXP340-01]	Orthophosphate (P)	2021/07/07		0 (3)	%	75 - 125
7448083	EMT	Spiked Blank	Orthophosphate (P)	2021/07/07		101	%	80 - 120
7448083	EMT	Method Blank	Orthophosphate (P)	2021/07/07	<0.050		mg/kg	
7448083	EMT	RPD [PXP340-01]	Orthophosphate (P)	2021/07/07	3.5		%	30
7448084	EMT	Matrix Spike [PXP340-01]	Nitrate + Nitrite (N)	2021/07/07		89	%	75 - 125
7448084	EMT	Spiked Blank	Nitrate + Nitrite (N)	2021/07/07		91	%	80 - 120
7448084	EMT	Method Blank	Nitrate + Nitrite (N)	2021/07/07	<0.25		mg/kg	
7448084	EMT	RPD [PXP340-01]	Nitrate + Nitrite (N)	2021/07/07	2.8		%	30
7448085	EMT	Matrix Spike [PXP340-01]	Nitrite (N)	2021/07/07		95	%	75 - 125
7448085	EMT	Spiked Blank	Nitrite (N)	2021/07/07		102	%	80 - 120
7448085	EMT	Method Blank	Nitrite (N)	2021/07/07	<0.050		mg/kg	
7448085	EMT	RPD [PXP340-01]	Nitrite (N)	2021/07/07	NC		%	30
7448087	EMT	Matrix Spike [PXP301-01]	Chloride (Cl-)	2021/07/08		98	%	75 - 125
7448087	EMT	Spiked Blank	Chloride (Cl-)	2021/07/08		98	%	80 - 120
7448087	EMT	Method Blank	Chloride (Cl-)	2021/07/08	<5.0		mg/kg	
7448087	EMT	RPD [PXP301-01]	Chloride (Cl-)	2021/07/08	5.6		%	30
7448090	EMT	Matrix Spike [PXP301-01]	Sulphate (SO4)	2021/07/07		116	%	75 - 125
7448090	EMT	Spiked Blank	Sulphate (SO4)	2021/07/07		109	%	80 - 120
7448090	EMT	Method Blank	Sulphate (SO4)	2021/07/07	<10		mg/kg	
7448090	EMT	RPD [PXP301-01]	Sulphate (SO4)	2021/07/07	NC		%	30
7448091	EMT	Matrix Spike [PXP301-01]	Orthophosphate (P)	2021/07/07		99	%	75 - 125
7448091	EMT	Spiked Blank	Orthophosphate (P)	2021/07/07		98	%	80 - 120
7448091	EMT	Method Blank	Orthophosphate (P)	2021/07/07	<0.050		mg/kg	
7448091	EMT	RPD [PXP301-01]	Orthophosphate (P)	2021/07/07	62 (4)		%	30
7448092	EMT	Matrix Spike [PXP301-01]	Nitrate + Nitrite (N)	2021/07/07		86	%	75 - 125
7448092	EMT	Spiked Blank	Nitrate + Nitrite (N)	2021/07/07		83	%	80 - 120
7448092	EMT	Method Blank	Nitrate + Nitrite (N)	2021/07/07	<0.25		mg/kg	
7448092	EMT	RPD [PXP301-01]	Nitrate + Nitrite (N)	2021/07/07	8.1		%	30
7448093	EMT	Matrix Spike [PXP301-01]	Nitrite (N)	2021/07/07		87	%	75 - 125
7448093	EMT	Spiked Blank	Nitrite (N)	2021/07/07		98	%	80 - 120
7448093	EMT	Method Blank	Nitrite (N)	2021/07/07	<0.050		mg/kg	
7448093	EMT	RPD [PXP301-01]	Nitrite (N)	2021/07/07	NC		%	30
7448096	EMT	Matrix Spike [PXP348-01]	Chloride (Cl-)	2021/07/08		99	%	75 - 125
7448096	EMT	Spiked Blank	Chloride (Cl-)	2021/07/08		99	%	80 - 120
7448096	EMT	Method Blank	Chloride (Cl-)	2021/07/08	<5.0		mg/kg	
7448096	EMT	RPD [PXP348-01]	Chloride (Cl-)	2021/07/08	0.83		%	30
7448097	EMT	Matrix Spike [PXP348-01]	Sulphate (SO4)	2021/07/07		113	%	75 - 125
7448097	EMT	Spiked Blank	Sulphate (SO4)	2021/07/07		105	%	80 - 120
7448097	EMT	Method Blank	Sulphate (SO4)	2021/07/07	<10		mg/kg	

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QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
7448097	EMT	RPD [PXP348-01]	Sulphate (SO4)	2021/07/07	NC		%	30
7448098	EMT	Matrix Spike [PXP348-01]	Orthophosphate (P)	2021/07/07		100	%	75 - 125
7448098	EMT	Spiked Blank	Orthophosphate (P)	2021/07/07		105	%	80 - 120
7448098	EMT	Method Blank	Orthophosphate (P)	2021/07/07	<0.050		mg/kg	
7448098	EMT	RPD [PXP348-01]	Orthophosphate (P)	2021/07/07	8.0		%	30
7448099	EMT	Matrix Spike [PXP348-01]	Nitrate + Nitrite (N)	2021/07/07		77	%	75 - 125
7448099	EMT	Spiked Blank	Nitrate + Nitrite (N)	2021/07/07		92	%	80 - 120
7448099	EMT	Method Blank	Nitrate + Nitrite (N)	2021/07/07	<0.25		mg/kg	
7448099	EMT	RPD [PXP348-01]	Nitrate + Nitrite (N)	2021/07/07	NC		%	30
7448100	EMT	Matrix Spike [PXP348-01]	Nitrite (N)	2021/07/08		83	%	75 - 125
7448100	EMT	Spiked Blank	Nitrite (N)	2021/07/08		104	%	80 - 120
7448100	EMT	Method Blank	Nitrite (N)	2021/07/08	<0.050		mg/kg	
7448100	EMT	RPD [PXP348-01]	Nitrite (N)	2021/07/08	NC		%	30
7448217	EMT	Matrix Spike	Chloride (Cl-)	2021/07/07		99	%	75 - 125
7448217	EMT	Spiked Blank	Chloride (Cl-)	2021/07/07		96	%	80 - 120
7448217	EMT	Method Blank	Chloride (Cl-)	2021/07/07	<5.0		mg/kg	
7448217	EMT	RPD	Chloride (Cl-)	2021/07/07	NC		%	30
7448225	EMT	Spiked Blank	Sulphate (SO4)	2021/07/07		104	%	80 - 120
7448225	EMT	Method Blank	Sulphate (SO4)	2021/07/07	<10		mg/kg	
7448228	EMT	Spiked Blank	Orthophosphate (P)	2021/07/08		97	%	80 - 120
7448228	EMT	Method Blank	Orthophosphate (P)	2021/07/08	<0.050		mg/kg	
7448230	EMT	Spiked Blank	Nitrate + Nitrite (N)	2021/07/07		97	%	80 - 120
7448230	EMT	Method Blank	Nitrate + Nitrite (N)	2021/07/07	<0.25		mg/kg	
7448231	EMT	Spiked Blank	Nitrite (N)	2021/07/07		104	%	80 - 120
7448231	EMT	Method Blank	Nitrite (N)	2021/07/07	<0.050		mg/kg	
7448515	BBD	QC Standard	Total Carbon-combustion IR	2021/07/07		95	%	75 - 125
7448515	BBD	Method Blank	Total Carbon-combustion IR	2021/07/07	<0.50		g/kg	
7448515	BBD	RPD [PXP293-01]	Total Carbon-combustion IR	2021/07/07	2.9		%	35
7448613	SSI	RPD [PXP301-01]	Soluble (5:1) pH	2021/07/07	2.4		%	N/A
7448618	SSI	Method Blank	Conductivity	2021/07/07	3.3, RDL=1.0		uS/cm	
7448618	SSI	RPD [PXP301-01]	Conductivity	2021/07/07	18		%	20
7448631	SSI	RPD [PXP348-01]	Soluble (5:1) pH	2021/07/07	0.41		%	N/A
7448637	SSI	Method Blank	Conductivity	2021/07/07	3.4, RDL=1.0		uS/cm	
7448637	SSI	RPD [PXP348-01]	Conductivity	2021/07/07	1.8		%	20
7448651	SSI	RPD [PXP340-01]	Soluble (5:1) pH	2021/07/07	0.23		%	N/A
7448671	SSI	Method Blank	Conductivity	2021/07/07	3.0, RDL=1.0		uS/cm	
7448671	SSI	RPD [PXP340-01]	Conductivity	2021/07/07	5.6		%	20
7448682	SSI	RPD	Soluble (5:1) pH	2021/07/07	1.9		%	N/A
7448694	SSI	Method Blank	Conductivity	2021/07/07	1.7, RDL=1.0		uS/cm	

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BV Labs Job #: C1H4101
Report Date: 2021/07/14

GHD Limited
Client Project #: 11222385
Site Location: GOLDBORO
Your P.O. #: TO FOLLOW
Sampler Initials: JV

QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
7448694	SSI	RPD	Conductivity	2021/07/07	3.0		%	20

N/A = Not Applicable

Duplicate: Paired analysis of a separate portion of the same sample. Used to evaluate the variance in the measurement.

Matrix Spike: A sample to which a known amount of the analyte of interest has been added. Used to evaluate sample matrix interference.

QC Standard: A sample of known concentration prepared by an external agency under stringent conditions. Used as an independent check of method accuracy.

Spiked Blank: A blank matrix sample to which a known amount of the analyte, usually from a second source, has been added. Used to evaluate method accuracy.

Method Blank: A blank matrix containing all reagents used in the analytical procedure. Used to identify laboratory contamination.

NC (Matrix Spike): The recovery in the matrix spike was not calculated. The relative difference between the concentration in the parent sample and the spike amount was too small to permit a reliable recovery calculation (matrix spike concentration was less than the native sample concentration)

NC (Duplicate RPD): The duplicate RPD was not calculated. The concentration in the sample and/or duplicate was too low to permit a reliable RPD calculation (absolute difference <= 2x RDL).

(1) Elevated reporting limit due to blank performance.

(2) Poor spike recovery due to probable sample matrix interference.

(3) Recovery or RPD for this parameter is outside control limits. The overall quality control for this analysis meets acceptability criteria.

(4) Poor duplicate agreement due to sample inhomogeniety, results confirmed by repeat anaylsis.

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BV Labs Job #: C1H4101
Report Date: 2021/07/14

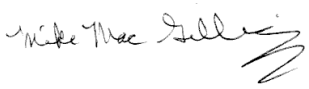
GHD Limited
Client Project #: 11222385
Site Location: GOLDBORO
Your P.O. #: TO FOLLOW
Sampler Initials: JV

VALIDATION SIGNATURE PAGE

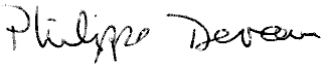
The analytical data and all QC contained in this report were reviewed and validated by:

Miryam Assayag

Eric Dearman, Scientific Specialist



Mike MacGillivray, Scientific Specialist (Inorganics)



Phil Deveau, Scientific Specialist (Organics)

BV Labs has procedures in place to guard against improper use of the electronic signature and have the required "signatories", as per ISO/IEC 17025, signing the reports.
For Service Group specific validation please refer to the Validation Signature Page.

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Kimberley Brace

From: Atena Georgescu
Sent: Friday, June 25, 2021 2:47 PM
To: Kimberley Brace
Subject: GHD Glen Merkley

Item	Sample Matrix	Analytical Parameters	Analytical Methods	U Pri
	Soil	General Chemistry		$ 1
2	Soil	ICPMS Metals Scan, includes mercury (total)	SW846 6020/3030B/1631E/200.8/200.2SM 3125B	$
3	Soil	Methylmercury		$
4	Soil	Carbon, Total Organic (TOC)	SW846 9060/EPA 415.1/SM 5310B/ Carter 21.2/LECO	$
5	Soil	Carbon, Total (TC)	LECO/SM 5310, combustion	$
6	Soil	Carbon, Total Inorganic (TIC)	LECO/SM 5310	$
7	Soil	Acid Rock Drainage Package		$ 1
8	Soil	Grain Size/Particle Size Distribution (includes graph)	ASTM D422-63/Sieve and Pipette or Hydrometer	$13
9		Sample Disposal Fee		$
1	Soil	TCLP	Hold for analysis - pending metals results)	

Soil	Carbon, Total (TC)	LECO/SM 5310, combustion	$	**Ingrid Lavlor:** soil price is for calculation only. Requires TOC and TC	$	26.9
Soil	Carbon, Total Inorganic (TIC)	LECO/SM 5310	$		$	5.4
Soil	Acid Rock Drainage Package		$	15	$	152.7
	Sample Disposal Fee		$		$	5.0

Soil	Carbon, Total Inorganic (TIC)	LECO/SM 5310	$	sulfate (as S), sulfide, acid production potential, neutralization potential ph 8.3, Net NP ph 8.3, NP/AP	$	
Soil	Acid Rock Drainage Package		$	15	$	15
	Sample Disposal Fee		$		$	
Soil	TCLP	Hold for analysis - pending metals results)				

1

Atena Georgescu
Project Manager, Site Remediation & Assessment
Environmental Services
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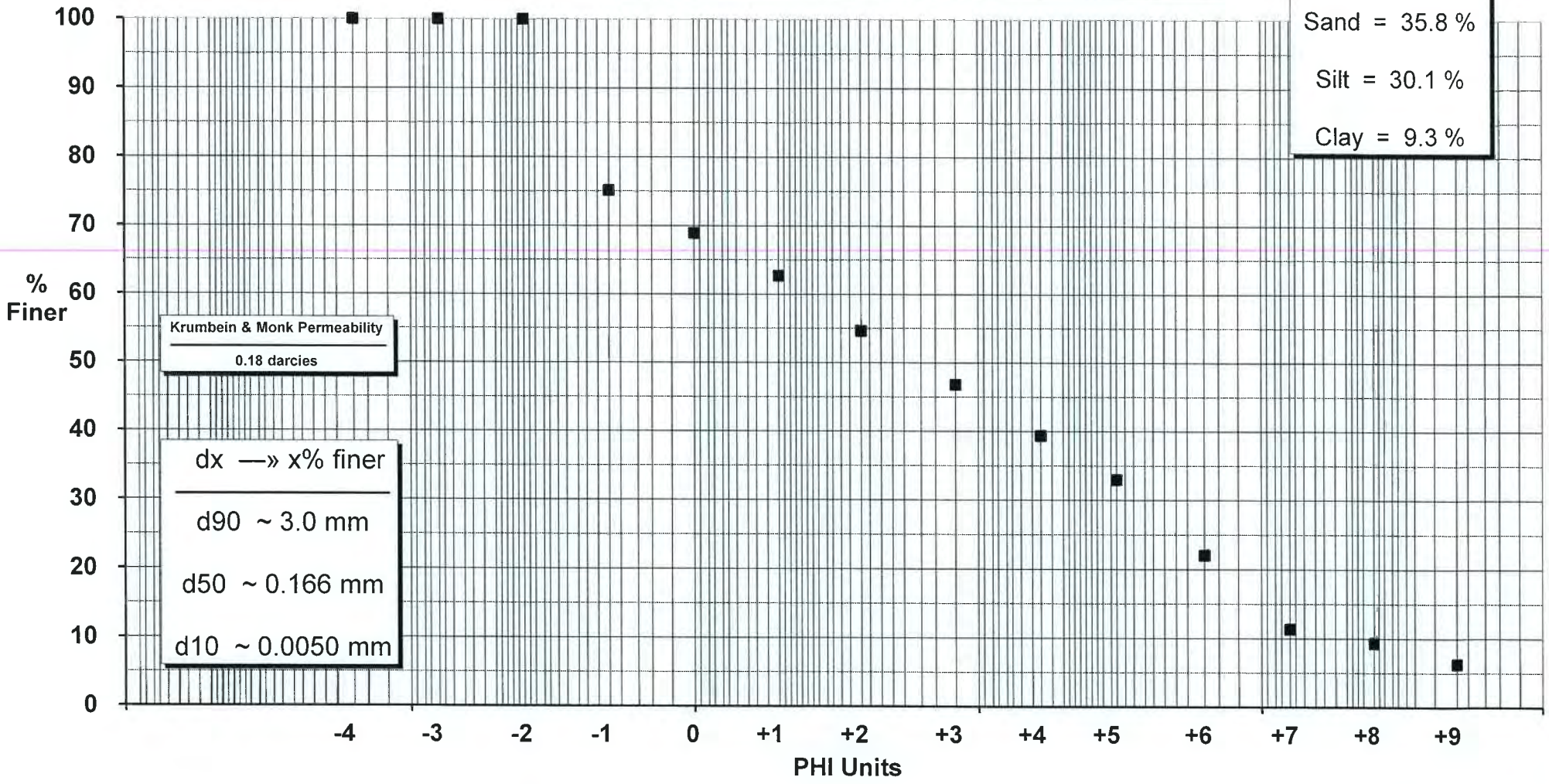
Shaping a world of trust

BV Labs ID: PXP279-01

A-14

Percent Coarser than 75 µm (PHI = 3.737)	Percent Coarser than 50 µm (PHI = 4.322)
58.7 %	62.7 %

Wentworth	
Gravel	24.9 %
Sand	35.8 %
Silt	30.1 %
Clay	9.3 %



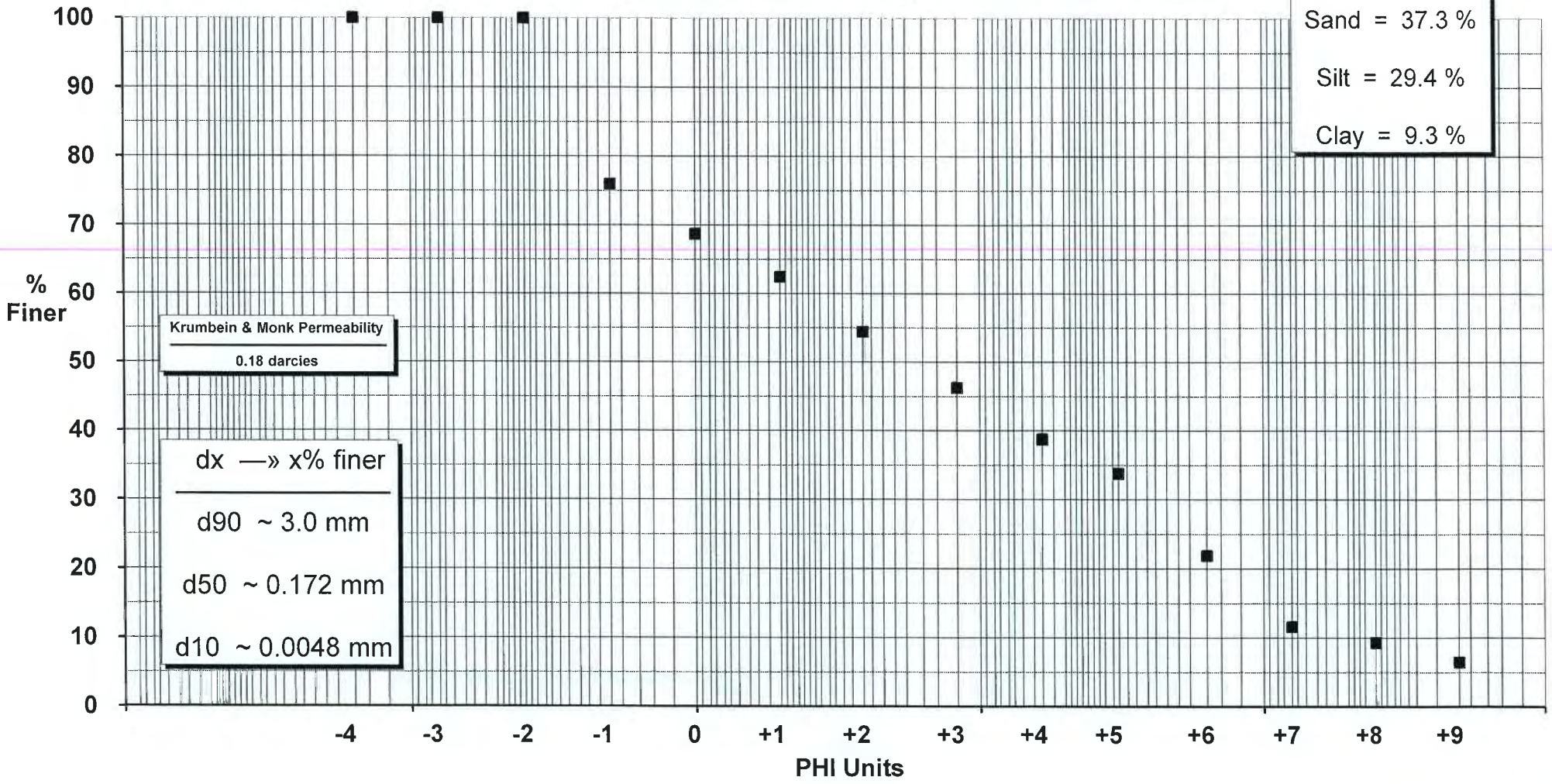
Approved

BV Labs ID: PXP279-01:D1

A-14

Percent Coarser than 75 µm (PHI = 3.737)	Percent Coarser than 50 µm (PHI = 4.322)
—	—
59.3 %	62.9 %

Wentworth	
Gravel	24.0 %
Sand	37.3 %
Silt	29.4 %
Clay	9.3 %



Krumbein & Monk Permeability
0.18 darcies

dx —» x% finer
d90 ~ 3.0 mm
d50 ~ 0.172 mm
d10 ~ 0.0048 mm

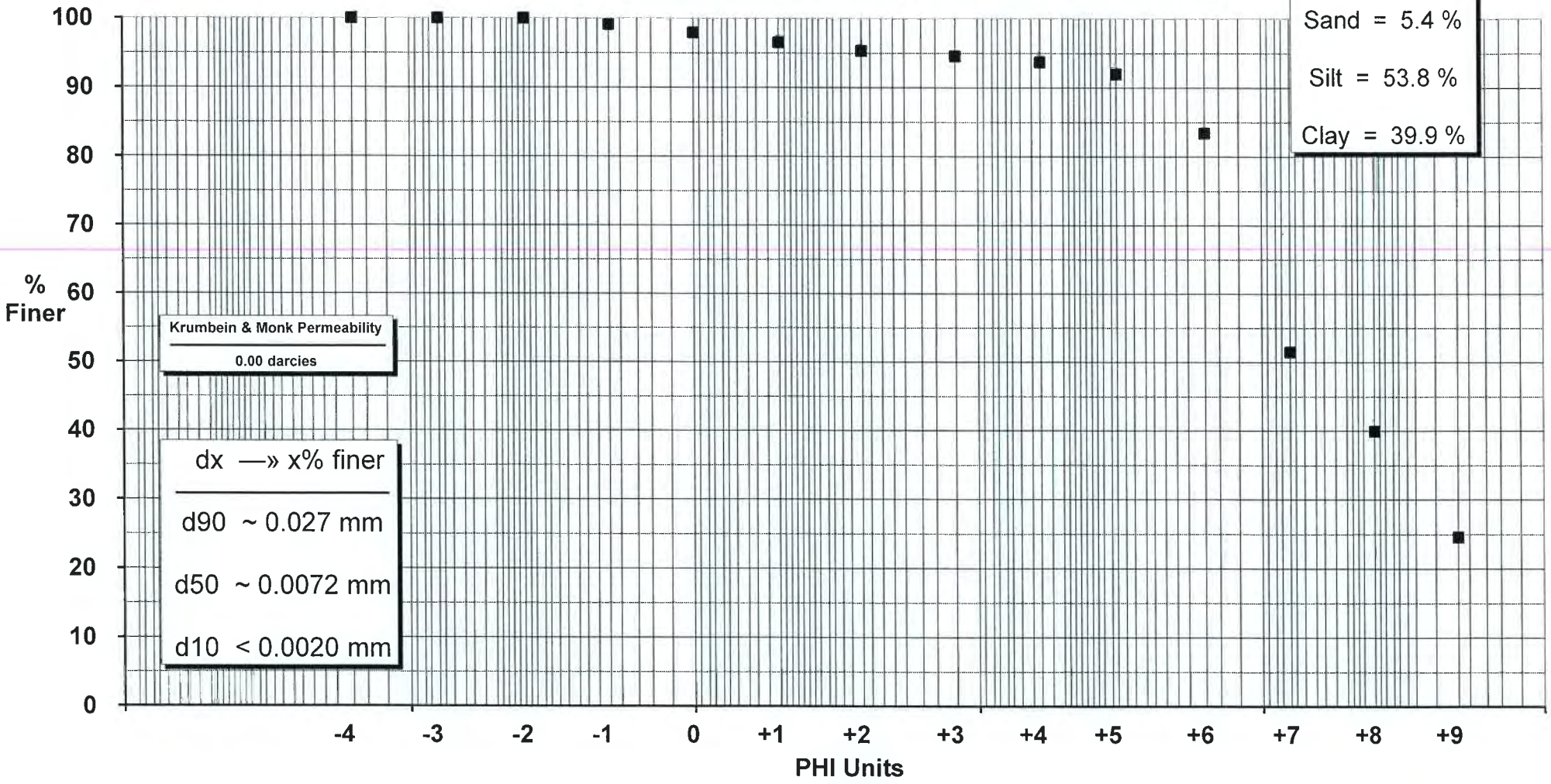
Approved

BV Labs ID: PXP280-01

A-24

Percent Coarser than 75 µm (PHI = 3.737)	Percent Coarser than 50 µm (PHI = 4.322)
6.1 %	6.9 %

Wentworth	
Gravel	0.9 %
Sand	5.4 %
Silt	53.8 %
Clay	39.9 %



Krumbein & Monk Permeability

0.00 darcies

dx —» x% finer	
d90	~ 0.027 mm
d50	~ 0.0072 mm
d10	< 0.0020 mm

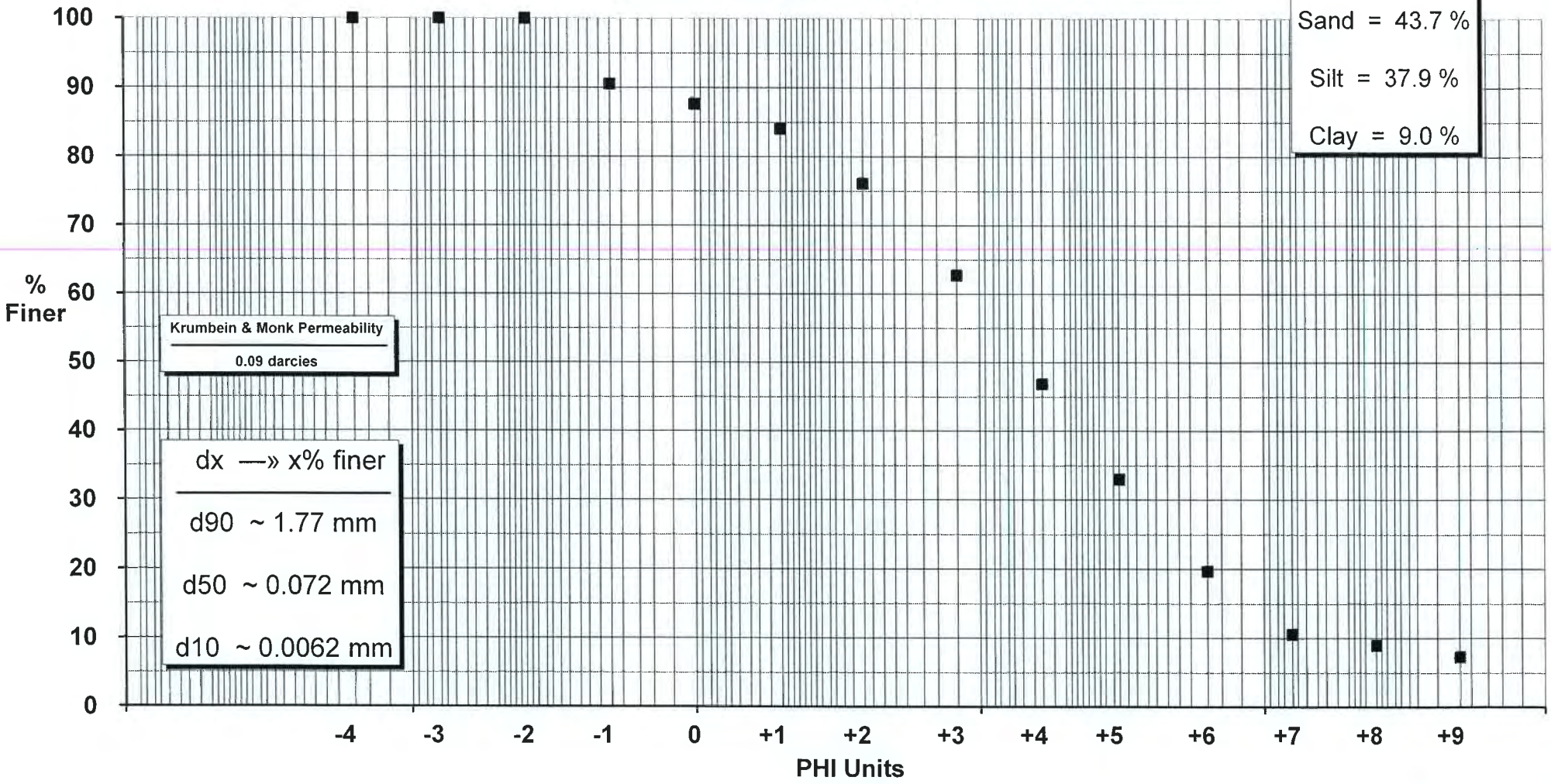
Approved

BV Labs ID: PXP283-01

A-36

Percent Coarser than 75 µm (PHI = 3.737)	Percent Coarser than 50 µm (PHI = 4.322)
49.0 %	57.6 %

Wentworth	
Gravel	9.5 %
Sand	43.7 %
Silt	37.9 %
Clay	9.0 %



Krumbein & Monk Permeability
0.09 darcies

dx —» x% finer
d90 ~ 1.77 mm
d50 ~ 0.072 mm
d10 ~ 0.0062 mm

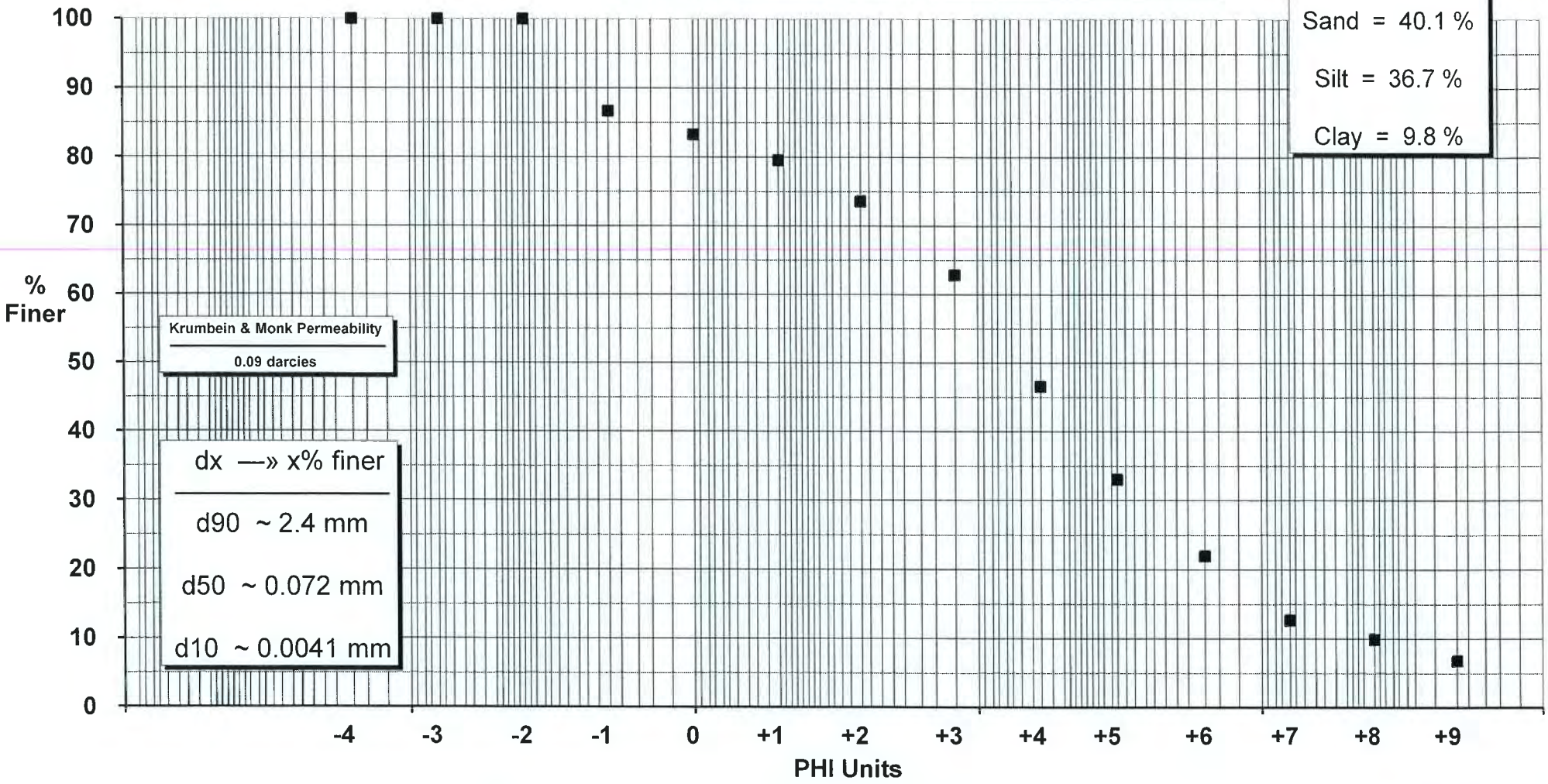
Approved

BV Labs ID: PXP292-01

B-36

Percent Coarser than 75 µm (PHI = 3.737)	Percent Coarser than 50 µm (PHI = 4.322)
49.2 %	57.8 %

Wentworth	
Gravel	13.3 %
Sand	40.1 %
Silt	36.7 %
Clay	9.8 %



Krumbein & Monk Permeability

0.09 darcies

dx —» x% finer	
d90	~ 2.4 mm
d50	~ 0.072 mm
d10	~ 0.0041 mm

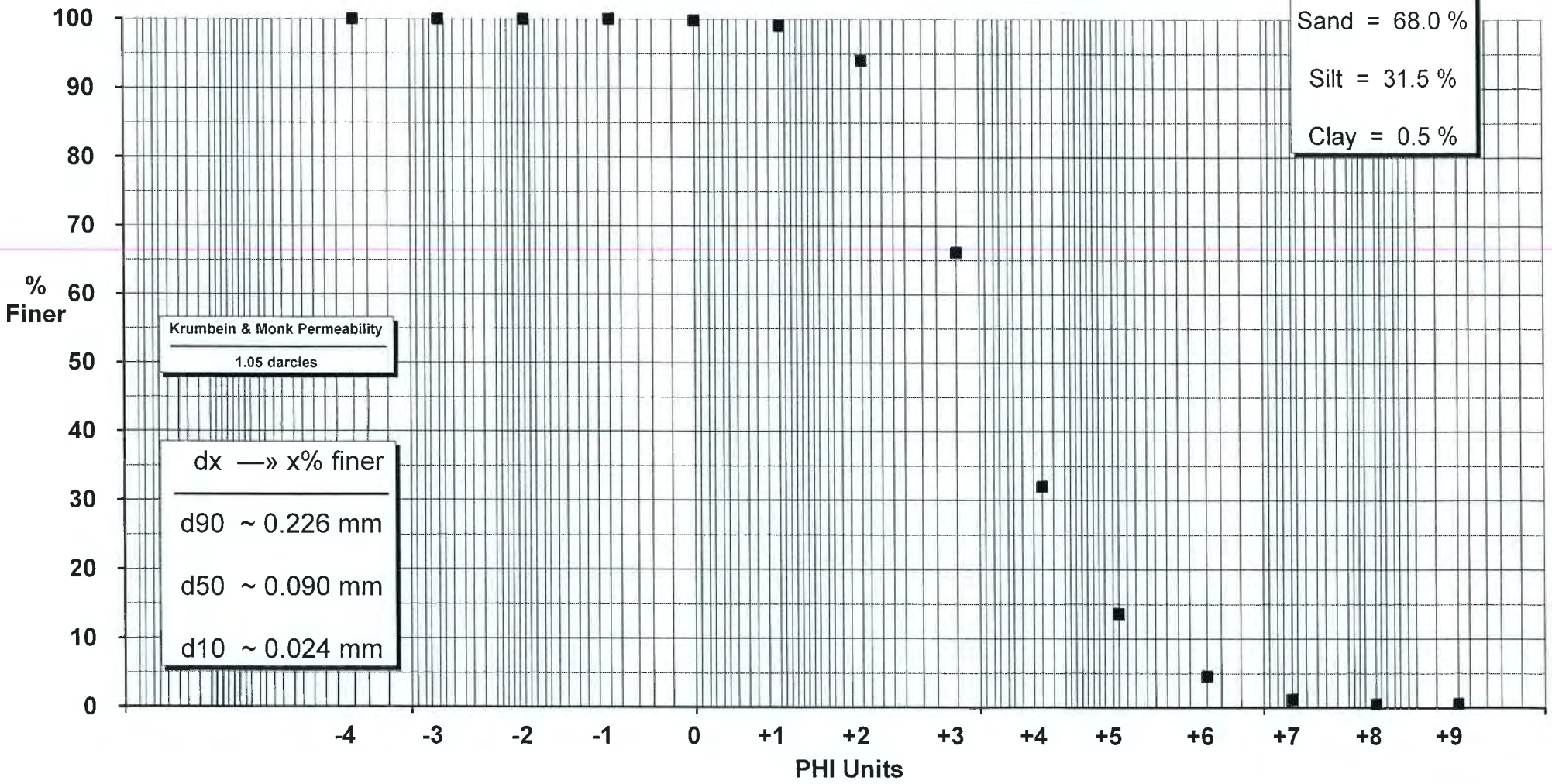
Approved

BV Labs ID: PXP293-01

B-37

Percent Coarser than 75 µm (PHI = 3.737)	Percent Coarser than 50 µm (PHI = 4.322)
59.0 %	73.9 %

Wentworth	
Gravel	0.0 %
Sand	68.0 %
Silt	31.5 %
Clay	0.5 %



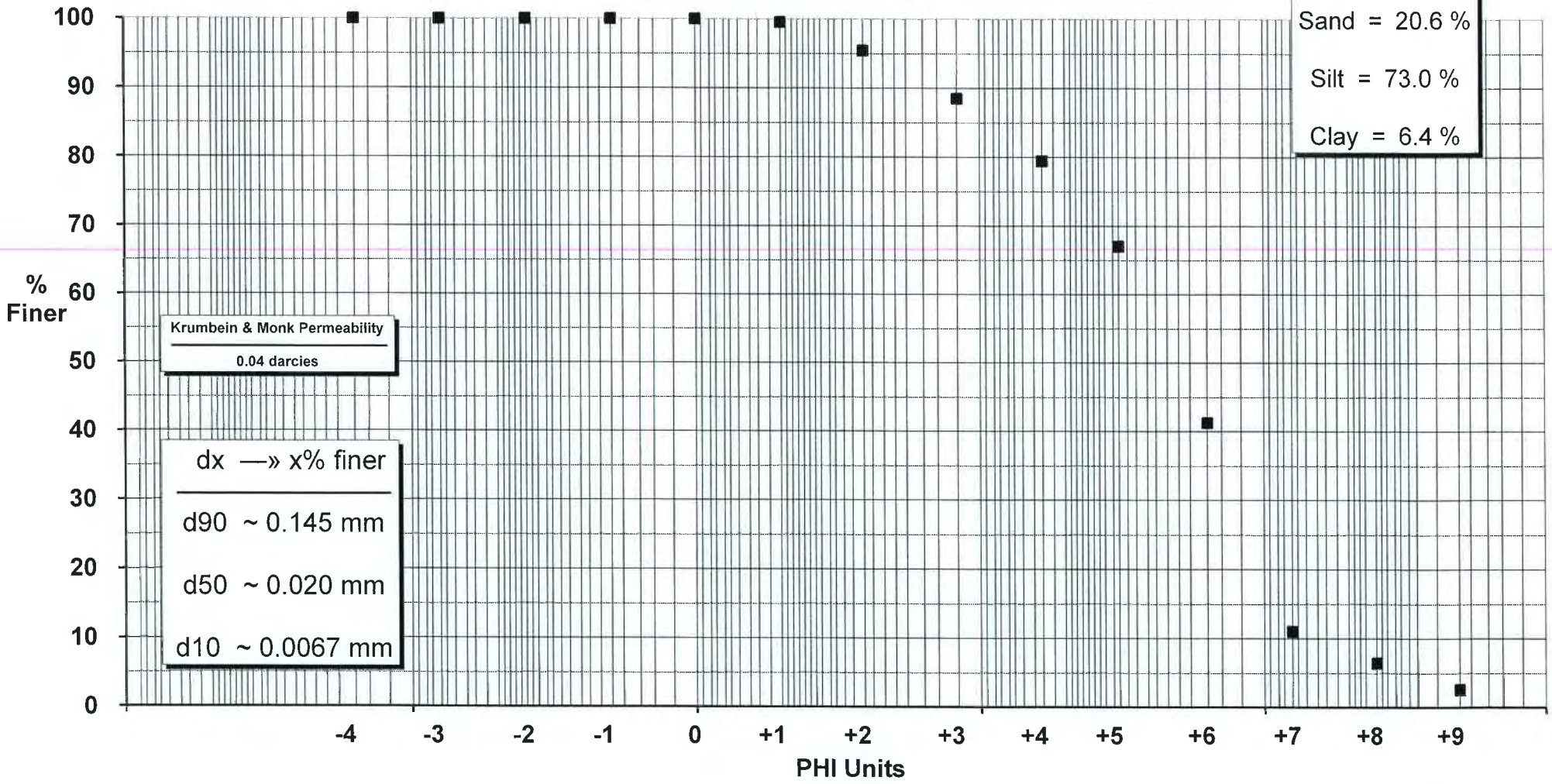
Approved

BV Labs ID: PXP309-01

C-13

Percent Coarser than 75 µm (PHI = 3.737)	Percent Coarser than 50 µm (PHI = 4.322)
—	—
18.2 %	24.6 %

Wentworth	
Gravel	0.0 %
Sand	20.6 %
Silt	73.0 %
Clay	6.4 %



Krumbein & Monk Permeability

0.04 darcies

dx —» x% finer	
d90	~ 0.145 mm
d50	~ 0.020 mm
d10	~ 0.0067 mm

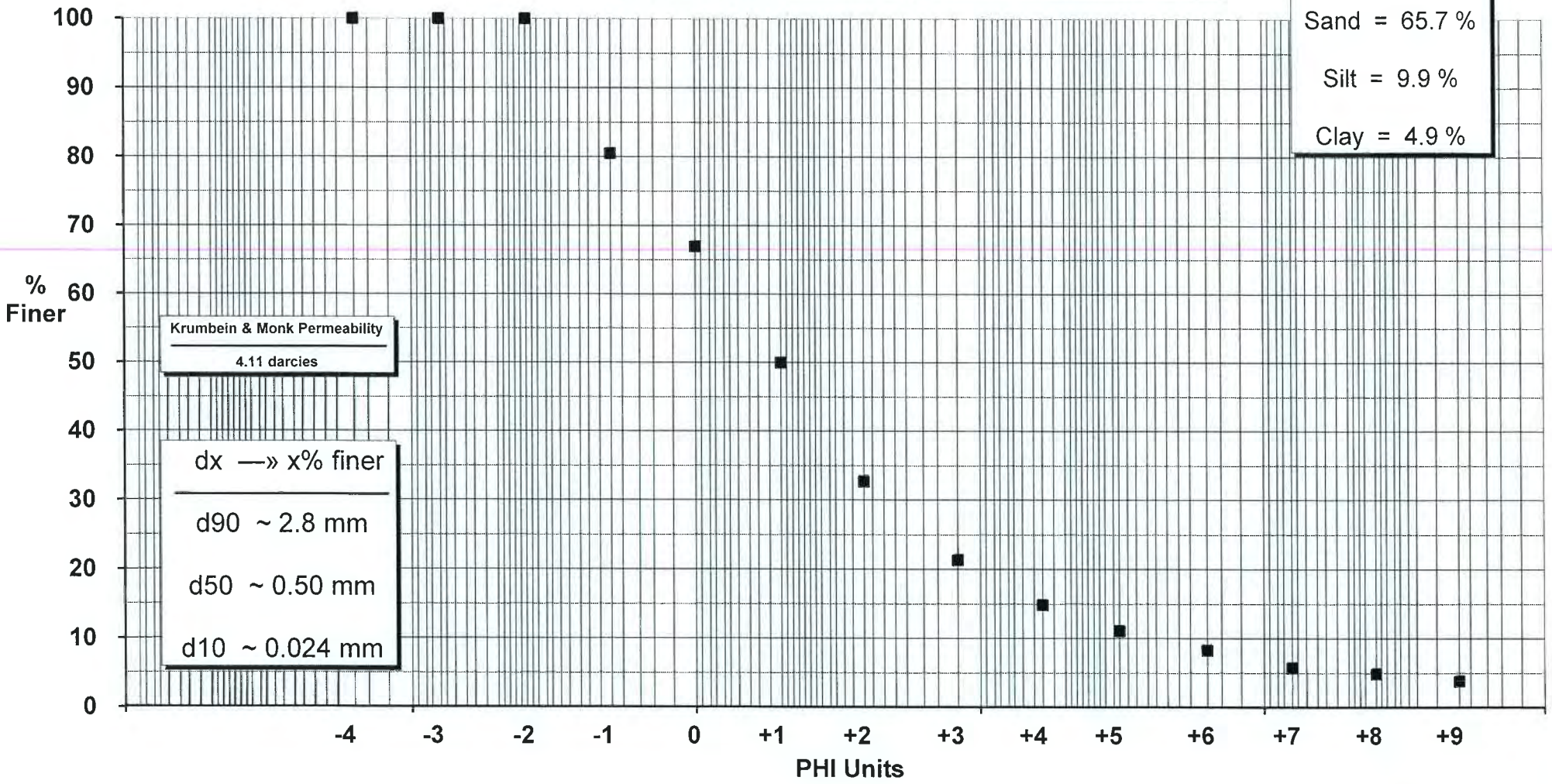
Approved

BV Labs ID: PXP310-01

C-18

Percent Coarser than 75 µm (PHI = 3.737)	Percent Coarser than 50 µm (PHI = 4.322)
83.5 %	86.4 %

Wentworth	
Gravel	19.5 %
Sand	65.7 %
Silt	9.9 %
Clay	4.9 %



Krumbein & Monk Permeability
4.11 darcies

dx —» x% finer
d90 ~ 2.8 mm
d50 ~ 0.50 mm
d10 ~ 0.024 mm

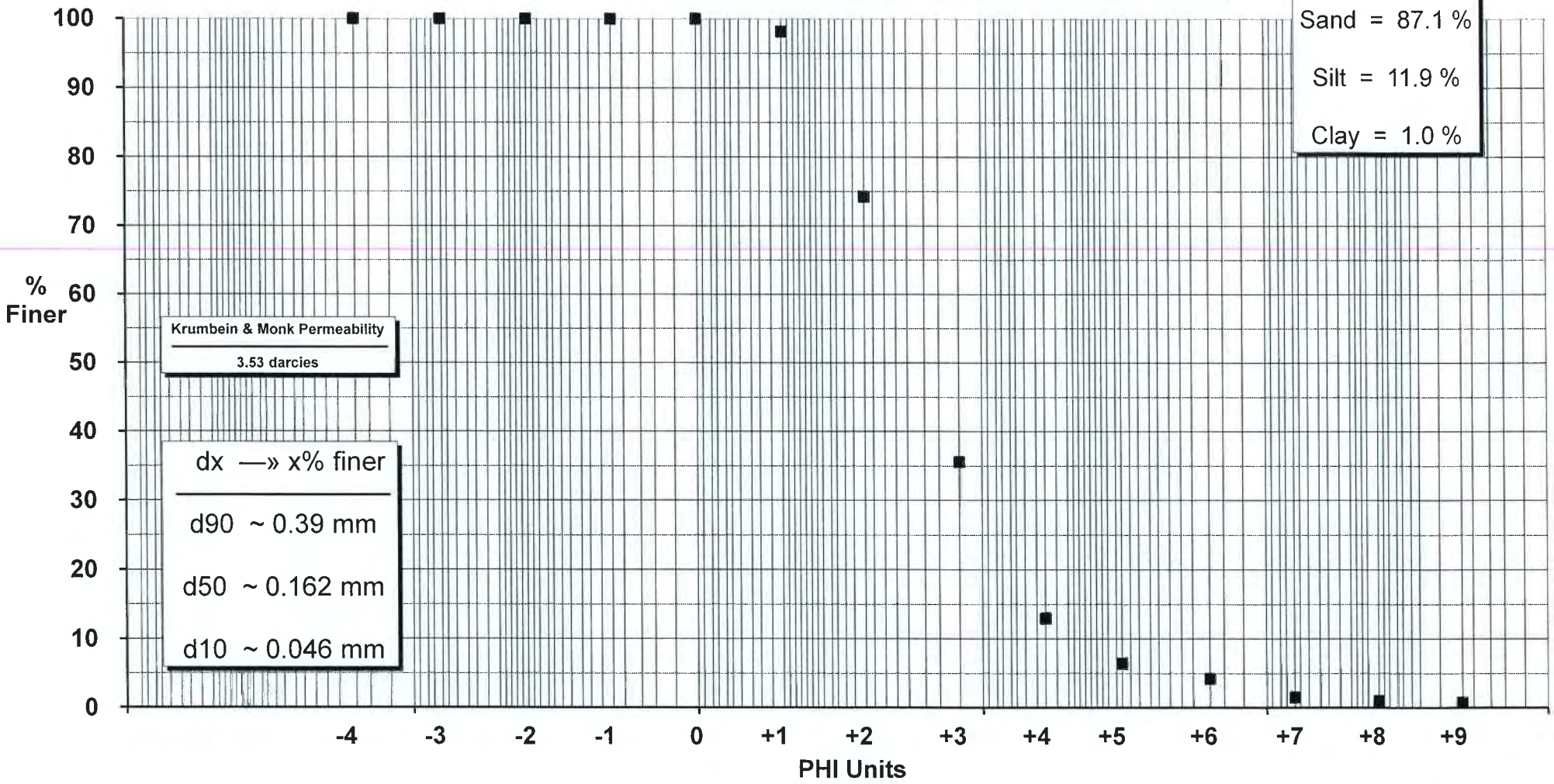
Approved

BV Labs ID: PXP313-01

D-07

Percent Coarser than 75 µm (PHI = 3.737)	Percent Coarser than 50 µm (PHI = 4.322)
81.1 %	89.2 %

Wentworth	
Gravel	0.0 %
Sand	87.1 %
Silt	11.9 %
Clay	1.0 %



Krumbein & Monk Permeability

3.53 darcies

dx —» x% finer	
d90	~ 0.39 mm
d50	~ 0.162 mm
d10	~ 0.046 mm

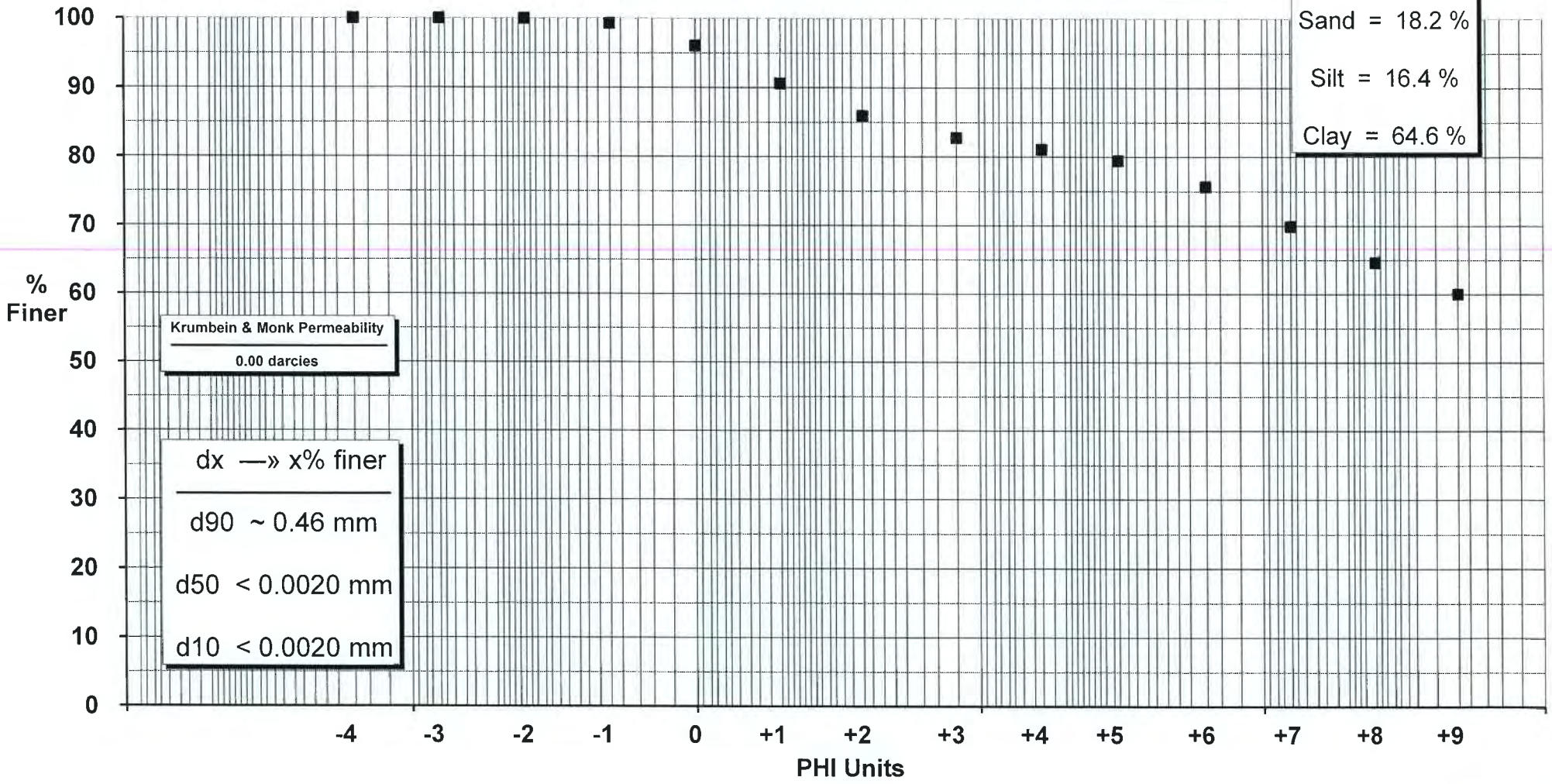
Approved

BV Labs ID: PXP319-01

D-22

Percent Coarser than 75 µm (PHI = 3.737)	Percent Coarser than 50 µm (PHI = 4.322)
—	—
18.5 %	19.5 %

Wentworth	
Gravel	0.7 %
Sand	18.2 %
Silt	16.4 %
Clay	64.6 %



Krumbein & Monk Permeability
0.00 darcies

dx —» x% finer
d90 ~ 0.46 mm
d50 < 0.0020 mm
d10 < 0.0020 mm

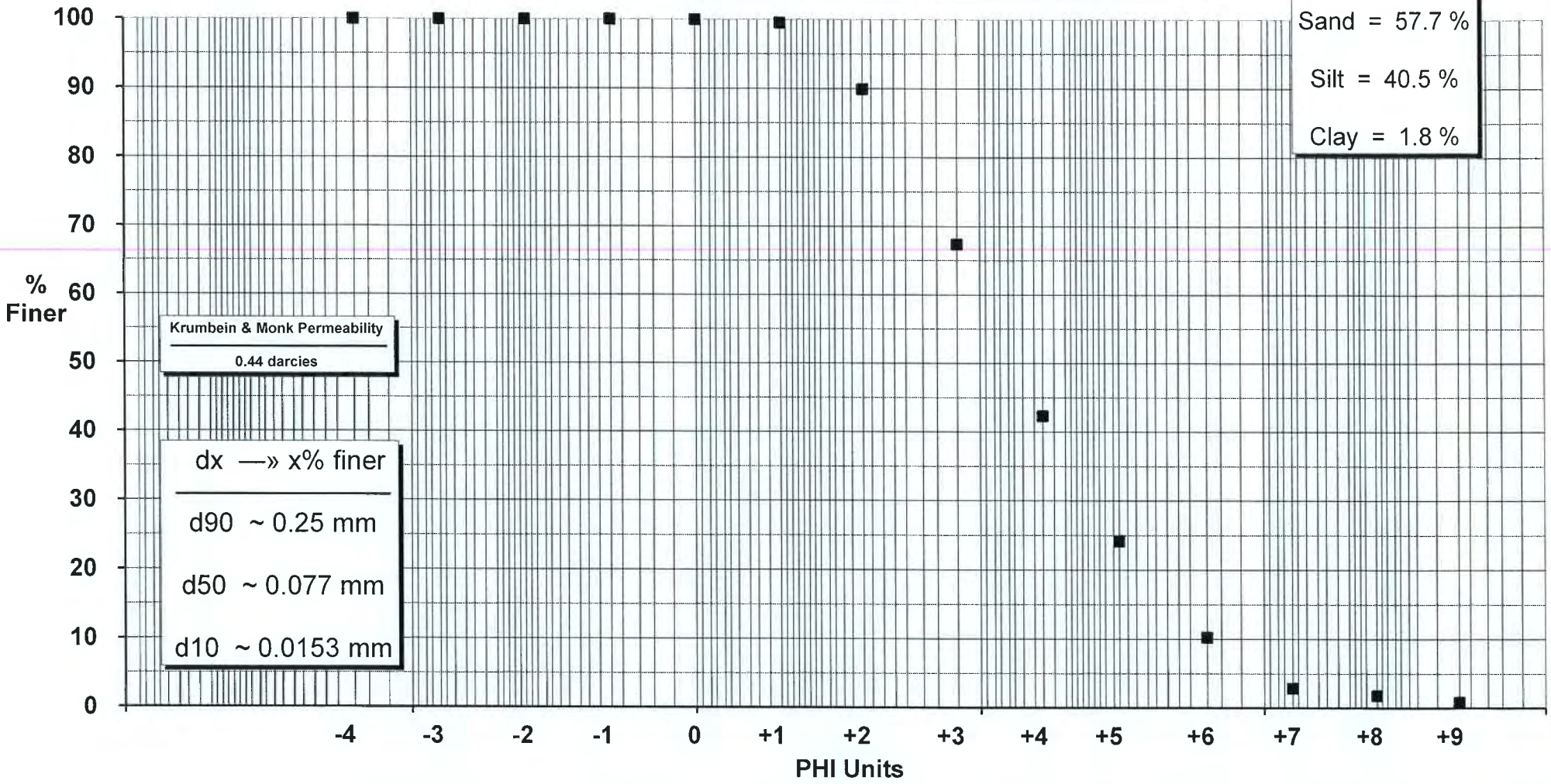
Approved

BV Labs ID: PXP338-01

E-31

Percent Coarser than 75 µm (PHI = 3.737)	Percent Coarser than 50 µm (PHI = 4.322)
51.1 %	63.6 %

Wentworth	
Gravel	0.0 %
Sand	57.7 %
Silt	40.5 %
Clay	1.8 %



Krumbein & Monk Permeability
0.44 darcies

dx —» x% finer	
d90	~ 0.25 mm
d50	~ 0.077 mm
d10	~ 0.0153 mm

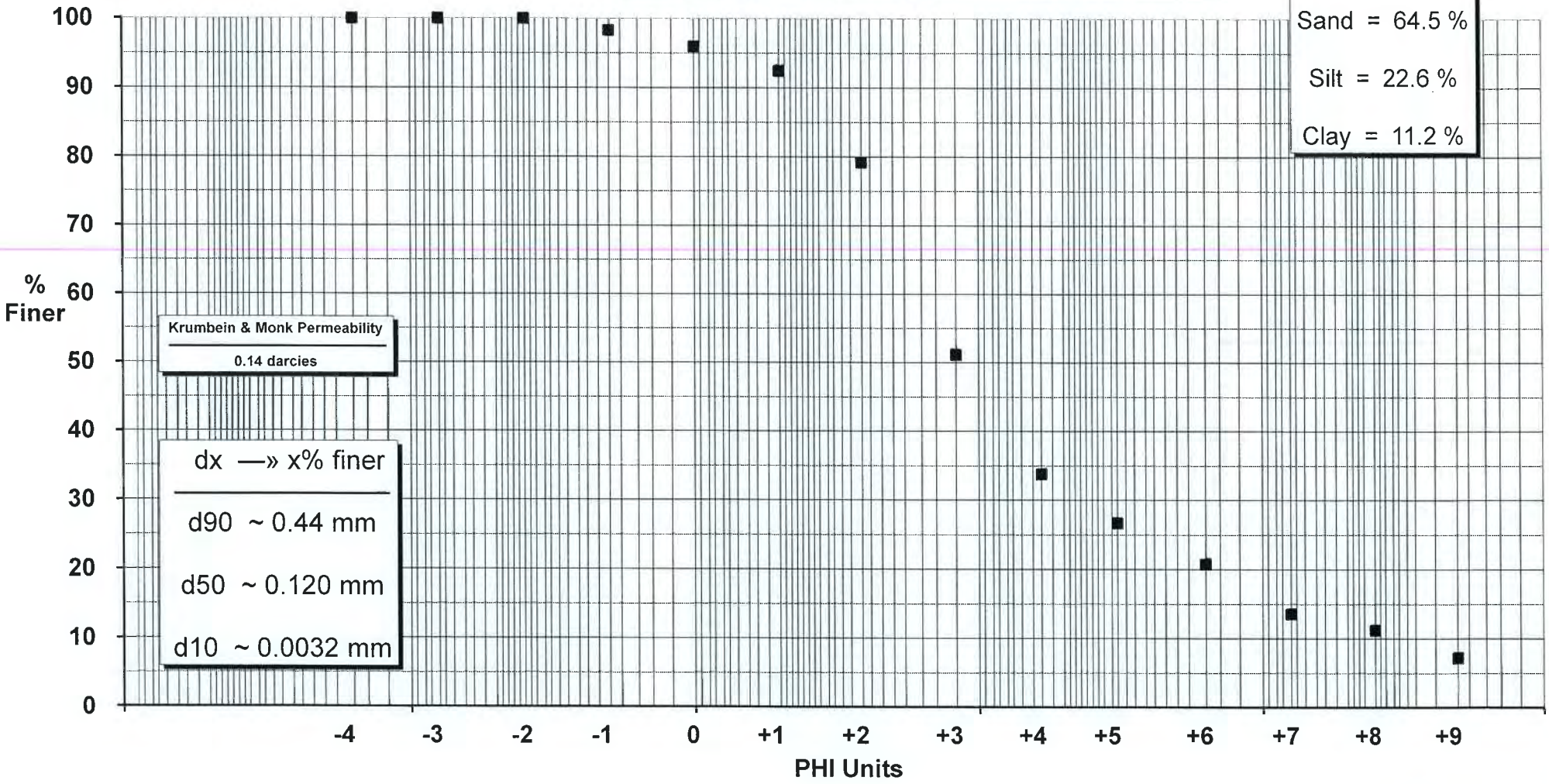
Approved

BV Labs ID: PXP340-01

E-35

Percent Coarser than 75 µm (PHI = 3.737)	Percent Coarser than 50 µm (PHI = 4.322)
61.7 %	68.5 %

Wentworth	
Gravel	1.7 %
Sand	64.5 %
Silt	22.6 %
Clay	11.2 %



Krumbein & Monk Permeability
0.14 darcies

dx —» x% finer
d90 ~ 0.44 mm
d50 ~ 0.120 mm
d10 ~ 0.0032 mm

CTJ

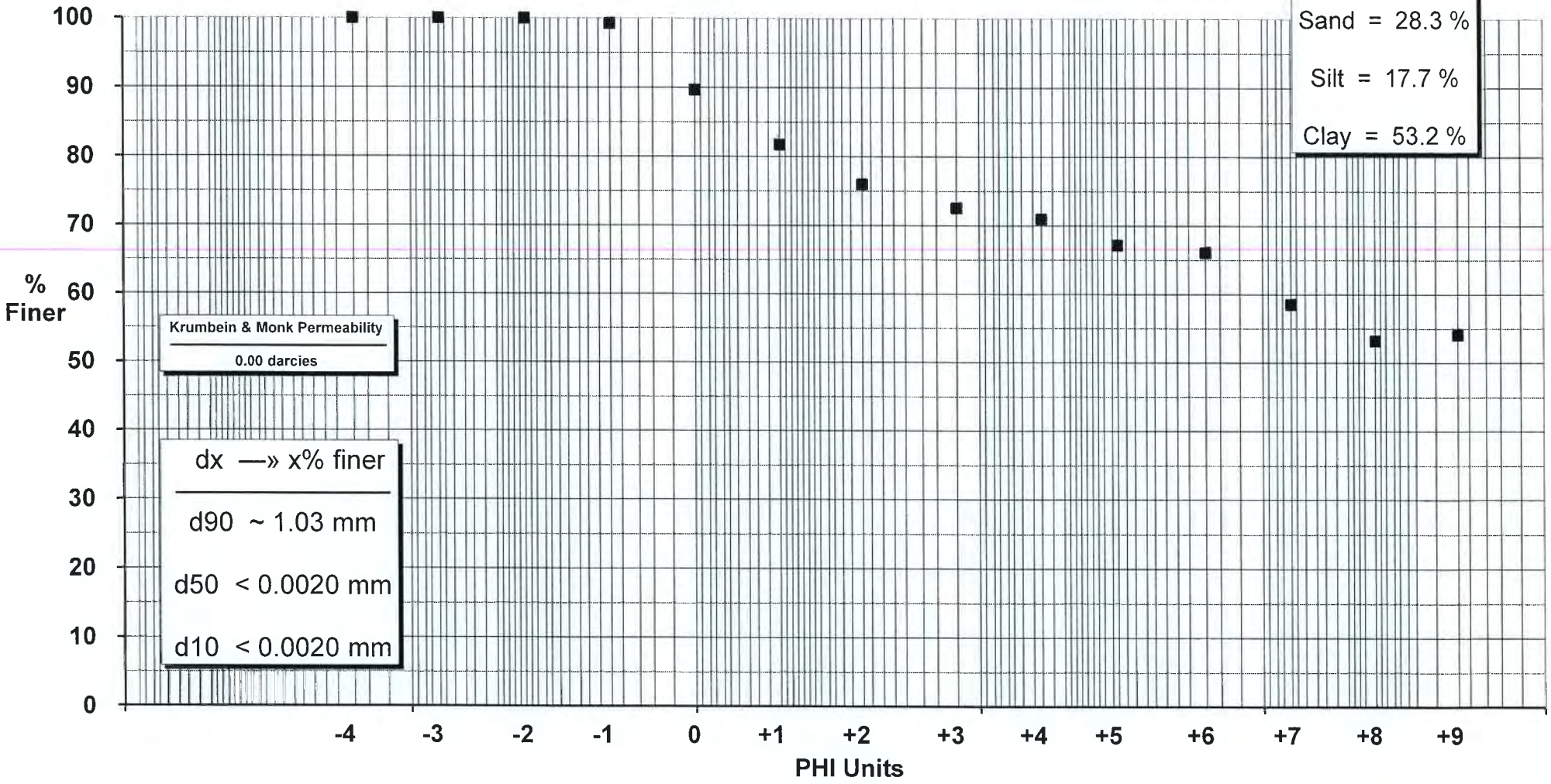
Approved

BV Labs ID: PXP342-01

E-45

Percent Coarser than 75 µm (PHI = 3.737)	Percent Coarser than 50 µm (PHI = 4.322)
—	—
28.6 %	30.3 %

Wentworth	
Gravel	0.8 %
Sand	28.3 %
Silt	17.7 %
Clay	53.2 %



Krumbein & Monk Permeability

0.00 darcies

dx —» x% finer

d90 ~ 1.03 mm

d50 < 0.0020 mm

d10 < 0.0020 mm

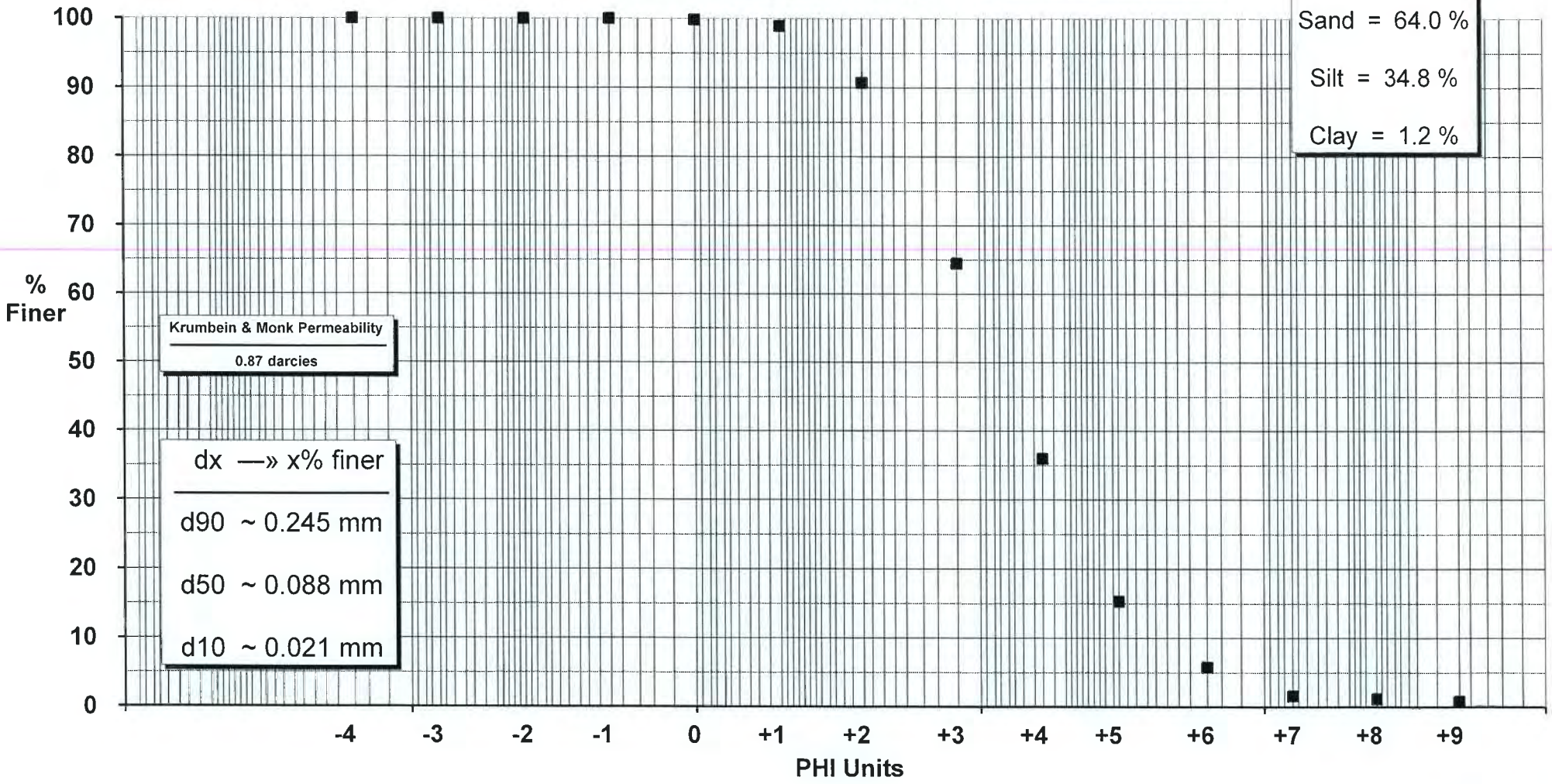
Approved

BV Labs ID: PXP357-01

DUP-T

Percent Coarser than 75 µm (PHI = 3.737)	Percent Coarser than 50 µm (PHI = 4.322)
—	—
56.5 %	70.7 %

Wentworth	
Gravel	0.0 %
Sand	64.0 %
Silt	34.8 %
Clay	1.2 %



Krumbein & Monk Permeability

0.87 darcies

dx —» x% finer	
d90	~ 0.245 mm
d50	~ 0.088 mm
d10	~ 0.021 mm

Approved

Report ID: 402068-IAS-AUD
Report Date: 12-Jul-21
Date Received: 29-Jun-21

CERTIFICATE OF ANALYSIS
for
Bureau Veritas Canada Inc
200 Bluewater Road, Suite 105
Bedford, NS B4B 1G9

rpc
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Fredericton NB
Canada E3B 6Z9
Tel: 506.452.1212
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Attention: Client SvcSub
Project #: C1H4101

Modified Acid-Base Accounting
Results based upon Sulfide

RPC ID	Client ID	Paste pH	Total Sulfur	Sulfate† (as S)	Sulfide	Acid Production Potential	Neutralizing Potential pH 8.3	Net NP pH 8.3	NP/AP
			%	%	%	Kg $CaCO_3$/tonne			
402068-1	PXP280-04R\A-24	5.5	0.082	0.009	0.073	2.3	1.4	-0.8	0.6
402068-1Dup	Lab Duplicate	5.5	0.082	0.008	0.074	2.3	1.8	-0.5	0.8
402068-2	PXP293-04R\B-37	4.1	0.009	0.009	< 0.005	< 0.2	-1.4	-1.4	-
402068-3	PXP294-02R\B-38	5.2	0.103	0.052	0.051	1.6	-1.2	-2.8	-0.8
402068-4	PXP313-04R\D-07	4.8	< 0.005	< 0.005	< 0.005	< 0.2	0.7	0.7	-
402068-5	PXP319-04R\D-22	4.2	0.353	0.065	0.288	9.0	-41.1	-50.1	-4.6
402068-6	PXP340-04R\E-35	4.3	0.018	0.013	0.005	0.2	-6.2	-6.4	-39.8
402068-7	PXP357-02R\DUP-T	4.0	0.008	0.007	< 0.005	< 0.2	-0.2	-0.3	-

The modified acid/base accounting was determined by the Sobek method.
A negative value for Net Neutralizing Potential indicates that the material is a net acid producer.

Total Sulfur was determined using a combustion/infrared method.
† Acid soluble, non-volatile sulfur species (sulfate (as S)).
Sulfide was determined as the difference between Total Sulfur and Sulfate (as S).

Matthew Norman, B.Sc., P.Chem.
Senior Chemist
Inorganic Analytical Chemistry

Brannen Burhoe
Supervisor
Inorganic Analytical Chemistry

Methyl Mercury Results

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440 DeSalaberry Ave. Winnipeg, MB R2L 0Y7
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CLIENT: Bureau Veritas - Bedford:C1H4101
200 Bluewater Road, Suite 105
Bedford, NS B4B 1G9

Date Received: June 29, 2021
Sampling Date: June 14, 2021 to June 16, 2021
Date Issued: July 14, 2021

Matrix: Sediment (wet)
Transaction ID: 894
PO/Contract No.:
Date Analysed: July 6, 2021
Analyst(s): Xiang W.

Analytical Method: M10241: Methyl Mercury in Sediment by Distillation, Aqueous Ethylation, Purge and Trap, and CVAFS - Tekran 2700 Mercury Analyser (Version 1)

Detection Limit: The method detection limit (MDL) for this method is 0.04 ng/dry g. The MDL is the minimum concentration that can be reported with 99% confidence that the measured concentration exceeds zero and is based on the distillation of 50 mg of dry sample and the analysis of 1mL of a 13mL distillate.

For reporting purpose samples are flagged when the dry concentration is below the methods minimum level (ML= 0.15 ng/g).
As concentration rises above the MDL confidence that the analyte is present approaches 100% at and above the ML.

Estimated Uncertainty: Overall method uncertainty is expected to decrease as analyte concentration increases. When methyl mercury concentrations exceed the 0.2 ng/g the estimated uncertainty is ±26%. Method uncertainty is expressed at a 95% confidence level of (k=2).

Results authorized by Dr. Robert J. Flett, Chief Scientist

QUALITY DATA

Blanks		Pg of CH_3Hg in the Ethylation Blank	Mean Gross Peak Area	CH_3Hg in the Ethylation Blank (ng/L) assumes volume in the vial is 30mL
	Ethylation blank (H_2O+Reagents)	0.35	17.37	0.012
	Mean Eth. Blank (last 30 runs)	0.23		
		Net Pg CH_3Hg in the Method Blank (Eth. Blank subtracted)	Gross Peak Area	Equivalent CH_3Hg in the Method Blank (ng/g) [Eth. Blank subtracted] Uses the MeanWeight of all the samples in the batch
	Method Blank 1	0.06	20.14	0.005
	Method Blank 2	0.06	20.32	0.005
	Method Blank 3	0.20	26.99	0.016
	Mean Method Blank			0.008

Mean Calibration Factor (area units / pg)	49.06 ± 2.7 %RSD											
Spike Recovery Matrix Spike (MS) and Matrix Spike Duplicate (MSD)	Sample ID (Details)	Sample Type	Gross Peak Area	Weight of Distillate added to the Ethylation EPA Vial (g)	Total Weight of Distillate (g)	Weight of Sample added to the distiller (g)	Percent Weight Lost on Drying (%LOD)	Dry Weight of Reference Material	% CH_3Hg Recovery Used for Calculations	Net CH_3Hg as Hg (ng/g)	**CH_3Hg Recovery (%)**	
	PXP279-02R (A-14)	MS1	1704.74	0.30	13.30	0.523	-	-	100%	2.91	80.0	
		MS1D	1768.59	0.30	13.09	0.528	-	-	100%	2.92	81.6	%RPD=2
	Mean of Spike Recoveries										**80.8**	
QC Samples Reference Material (RM)	IAEA-475 (0.199 ng/g)	(beginning of run)	76.90	1.001	12.974	0.06319	2.092	0.062	100%	0.2	91.7	
		(end of run)	127.13	2.005	12.974	0.06319	2.092	0.062	100%	0.2	81.5	
	Mean of RM Recoveries									0.2	86.6	
Alternate Source Standard (A.S.S)	A.S.S.-Alfa ID1301 (1000 ng/L)		1545.24						100%	1038	**103.8**	

LAB ID	Sampling Details	Sample ID	Date Sampled	Time Sampled	Sample Type	Gross Peak Area	Weight of Distillate added to EPA Vial (g) =Vpd	Total Weight of the Distillate (g) = VTd	Weight of Wet Sample added to the distiller (g)	Percent Weight Lost on Drying (%LOD)	Dry Sample Weight by Calculation (g)	% CH_3Hg Recovery Used for Calculations	Net CH_3Hg as Hg in the sample (ng/g dry wt.) [Ethylation & Method Blank subtracted] [Recovery corrected] As Calculated	Net CH_3Hg as Hg in the sample (ng/g wet wt.) [Ethylation & Method Blank subtracted] [Recovery corrected] As Analyzed	
105110	PXP279-02R	A-14	June 14, 2021	14:05		963.03	0.32	13.13	0.562	40.8	0.333	80.8%	**2.89**	**1.71**	
105111	PXP280-02R	A-24	June 15, 2021	09:10		1789.32	0.30	13.22	0.516	68.8	0.161	80.8%	**12.2**	**3.79**	
105112	PXP283-02R	A-36	June 15, 2021	09:30		1495.92	0.30	13.11	0.519	29.0	0.368	80.8%	**4.40**	**3.12**	
105113	PXP292-02R	B-36	June 15, 2021	13:45		2613.49	0.30	13.27	0.514	49.4	0.260	80.8%	**11.1**	**5.59**	
105116	PXP310-02R	C-18	June 16, 2021	08:40		1428.56	0.30	13.40	0.532	59.8	0.214	80.8%	**7.41**	**2.98**	
105118	PXP319-02R	D-22	June 16, 2021	16:20		2897.24	0.30	13.40	0.528	81.9	0.095	80.8%	**33.7**	**6.10**	
105119	PXP338-02R	E-31	June 16, 2021	14:15	**DupA1**	941.74	0.30	13.32	0.556	29.7	0.391	80.8%	**2.63**	**1.85**	
105119	PXP338-02R	E-31	June 16, 2021	14:15	**DupA2**	922.54	0.30	13.41	0.550	29.7	0.387	80.8%	**2.62**	**1.84**	
105121	PXP342-02R	E-45	June 16, 2021	13:30	**DupB1**	4259.28	0.30	13.41	0.545	87.4	0.069	80.8%	**69.6**	**8.77**	
105121	PXP342-02R	E-45	June 16, 2021	13:30	**DupB2**	4264.93	0.30	13.57	0.523	87.4	0.066	80.8%	**73.0**	**9.20**	

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* : See 'Comments' section above for discussion.

Note: Results relate only to the items tested.

Dup : Duplicate - two subsamples of the same sample carried through the analytical procedure in an identical manner.

Methyl Mercury Results

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CLIENT: Bureau Veritas - Bedford:C1H4101
200 Bluewater Road, Suite 105
Bedford, NS B4B 1G9

Date Received: June 29, 2021
Sampling Date: June 15, 2021 to June 17, 2021
Date Issued: July 14, 2021

Matrix: Sediment (wet)
Transaction ID: 894
PO/Contract No.:
Date Analysed: July 8, 2021
Analyst(s): Xiang W.

Analytical Method: M10241: Methyl Mercury in Sediment by Distillation, Aqueous Ethylation, Purge and Trap, and CVAFS - Tekran 2700 Mercury Analyser (Version 1)

Detection Limit: The method detection limit (MDL) for this method is 0.04 ng/dry g. The MDL is the minimum concentration that can be reported with 99% confidence that the measured concentration exceeds zero and is based on the distillation of 50 mg of dry sample and the analysis of 1mL of a 13mL distillate.

For reporting purpose samples are flagged when the dry concentration is below the methods minimum level (ML= 0.15 ng/g).
As concentration rises above the MDL confidence that the analyte is present approaches 100% at and above the ML.

Estimated Uncertainty: Overall method uncertainty is expected to decrease as analyte concentration increases. When methyl mercury concentrations exceed the 0.2 ng/g the estimated uncertainty is ±26%. Method uncertainty is expressed at a 95% confidence level of (k=2).

Results authorized by Dr. Robert J. Flett, Chief Scientist

QUALITY DATA

Blanks		Pg of CH_3Hg in the Ethylation Blank	Mean Gross Peak Area	CH_3Hg in the Ethylation Blank (ng/L) assumes volume in the vial is 30mL
	Ethylation blank (H_2O+Reagents)	0.28	14.54	0.009
	Mean Eth. Blank (last 30 runs)	0.22		
		Net Pg CH_3Hg in the Method Blank (Eth. Blank subtracted)	Gross Peak Area	Equivalent CH_3Hg in the Method Blank (ng/g) [Eth. Blank subtracted] Uses the MeanWeight of all the samples in the batch
	Method Blank 1	0.13	21.62	0.015
	Method Blank 2	0.20	25.05	0.023
	Method Blank 3	-0.01	14.27	-0.001
	Mean Method Blank			0.013

Mean Calibration Factor (area untis / pg): 52.57 ± 1.4 %RSD

Spike Recovery (Matrix Spike (MS) and Matrix Spike Duplicate (MSD))	Sample ID (Details)	Sample Type	Gross Peak Area	Weight of Distillate added to the Ethylation EPA Vial (g)	Total Weight of Distillate (g)	Weight of Sample added to the distiller (g)	Percent Weight Lost on Drying (%LOD)	Dry Weight of Reference Material	% CH_3Hg Recovery Used for Calculations	Net CH_3Hg as Hg (ng/g)	**CH_3Hg Recovery (%)**	
	PXP309-02R (C-13)	MS1	2135.46	0.50	14.40	0.203	-	-	100%	5.72	78.2	
		MS1D	2238.22	0.50	14.25	0.211	-	-	100%	5.69	80.6	%RPD=3
	Mean of Spike Recoveries										**79.4**	
	FRES02 (23.9 ng/g)	(beginning of run)	1327.50	0.500	13.378	0.03057	1.397	0.030	100%	22.1	92.5	
		(end of run)	1296.72	0.502	13.378	0.03057	1.397	0.030	100%	21.5	89.9	
	Mean of RM Recoveries											
Alternate Source Standard (A.S.S)	A.S.S.-Alfa ID1301 (1000 ng/L)		1511.73						100%	949	**94.9**	

LAB ID	Sampling Details	Sample ID	Date Sampled	Time Sampled	Sample Type	Gross Peak Area	Weight of Distillate added to EPA Vial (g) =Vpd	Total Weight of the Distillate (g) = VTd	Weight of Wet Sample added to the distiller (g)	Percent Weight Lost on Drying (%LOD)	Dry Sample Weight by Calculation (g)	% CH_3Hg Recovery Used for Calculations	Net CH_3Hg as Hg in the sample (ng/g dry wt.) [Ethylation & Method Blank subtracted] [Recovery corrected] As Calculated	Net CH_3Hg as Hg in the sample (ng/g wet wt.) [Ethylation & Method Blank subtracted] [Recovery corrected] As Analyzed	
105114	PXP293-02R	B-37	June 15, 2021	11:05		333.17	0.50	13.40	0.238	27.3	0.173	79.4%	**1.16**	**0.84**	
105115	PXP309-02R	C-13	June 16, 2021	10:25		979.92	0.50	13.36	0.258	27.3	0.188	79.4%	**3.25**	**2.37**	
105117	PXP313-02R	D-07	June 16, 2021	11:00		481.50	0.50	13.31	0.224	22.5	0.174	79.4%	**1.68**	**1.30**	
105120	PXP340-02R	E-35	June 17, 2021	09:15		6528.20	0.50	13.40	0.218	39.7	0.131	79.4%	**31.6**	**19.1**	
105122	PXP357-02R	DUP-T	June 15, 2021		**DupA1**	380.71	0.50	13.23	0.228	21.3	0.179	79.4%	**1.27**	**1.00**	
105122	PXP357-02R	DUP-T	June 15, 2021		**DupA2**	348.50	0.50	13.21	0.232	21.3	0.183	79.4%	**1.13**	**0.89**	

Q:\Clients A-L\Bureau Veritas - Bedford\2021(894)\Methyl Mercury\MTSEDW070821XW1.xls

* : See 'Comments' section above for discussion.

Note: Results relate only to the items tested.

Dup : Duplicate - two subsamples of the same sample carried through the analytical procedure in an identical manner.

Your P.O. #: 73524259
Your Project #: 11222385-07-04
Site Location: GOLDBORO
Your C.O.C. #: N/A

Attention: Glen Merkley

GHD Limited
120 Western Parkway
Bedford, NS
CANADA B4B 0V2

Report Date: 2021/07/30
Report #: R6744463
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BV LABS JOB #: C1K3115
Received: 2021/07/21, 10:54

Sample Matrix: Soil
Samples Received: 12

Analyses	Quantity	Date Extracted	Date Analyzed	Laboratory Method	Analytical Method
Metals Leach TCLP/CGSB extraction	3	2021/07/27	2021/07/27	ATL SOP 00058	EPA 6020B R2 m
Metals Leach TCLP/CGSB extraction	4	2021/07/27	2021/07/28	ATL SOP 00058	EPA 6020B R2 m
Metals Leach TCLP/CGSB extraction	1	2021/07/27	2021/07/29	ATL SOP 00058	EPA 6020B R2 m
Metals Leach TCLP/CGSB extraction	3	2021/07/28	2021/07/29	ATL SOP 00058	EPA 6020B R2 m
Metals Leach TCLP/CGSB extraction	1	2021/07/29	2021/07/29	ATL SOP 00058	EPA 6020B R2 m
TCLP Inorganic extraction - pH	8	N/A	2021/07/27	ATL SOP 00035	EPA 1311 m
TCLP Inorganic extraction - pH	3	N/A	2021/07/28	ATL SOP 00035	EPA 1311 m
TCLP Inorganic extraction - pH	1	N/A	2021/07/29	ATL SOP 00035	EPA 1311 m
TCLP Inorganic extraction - Weight	8	N/A	2021/07/27	ATL SOP 00035	EPA 1311 m
TCLP Inorganic extraction - Weight	3	N/A	2021/07/28	ATL SOP 00035	EPA 1311 m
TCLP Inorganic extraction - Weight	1	N/A	2021/07/29	ATL SOP 00035	EPA 1311 m

Remarks:

Bureau Veritas is accredited to ISO/IEC 17025 for specific parameters on scopes of accreditation. Unless otherwise noted, procedures used by Bureau Veritas are based upon recognized Provincial, Federal or US method compendia such as CCME, MELCC, EPA, APHA.

All work recorded herein has been done in accordance with procedures and practices ordinarily exercised by professionals in Bureau Veritas' profession using accepted testing methodologies, quality assurance and quality control procedures (except where otherwise agreed by the client and Bureau Veritas in writing). All data is in statistical control and has met quality control and method performance criteria unless otherwise noted. All method blanks are reported; unless indicated otherwise, associated sample data are not blank corrected. Where applicable, unless otherwise noted, Measurement Uncertainty has not been accounted for when stating conformity to the referenced standard.

Bureau Veritas liability is limited to the actual cost of the requested analyses, unless otherwise agreed in writing. There is no other warranty expressed or implied. Bureau Veritas has been retained to provide analysis of samples provided by the Client using the testing methodology referenced in this report. Interpretation and use of test results are the sole responsibility of the Client and are not within the scope of services provided by Bureau Veritas, unless otherwise agreed in writing. Bureau Veritas is not responsible for the accuracy or any data impacts, that result from the information provided by the customer or their agent.

Solid sample results, except biota, are based on dry weight unless otherwise indicated. Organic analyses are not recovery corrected except for isotope dilution methods.
Results relate to samples tested. When sampling is not conducted by Bureau Veritas, results relate to the supplied samples tested.

Reference Method suffix “m” indicates test methods incorporate validated modifications from specific reference methods to improve performance.
* RPDs calculated using raw data. The rounding of final results may result in the apparent difference.

Your P.O. #: 73524259
Your Project #: 11222385-07-04
Site Location: GOLDBORO
Your C.O.C. #: N/A

Attention: Glen Merkley

GHD Limited
120 Western Parkway
Bedford, NS
CANADA B4B 0V2

Report Date: 2021/07/30
Report #: R6744463
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BV LABS JOB #: C1K3115
Received: 2021/07/21, 10:54

Encryption Key

Please direct all questions regarding this Certificate of Analysis to your Project Manager.
Atena Georgescu, Project Manager II
Email: Atena.Georgescu@bureauveritas.com
Phone# (902)420-0203 Ext:239

==========

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BV Labs Job #: C1K3115
Report Date: 2021/07/30

GHD Limited
Client Project #: 11222385-07-04
Site Location: GOLDBORO
Your P.O. #: 73524259
Sampler Initials: JV

RESULTS OF ANALYSES OF SOIL

BV Labs ID		QDR840		QDR841	QDR841		QDR842	QDR843	QDR844	
Sampling Date		2021/06/14		2021/06/15	2021/06/15		2021/06/15	2021/06/15	2021/06/15	
COC Number		N/A		N/A	N/A		N/A	N/A	N/A	
	UNITS	A-14	QC Batch	A-24	A-24 Lab-Dup	QC Batch	A-36	B-36	B-37	QC Batch
Inorganics										
Sample Weight (as received)	g	93	7490878	100	100	7490905	100	100	100	7485751
Initial pH	N/A	4.9	7490881	4.9	4.9	7490907	4.9	4.9	4.9	7485753
Final pH	N/A	4.9	7490881	4.9	4.9	7490907	4.9	4.9	4.9	7485753

QC Batch = Quality Control Batch
Lab-Dup = Laboratory Initiated Duplicate

BV Labs ID		QDR844	QDR845		QDR846		QDR847		QDR848	
Sampling Date		2021/06/15	2021/06/16		2021/06/16		2021/06/16		2021/06/16	
COC Number		N/A	N/A		N/A		N/A		N/A	
	UNITS	B-37 Lab-Dup	C-13	QC Batch	C-18	QC Batch	D-07	QC Batch	D-22	QC Batch
Inorganics										
Sample Weight (as received)	g	100	100	7485751	73	7490878	100	7485751	78	7490878
Initial pH	N/A	4.9	4.9	7485753	4.9	7490881	4.9	7485753	4.9	7490881
Final pH	N/A	4.9	4.9	7485753	4.9	7490881	4.9	7485753	4.9	7490881

QC Batch = Quality Control Batch
Lab-Dup = Laboratory Initiated Duplicate

BV Labs ID		QDR849	QDR850	QDR851	
Sampling Date		2021/06/16	2021/06/17	2021/06/16	
COC Number		N/A	N/A	N/A	
	UNITS	E-31	E-35	E-45	QC Batch
Inorganics					
Sample Weight (as received)	g	100	99	100	7485751
Initial pH	N/A	4.9	4.9	4.9	7485753
Final pH	N/A	4.9	4.9	4.9	7485753

QC Batch = Quality Control Batch

Bureau Veritas Laboratories 200 Bluewater Rd, Suite 105, Bedford, Nova Scotia Canada B4B 1G9 Tel: 902-420-0203 Toll-free: 800-565-7227 Fax: 902-420-8612 www.bvlabs.com

BV Labs Job #: C1K3115
Report Date: 2021/07/30

GHD Limited
Client Project #: 11222385-07-04
Site Location: GOLDBORO
Your P.O. #: 73524259
Sampler Initials: JV

ELEMENTS BY ICP/MS (SOIL)

BV Labs ID		QDR840		QDR841	QDR841		QDR842	QDR843		
Sampling Date		2021/06/14		2021/06/15	2021/06/15		2021/06/15	2021/06/15		
COC Number		N/A		N/A	N/A		N/A	N/A		
	UNITS	A-14	QC Batch	A-24	A-24 Lab-Dup	QC Batch	A-36	B-36	RDL	QC Batch
Metals										
Leachable Arsenic (As)	ug/L	500	7488191	370	350	7490336	<20	37	20	7485192

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
Lab-Dup = Laboratory Initiated Duplicate

BV Labs ID		QDR844	QDR844		QDR845			QDR846		QDR847		
Sampling Date		2021/06/15	2021/06/15		2021/06/16			2021/06/16		2021/06/16		
COC Number		N/A	N/A		N/A			N/A		N/A		
	UNITS	B-37	B-37 Lab-Dup	RDL	C-13	RDL	QC Batch	C-18	QC Batch	D-07	RDL	QC Batch
Metals												
Leachable Arsenic (As)	ug/L	1700	1900	20	6000	200	7485192	78	7488191	1600	20	7485192

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
Lab-Dup = Laboratory Initiated Duplicate

BV Labs ID		QDR848		QDR849	QDR850	QDR851		
Sampling Date		2021/06/16		2021/06/16	2021/06/17	2021/06/16		
COC Number		N/A		N/A	N/A	N/A		
	UNITS	D-22	QC Batch	E-31	E-35	E-45	RDL	QC Batch
Metals								
Leachable Arsenic (As)	ug/L	23	7488191	620	2600	81	20	7485192

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

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BV Labs Job #: C1K3115
Report Date: 2021/07/30

GHD Limited
Client Project #: 11222385-07-04
Site Location: GOLDBORO
Your P.O. #: 73524259
Sampler Initials: JV

GENERAL COMMENTS

Each temperature is the average of up to three cooler temperatures taken at receipt

Package 1	7.7°C
Package 2	7.7°C
Package 3	7.3°C

Sample QDR840 [A-14] : The minimum weight of 100g for the standard TCLP extraction, as per Reference Method EPA 1311 R1992, could not be achieved due to insufficient sample. Client consent has been received to proceed using the modified TCLP method. The uncertainty of the analysis may be increased, and the reported results may not be suitable for compliance purposes.

Sample QDR846 [C-18] : The minimum weight of 100g for the standard TCLP extraction, as per Reference Method EPA 1311 R1992, could not be achieved due to insufficient sample. Client consent has been received to proceed using the modified TCLP method. The uncertainty of the analysis may be increased, and the reported results may not be suitable for compliance purposes.

Sample QDR848 [D-22] : The minimum weight of 100g for the standard TCLP extraction, as per Reference Method EPA 1311 R1992, could not be achieved due to insufficient sample. Client consent has been received to proceed using the modified TCLP method. The uncertainty of the analysis may be increased, and the reported results may not be suitable for compliance purposes.

Sample QDR850 [E-35] : The minimum weight of 100g for the standard TCLP extraction, as per Reference Method EPA 1311 R1992, could not be achieved due to insufficient sample. Client consent has been received to proceed using the modified TCLP method. The uncertainty of the analysis may be increased, and the reported results may not be suitable for compliance purposes.

Results relate only to the items tested.

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BV Labs Job #: C1K3115
Report Date: 2021/07/30

GHD Limited
Client Project #: 11222385-07-04
Site Location: GOLDBORO
Your P.O. #: 73524259
Sampler Initials: JV

QUALITY ASSURANCE REPORT

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
7485192	BAN	Matrix Spike [QDR844-01]	Leachable Arsenic (As)	2021/07/28		NC	%	75 - 125
7485192	BAN	Spiked Blank	Leachable Arsenic (As)	2021/07/27		94	%	75 - 125
7485192	BAN	Method Blank	Leachable Arsenic (As)	2021/07/27	<20		ug/L	
7485192	BAN	RPD [QDR844-01]	Leachable Arsenic (As)	2021/07/27	14		%	35
7485751	EPU	Method Blank	Sample Weight (as received)	2021/07/27	NA		g	
7485751	EPU	RPD [QDR844-01]	Sample Weight (as received)	2021/07/27	0.23		%	N/A
7488191	BAN	Matrix Spike	Leachable Arsenic (As)	2021/07/29		101	%	75 - 125
7488191	BAN	Spiked Blank	Leachable Arsenic (As)	2021/07/29		106	%	75 - 125
7488191	BAN	Method Blank	Leachable Arsenic (As)	2021/07/29	<20		ug/L	
7488191	BAN	RPD	Leachable Arsenic (As)	2021/07/29	NC		%	35
7490336	BAN	Matrix Spike [QDR841-01]	Leachable Arsenic (As)	2021/07/29		99	%	75 - 125
7490336	BAN	Spiked Blank	Leachable Arsenic (As)	2021/07/29		98	%	75 - 125
7490336	BAN	Method Blank	Leachable Arsenic (As)	2021/07/29	<20		ug/L	
7490336	BAN	RPD [QDR841-01]	Leachable Arsenic (As)	2021/07/29	8.0		%	35
7490878	EPU	Method Blank	Sample Weight (as received)	2021/07/28	NA		g	
7490878	EPU	RPD	Sample Weight (as received)	2021/07/28	0.016		%	N/A
7490905	EPU	Method Blank	Sample Weight (as received)	2021/07/29	NA		g	
7490905	EPU	RPD [QDR841-01]	Sample Weight (as received)	2021/07/29	0.27		%	N/A

N/A = Not Applicable

Duplicate: Paired analysis of a separate portion of the same sample. Used to evaluate the variance in the measurement.

Matrix Spike: A sample to which a known amount of the analyte of interest has been added. Used to evaluate sample matrix interference.

Spiked Blank: A blank matrix sample to which a known amount of the analyte, usually from a second source, has been added. Used to evaluate method accuracy.

Method Blank: A blank matrix containing all reagents used in the analytical procedure. Used to identify laboratory contamination.

NC (Matrix Spike): The recovery in the matrix spike was not calculated. The relative difference between the concentration in the parent sample and the spike amount was too small to permit a reliable recovery calculation (matrix spike concentration was less than the native sample concentration)

NC (Duplicate RPD): The duplicate RPD was not calculated. The concentration in the sample and/or duplicate was too low to permit a reliable RPD calculation (absolute difference <= 2x RDL).

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BV Labs Job #: C1K3115
Report Date: 2021/07/30

GHD Limited
Client Project #: 11222385-07-04
Site Location: GOLDBORO
Your P.O. #: 73524259
Sampler Initials: JV

VALIDATION SIGNATURE PAGE

The analytical data and all QC contained in this report were reviewed and validated by:

Eric Dearman, Scientific Specialist

Mike MacGillivray, Scientific Specialist (Inorganics)

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CHAIN OF CUSTODY RECORD

COC #: Page 1 OF 7

Invoice Information		Report Information (if differs from Invoice)		Project Information (where applicable)		Turnaround Time (TAT) Required	
Company Name:	GHD Limited	Company Name:	GHD Limited	Quotation #:	Anaconda Rates	X	Regular TAT (5 business days) Most analyses
Contact Name:	Accounts Payable - 762	Contact Name:	Glen Merkley	Purchase Order#:	To follow	PLEASE PROVIDE ADVANCE NOTICE FOR RUSH PROJECTS	
Address:	120 Western Parkway	Address:	120 Western Parkway	Project #:	11222385	IF RUSH please specify date (Surcharges will be applied)	
	Bedford, NS PC: B4B 0V2		Bedford, NS PC: B4B 0V2	Site Location:	Goldboro	DATE REQUIRED:	
Phone:	(902)468-1248 / Fax: (902)468-2207	Phone:	(902) 802-4790	Site Province:	Nova Scotia		
Email:	invoicing-canada@ghd.com	Email:	glen.merkley@ghd.com	Site #:			
Report Copies:		Report Copies:		Sampled By:	JV / JR / DB / ER		

Laboratory Use Only

CUSTODY SEAL Present	CUSTODY SEAL Intact	COOLER TEMPERATURES	COOLER TEMPERATURES
		7, 8, 8	
		6, 8, 7	
		6, 7, 9	

COOLING MEDIA PRESENT Y / N

SAMPLES MUST BE KEPT COOL (< 10 °C) FROM TIME OF SAMPLING UNTIL DELIVERY TO BV LABS

Analysis Requested

	SAMPLE IDENTIFICATION	DATE SAMPLED (YYYY/MM/DD)	TIME SAMPLED (HH:MM)	MATRIX	# OF CONTAINERS SUBMITTED	FIELD FILTERED &PRESERVED	FIELD FILTRATION REQUIRED	LAB FILTRATION REQUIRED	RCAP-MS (Total Metals) Well / Surface water	RCAP-MS (Dissolved Metals) Ground waters	Metals (Water): Total Digest (Default Method) for well water & surface water	Metals (Water): Dissolved for ground water	Metals (Water): Mercury (CIRCLE) TOTAL / DISSOLVED	Metals (Soil): Metals & Mercury Default Aqua Regia Extractable (Available) Digest	Metals (Soil): Hot Water Soluble Boron (required for CCME Agricultural/ Landfill)	General chemistry (Soil)	TCLP (Soil)	Total Organic Carbon (TOC)	Methyl Mercury	Grain Size	Total Sulphur	Total Carbon	Total Inorganic Carbon	Sulphide S	Modified Neutralization Potential		HOLD: DO NOT ANALYZE	Regulatory Requirements (Specify) / COMMENTS
	A-05	6/14/2021	3:40 PM	Soil	1									X		X												
2	A-08	6/14/2021	2:45 PM	Soil	1									X		X												
3	A-13	6/14/2021	5:35 PM	Soil	1									X		X												
4	A-14	6/14/2021	2:05 PM	Soil	3									X		X	X	X	X	X								
5	A-24	6/15/2021	9:10 AM	Soil	4									X		X	X	X	X	X	X	X	X	X	X			
6	A-26	6/14/2021	3:40 PM	Soil	1									X		X												
7	A-28	6/15/2021	9:00 AM	Soil	1									X		X												
8	A-36	6/15/2021	9:30 AM	Soil	3									X		X	X	X	X	X								
9	A-41	6/14/2021	4:55 PM	Soil	1									X		X												
10	A-45	6/14/2021	5:30 PM	Soil	1									X		X												

RELINQUISHED BY: (Signature/Print)	DATE: (YYYY/MM/DD)	TIME: (HH:MM)	RECEIVED BY: (Signature/Print)	DATE: (YYYY/MM/DD)	TIME: (HH:MM)	BV LABS JOB #
Emma Ruard	2021/06/22	4:30pm	MATT GRACE			C1H41Ø1 C1K3115

White: Maxxam Pink: Client

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CHAIN OF CUSTODY RECORD

COC #:

Invoice Information		Report Information (if differs from invoice)		Project Information (where applicable)		Turnaround Time (TAT) Required	
Company Name:	GHD Limited	Company Name:	GHD Limited	Quotation #:	Anaconda Rates	X	Regular TAT (5 business days) Most analyses
Contact Name:	Accounts Payable - 762	Contact Name:	Glen Merkley	Purchase Order#:	To follow	PLEASE PROVIDE ADVANCE NOTICE FOR RUSH PROJECTS	
Address:	120 Western Parkway	Address:	120 Western Parkway	Project #:	11223385	IF RUSH please specify date (Surcharges will be applied)	
	Bedford, NS PC: B4B 0V2		Bedford, NS PC: B4B 0V2	Site Location:	Goldboro	DATE REQUIRED:	
Phone:	(902)468-1248 / Fax: (902)468-2207	Phone:	(902) 802-4790	Site Province:	Nova Scotia		
Email:	invoicing-canada@ghd.com	Email:	glen.merkley@ghd.com	Site #:			
Report Copies:		Report Copies:		Sampled By:	JV / IR / DB / ER		

Laboratory Use Only

CUSTODY SEAL Present	CUSTODY SEAL Intact	COOLER TEMPERATURES	COOLER TEMPERATURES
		7, 8, 8	
		8, 8, 7	
		6, 7, 9	

COOLING MEDIA PRESENT Y / N

SAMPLES MUST BE KEPT COOL (< 10 °C) FROM TIME OF SAMPLING UNTIL DELIVERY TO BV LABS

Analysis Requested

	SAMPLE IDENTIFICATION	DATE SAMPLED (YYYY/MM/DD)	TIME SAMPLED (HH:MM)	MATRIX	# OF CONTAINERS SUBMITTED	FIELD FILTERED & PRESERVED	LAB FILTRATION REQUIRED	RCAP-MS (Total Metals) Well / Surface water	RCAP-MS (Dissolved Metals) Ground waters	Metals (Water): Total Digest (Default Method) for well water & surface water	Metals (Water): Dissolved for ground water	Metals (Water): Mercury (CIRCLE) TOTAL / DISSOLVED	Metals (Soil): Metals & Mercury (Default Acid Extractable (Available) Digest	Metals (Soil): Hot Water Soluble Boron (required for CCME Agricultural / Landfill)	General chemistry (Soil)	TCLP (Soil)	Total Organic Carbon (TOC)	Methyl Mercury	Grain Size	Total Sulphur	Total Carbon	Total Inorganic Carbon	Sulphate S	Modified Neutralization Potential		HOLD: DO NOT ANALYZE	Regulatory Requirements (Specify)
1	B-04	6/15/2021	2:50 PM	Soil	1								X		X												
2	B-06	6/15/2021	11:05 AM	Soil	1								X		X												
3	B-13	6/15/2021	12:40 PM	Soil	1								X		X												
4	B-21	6/15/2021	2:30 PM	Soil	1								X		X												
5	B-24	6/15/2021	11:30 AM	Soil	1								X		X												
6	B-36	6/15/2021	1:45 PM	Soil	3								X		X	X	X	X	X								
7	B-37	6/15/2021	11:05 AM	Soil	4								X		X	X	X	X	X	X	X	X	X	X	X		
8	B-38	6/15/2021	12:00 PM	Soil	2								X		X					X	X	X	X	X			
9	B-40	6/15/2021	10:15 AM	Soil	1								X		X												
10	B-46	6/15/2021	3:45 PM	Soil	1								X		X												

RELINQUISHED BY: (Signature/Print)	DATE: (YYYY/MM/DD)	TIME: (HH:MM)	RECEIVED BY: (Signature/Print)	DATE: (YYYY/MM/DD)	TIME: (HH:MM)	BV LABS JOB #
Emma Rivard	2021/06/22	4:30pm	MAITGRACE			C1H4101 C1K3115

Unless otherwise agreed to in writing, work submitted on this Chain of Custody is subject to BV Labs standard Terms and Conditions. Signing of this Chain of Custody document is acknowledgment and acceptance of our terms which are available for viewing at www.bvlabs.com

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CHAIN OF CUSTODY RECORD

COC #:

Invoice Information		Report Information (if differs from invoice)		Project Information (where applicable)		Turnaround Time (TAT) Required
Company Name:	GHD Limited	Company Name:	GHD Limited	Quotation #:	Anaconda Rates	X Regular TAT (5 business days) Most analyses
Contact Name:	Accounts Payable - 762	Contact Name:	Glen Merkley	Purchase Order#	To follow	PLEASE PROVIDE ADVANCE NOTICE FOR RUSH PROJECTS
Address:	120 Western Parkway	Address:	120 Western Parkway	Project #:	11222385	IF RUSH please specify date (Surcharges will be applied)
	Bedford, NS PC: B4B 0V2		Bedford, NS PC: B4B 0V2	Site Location:	Goldboro	DATE REQUIRED:
Phone:	(902)468-1248 / Fax: (902)468-2207	Phone:	(902) 802-4790	Site Province:	Nova Scotia	
Email:	invoicing-canada@ghd.com	Email:	glen.merkley@ghd.com	Site #:		
Report Copies:		Report Copies:		Sampled By:	JV / IR / DB / ER	

Laboratory Use Only

CUSTODY SEAL Present	CUSTODY SEAL Intact	COOLER TEMPERATURES	COOLER TEMPERATURES
		7, 8, 8	
		8, 8, 7	
		6, 7, 9	

COOLING MEDIA PRESENT Y / N

SAMPLES MUST BE KEPT COOL (< 10 °C) FROM TIME OF SAMPLING UNTIL DELIVERY TO BV LABS

Analysis Requested

	SAMPLE IDENTIFICATION	DATE SAMPLED (YYYY/MM/DD)	TIME SAMPLED (HH:MM)	MATRIX	# OF CONTAINERS SUBMITTED	FIELD FILTERED & PRESERVED	LAB FILTRATION REQUIRED	RCAP-MS (Total Metals) Well / Surface water	RCAP-MS (Dissolved Metals) Ground waters	Metals (Water): Total Digest (Default Method) Tap well water & surface water	Metals (Water): Dissolved for ground water	Metals (Water): Mercury (CIRCLE) TOTAL / DISSOLVED	Metals (Soil): Metals & Mercury (Default Aqua Regia Extractable (Available) Digest)	Metals (Soil): Hot Water Soluble Boron (required for CCME Agricultural/ Landfill)	General chemistry (Soil)	TCLP (Soil)	Total Organic Carbon (TOC)	Methyl Mercury	Grain Size	Total Sulphur	Total Carbon	Total Inorganic Carbon	Sulphate S	Modified Neutralization Potential		HOLD- DO NOT ANALYZE	Regulatory Requirements (Specify) / COMMENTS
1	B-47	6/15/2021	3:10 PM	Soil	1								X		X											
2	B-56	6/15/2021	1:05 PM	Soil	1								X		X											
3	B-63	6/15/2021	4:30 PM	Soil	1								X		X											
4	B-67	6/15/2021	12:40 PM	Soil	1								X		X											
5	B-69	6/16/2021	3:20 PM	Soil	1								X		X											
6	C-01	6/16/2021	9:50 AM	Soil	1								X		X											
7	C-03	6/16/2021	11:10 AM	Soil	1								X		X											
8	C-07	6/16/2021	9:10 AM	Soil	1								X		X											
9	C-13	6/16/2021	10:25 AM	Soil	3								X		X	X	X	X	X	X						
10	C-18	6/16/2021	8:40 AM	Soil	3								X		X	X	X	X	X	X						

RELINQUISHED BY: (Signature/Print)	DATE: (YYYY/MM/DD)	TIME: (HH:MM)	RECEIVED BY: (Signature/Print)	DATE: (YYYY/MM/DD)	TIME: (HH:MM)	BV LABS JOB #
Emma Rivard	2021/06/22	4:30pm	MATT GAKE			C1H4101
						CK5115

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200 Bluewater Road, Suite 105, Bedford, Nova Scotia B4B 1G9 Tel: 902-420-0203 Fax: 902-420-8612 Toll Free: 1-800-565-7227
49-55 Elizabeth Avenue, St John's, NL A1A 1W9 Tel: 709-754-0203 Fax: 709-754-8612 Toll Free: 1-888-402-7227
465 George Street, Unit G, Sydney, NS B1P 1K5 Tel: 902-567-1255 Fax: 902-539-8504 Toll Free: 1-888-535-7770
www.bvlabs.com E-mail: customerservicebedford@bvlabs.com

CHAIN OF CUSTODY RECORD

COC #:

Invoice Information		Report Information (if differs from invoice)		Project Information (where applicable)		Turnaround Time (TAT) Required
Company Name:	GHD Limited	Company Name:	GHD Limited	Quotation #:	Anaconda Rates	X Regular TAT (5 business days) Most analyses
Contact Name:	Accounts Payable - 762	Contact Name:	Glen Merkley	Purchase Order#:	To follow	PLEASE PROVIDE ADVANCE NOTICE FOR RUSH PROJECTS
Address:	120 Western Parkway	Address:	120 Western Parkway	Project #:	11222385	IF RUSH please specify date (Surcharges will be applied)
	Bedford, NS PC: B4B 0V2		Bedford, NS PC: B4B 0V2	Site Location:	Goldboro	DATE REQUIRED:
Phone:	(902)468-1248 / Fax: (902)468-2207	Phone:	(902) 802-4790	Site Province:	Nova Scotia	
Email:	invoicing-canada@ghd.com	Email:	glen.merkley@ghd.com	Site #:		
Report Copies:		Report Copies:		Sampled By:	JV / JR / DB / ER	

Laboratory Use Only

CUSTODY SEAL Present	CUSTODY SEAL Intact	COOLER TEMPERATURES	COOLER TEMPERATURES
		7, 8, 8	
		6, 8, 7	
		6, 7, 9	

COOLING MEDIA PRESENT Y / N

SAMPLES MUST BE KEPT COOL (< 10 °C) FROM TIME OF SAMPLING UNTIL DELIVERY TO BV LABS

Analysis Requested

	SAMPLE IDENTIFICATION	DATE SAMPLED (YYYY/MM/DD)	TIME SAMPLED (HH:MM)	MATRIX	# OF CONTAINERS SUBMITTED	FIELD FILTERED & PRESERVED	LAB FILTRATION REQUIRED	RCAP-MS [Total Metals] Well / Surface water	RCAP-MS [Dissolved Metals] Ground waters	Metals (Water): Total Digest (Default Method) for well water & surface water	Metals (Water): Dissolved for ground water	Metals (Water): Mercury (CIRCLE) TOTAL / DISSOLVED	Metals (Soil): Metals & Mercury (Default Aqua Regia Extractable /Available) Digest	Metals (Soil): Hot Water Soluble Boron (required for CCME Agricultural/ Landfill)	General chemistry (Soil)	TCLP (Soil)	Total Organic Carbon (TOC)	Methyl Mercury	Grain Size	Total Sulphur	Total Carbon	Total Inorganic Carbon	Sulphate S	Modified Neutralization Potential		HOLD - DO NOT ANALYZE	Regulatory Requirements (Specify) / COMMENTS
1	C-22	6/16/2021	12:00 PM	Soil	1								X		X											
2	D-02	6/16/2021	10:30 AM	Soil	1								X		X											
3	D-07	6/16/2021	11:00 AM	Soil	4								X		X	X	X	X	X	X	X	X	X	X		
4	D-08	6/16/2021	2:35 PM	Soil	1								X		X											
5	D-09	6/16/2021	1:45 PM	Soil	1								X		X											
6	D-12	6/16/2021	1:20 PM	Soil	1								X		X											
7	D-19	6/16/2021	11:25 AM	Soil	1								X		X											
8	D-21	6/16/2021	4:35 PM	Soil	1								X		X											
9	D-22	6/16/2021	4:20 PM	Soil	4								X		X	X	X	X	X	X	X	X	X	X		
10	D-34	6/16/2021	11:45 AM	Soil	1								X		X											

RELINQUISHED BY: (Signature/Print)	DATE: (YYYY/MM/DD)	TIME: (HH:MM)	RECEIVED BY:(Signature/Print)	DATE: (YYYY/MM/DD)	TIME: (HH:MM)	BV LABS JOB #
Emma Rivard	2021/06/22	4:30pm	MATT GRAY			C1H4101
						C1K5115

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49-55 Elizabeth Avenue, St John's, NL A1A 1W9 Tel 709-754-0203 Fax 709-754-8612 Toll Free 1-888-492-7227
485 George Street,Unit G Sydney, NS B1P 1K5 Tel 902-567-1255 Fax 902-539-6504 Toll Free 1-888-535-7770
www.bvlabs.com E-mail: customerservicebedford@bvlabs.com

CHAIN OF CUSTODY RECORD

COC #:

Invoice Information		Report Information (if differs from Invoice)		Project Information (where applicable)		Turnaround Time (TAT) Required
Company Name:	GHD Limited	Company Name:	GHD Limited	Quotation #:	Anaconda Rates	X Regular TAT (5 business days) Most analyses
Contact Name:	Accounts Payable - 762	Contact Name:	Glen Merkley	Purchase Order#:	To follow	PLEASE PROVIDE ADVANCE NOTICE FOR RUSH PROJECTS
Address:	120 Western Parkway	Address:	120 Western Parkway	Project #:	11222385	IF RUSH please specify date (Surcharges will be applied)
	Bedford, NS PC: B4B 0V2		Bedford, NS PC: B4B 0V2	Site Location:	Goldboro	DATE REQUIRED:
Phone:	(902)468-1248 / Fax: (902)468-2207	Phone:	(902) 802-4790	Site Province:	Nova Scotia	
Email:	invoicing-canada@ghd.com	Email:	glen.merkley@ghd.com	Site #:		
Report Copies:		Report Copies:		Sampled By:	JV / JR / DB / ER	

Laboratory Use Only			
CUSTODY SEAL Present	CUSTODY SEAL Intact	COOLER TEMPERATURES	COOLER TEMPERATURES
		7, 8, 8	
		8, 8, 7	
		6, 7, 9	

COOLING MEDIA PRESENT Y / N

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Analysis Requested

	SAMPLE IDENTIFICATION	DATE SAMPLED (YYYY/MM/DD)	TIME SAMPLED (HH:MM)	MATRIX	# OF CONTAINERS SUBMITTED	FIELD FILTERED & PRESERVED	LAB FILTRATION REQUIRED	RCAP-MS (Total Metals) Well / Surface water	RCAP-MS (Dissolved Metals) Ground waters	Metals (Water): Total Digest (Default Method) for well water & surface water	Metals (Water): Dissolved for ground water	Metals (Water): Mercury (CIRCLE) TOTAL / DISSOLVED	Metals (Soil): Metals & Mercury (Default Aqua Regia Extractable (Available) Digest	Metals (Soil): Hot Water Soluble Boron (required for CCME Agricultural/ Landfill)	General chemistry (Soil)	TCLP (Soil)	Total Organic Carbon (TOC)	Methyl Mercury	Grain Size	Total Sulphur	Total Carbon	Total Inorganic Carbon	Sulphate S	Modified Neutralization Potential		HOLD- DO NOT ANALYZE	Regulatory Requirements (Specify) / COMMENTS
1	E-05	6/16/2021	4:11 PM	Soil	1								X		X												
2	E-08	6/16/2021	3:15 PM	Soil	1								X		X												
3	E-11	6/17/2021	8:35 AM	Soil	1								X		X												
4	E-22	6/17/2021	9:15 AM	Soil	1								X		X												
5	E-31	6/16/2021	2:15 PM	Soil	3								X		X	X	X	X	X	X							
6	E-33	6/17/2021	8:55 AM	Soil	1								X		X												
7	E-35	6/17/2021	9:15 AM	Soil	4								X		X	X	X	X	X	X	X	X	X	X			
8	E-40	6/17/2021	10:05 AM	Soil	1								X		X												
9	E-45	6/16/2021	1:30 PM	Soil	3								X		X	X	X	X	X	X							
10	E-46	6/17/2021	9:30 AM	Soil	1								X		X												

RELINQUISHED BY: (Signature/Print)	DATE: (YYYY/MM/DD)	TIME: (HH:MM)	RECEIVED BY:(Signature/Print)	DATE: (YYYY/MM/DD)	TIME: (HH:MM)	BV LABS JOB #
Emma Kiard	2021/06/22	4:30pm	MATT CRACE			C1H4101 C1K3115

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Laboratory Use Only			
CUSTODY SEAL Present	CUSTODY SEAL Intact	COOLER TEMPERATURES	COOLER TEMPERATURES
		7, 6, 8	
		8, 8, 7	
		6, 2, 4	

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1	E-47	6/17/2021	10:20 AM	Soil	1								X		X											
2	E-55	6/17/2021	11:00 AM	Soil	1								X		X											
3	E-56	6/17/2021	9:45 AM	Soil	1								X		X											
4	E-62	6/17/2021	10:20 AM	Soil	1								X		X											
5	E-68	6/16/2021	8:45 AM	Soil	1								X		X											
6	E-74	6/16/2021	8:55 AM	Soil	1								X		X											
7	DUP-A	6/14/2021	--	Soil	1								X		X											
8	DUP-B	6/15/2021	--	Soil	1								X		X											
9	DUP-C	6/16/2021	--	Soil	1								X		X											
10	DUP-D	6/16/2021	--	Soil	1								X		X											

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Emma Rivard	2021/06/12	4:30pm	MATTOMICE			C1H4101 C1K3115

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ATL FCD 00149 / 25

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		8, 8, 7	
		6, 7, 9	

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1	DUP-E	6/16/2021	--	Soil	1								X		X											
2	DUP-F	6/17/2021	--	Soil	1								X		X											
3	DUP-T	6/15/2021	--	Soil	2											X	X	X	X	X	X	X	X	X		
4																										
5																										
6																										
7																										
8																										
9																										
10																										

RELINQUISHED BY: (Signature/Print)	DATE: (YYYY/MM/DD)	TIME: (HH:MM)	RECEIVED BY: (Signature/Print)	DATE: (YYYY/MM/DD)	TIME: (HH:MM)	BV LABS JOB #
Emma Rivard	2021/06/22	4:30pm	MATT GRACE			C1H4101
						C1K3115

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White: Maxxam Pink: Client

ICP - 34 Certificate

Client: Anaconda Mining Inc.
Geologist: Alana Haysom
Project: 2-500100-D175
Sample: Soil

DskFile: 595-2127112 - ICP

DateIn: September 1, 2021
DateOut: October 5, 2021

EASTERN Analytical
Email: info@easternanalytical.ca
P.O. Box 187
403 Little Bay Road Springdale, NL A0J 1T0
Phone: 709-673-3909 / Fax: 709-673-3408

Signed by:

Results apply to samples as submitted.

Concentrations in assay range may cause interferences in associated elements.

Sample Number	Ag ppm	Al %	As ppm	Ba ppm	Be ppm	Bi ppm	Ca %	Cd ppm	Ce ppm	Co ppm	Cr ppm	Cu ppm	Fe %	In ppm	K %	La ppm	Mg %	Mn ppm	Mo ppm	Na %	Ni ppm	P %	Pb ppm	S %	Sb ppm	Se ppm	Sn ppm	Sr ppm	Ti %	U ppm	V ppm	W ppm	Zn ppm	Zr ppm
BLANK	<0.2	<0.01	<5	<5	<0.5	<2	<0.01	<0.5	<2	<2	<5	<5	<0.01	<2	<0.01	<1	<0.01	<1	<1	<0.01	<1	<0.01	<2	<0.01	<3	<10	<10	<1	<0.01	<2	<1	<10	<5	<1
STD-OREAS-923	1.6	7.34	8	431	2.5	22	0.47	<0.5	82	24	74	4233	6.44	<2	2.54	41	1.68	958	<1	0.31	35	0.06	81	0.69	<3	<10	14	42	0.42	3	94	<10	342	115
ANX-A1a	<0.2	6.21	>1000	516	3.3	<2	0.61	7.0	157	11	172	25	3.69	<2	2.13	75	0.61	1312	3	0.60	98	0.07	37	0.19	<3	<10	<10	110	0.30	3	64	<10	89	84
ANX-A1b	<0.2	5.62	639	430	3.2	<2	0.45	0.7	112	5	43	24	2.08	<2	1.81	58	0.51	703	1	0.52	14	0.13	34	0.24	<3	<10	<10	90	0.28	<2	53	<10	60	72
ANX-A2a	<0.2	6.78	>1000	576	3.5	<2	0.43	0.7	154	8	43	22	2.87	<2	2.40	78	0.75	1014	1	0.46	17	0.08	32	0.27	<3	<10	<10	90	0.31	<2	71	<10	85	86
ANX-A2b	<0.2	6.76	>1000	568	3.6	<2	0.46	1.2	164	8	138	26	3.00	<2	2.43	84	0.71	1099	1	0.47	21	0.08	31	0.30	5	<10	<10	89	0.29	2	68	<10	93	86
ANX-A3a	<0.2	7.96	317	711	3.7	<2	0.45	1.0	178	3	47	15	2.20	<2	3.01	91	0.79	486	1	0.52	12	0.07	29	0.18	4	<10	<10	99	0.34	<2	84	<10	65	103
ANX-A3b	<0.2	6.68	281	577	3.2	<2	0.41	0.9	146	4	38	17	1.89	<2	2.48	75	0.66	462	1	0.45	11	0.07	27	0.27	<3	<10	<10	85	0.29	<2	68	<10	64	85
ANX-A4a	<0.2	6.24	913	518	2.9	<2	0.57	1.7	107	5	34	22	1.78	<2	2.19	59	0.55	939	2	0.41	13	0.08	31	0.40	<3	<10	<10	86	0.26	<2	61	<10	47	75
ANX-A4b	<0.2	5.35	598	418	2.6	<2	0.49	1.4	81	4	41	18	1.35	<2	1.70	47	0.41	733	1	0.45	14	0.09	21	0.41	<3	<10	<10	83	0.25	<2	50	<10	39	65
ANX-A4b DUP	<0.2	4.95	387	386	2.3	<2	0.44	0.8	75	3	43	16	1.33	<2	1.51	43	0.38	691	1	0.41	9	0.08	26	0.40	<3	<10	<10	76	0.23	<2	47	<10	37	61
ANX-A5a	0.2	2.55	475	154	1.6	<2	0.39	<0.5	64	6	17	17	1.52	<2	0.43	40	0.11	858	1	0.23	12	0.11	20	0.58	<3	<10	<10	58	0.13	<2	21	<10	36	29
ANX-A5b	0.4	2.91	699	194	1.5	<2	0.47	1.6	70	4	22	11	1.80	<2	0.58	40	0.13	1198	1	0.30	8	0.11	21	0.42	<3	<10	<10	74	0.17	2	27	<10	42	38
ANX-A6a	<0.2	3.21	385	225	1.7	<2	0.61	0.6	76	4	29	13	1.27	<2	0.72	42	0.16	1428	2	0.30	11	0.13	18	0.50	<3	<10	<10	83	0.19	<2	29	<10	24	46
ANX-A6b	0.2	3.58	>1000	278	2.3	<2	0.77	0.8	238	9	35	25	3.31	<2	0.96	112	0.22	3118	2	0.30	16	0.09	48	0.54	<3	<10	<10	102	0.18	<2	41	<10	81	53
ANX-A7a	<0.2	3.37	492	287	1.8	<2	0.92	0.5	83	5	35	13	1.49	<2	0.97	43	0.25	1586	1	0.29	13	0.07	18	0.57	<3	<10	<10	111	0.17	<2	35	<10	51	46
ANX-A7b	0.3	6.22	>1000	527	4.2	<2	0.88	2.3	290	25	63	48	3.19	<2	2.15	133	0.60	1780	2	0.29	44	0.08	79	0.60	<3	<10	<10	107	0.22	<2	71	<10	305	68
ANX-A8a	<0.2	9.35	582	1082	6.1	<2	0.27	0.8	306	5	61	18	2.74	<2	5.00	155	1.25	459	1	0.39	18	0.04	31	0.12	<3	<10	<10	73	0.38	<2	125	<10	81	115
ANX-A8a DUP	<0.2	11.15	504	1127	6.1	<2	0.28	1.4	337	6	55	19	2.97	<2	5.04	168	1.34	510	<1	0.38	18	0.05	33	0.14	5	<10	<10	79	0.40	<2	132	<10	88	121
ANX-A9a	0.3	4.74	>1000	379	2.8	<2	0.41	3.9	140	12	34	22	3.60	<2	1.47	72	0.44	1601	1	0.22	17	0.10	31	0.40	<3	<10	<10	67	0.19	2	49	<10	97	50
ANX-A9b	<0.2	3.96	>1000	307	2.7	<2	0.50	1.1	172	11	26	28	3.57	<2	1.13	87	0.34	1216	1	0.28	22	0.08	39	0.46	<3	<10	<10	75	0.16	2	43	<10	116	47
ANX-D2a	<0.2	6.09	>1000	489	2.8	<2	0.56	5.6	49	7	33	14	3.80	<2	2.49	25	1.00	587	<1	0.73	23	0.05	28	0.19	5	<10	<10	149	0.35	4	58	<10	99	66
ANX-D2b	<0.2	6.23	>1000	500	3.0	<2	0.57	4.9	54	7	30	16	3.74	<2	2.62	28	1.09	595	<1	0.76	23	0.05	28	0.15	5	<10	<10	152	0.33	3	59	<10	111	62
ANX-D3a	0.4	6.05	>1000	491	2.6	<2	0.49	18.9	53	9	43	50	4.87	<2	2.46	27	0.99	551	<1	0.72	26	0.06	125	0.30	20	<10	<10	134	0.34	5	62	<10	98	71
ANX-D4a	0.6	5.92	>1000	511	2.7	<2	0.51	16.8	53	12	75	45	4.89	<2	2.49	28	0.90	555	2	0.67	31	0.06	153	0.47	25	<10	<10	131	0.37	4	61	<10	115	72
ANX-D5a	0.3	5.98	>1000	518	3.0	<2	0.50	16.1	47	7	49	26	3.70	<2	2.54	24	0.79	492	1	0.70	22	0.05	91	0.18	14	<10	<10	134	0.37	3	58	<10	78	69
ANX-D6a	0.2	4.33	688	326	2.0	<2	0.35	0.6	38	2	152	16	2.26	<2	1.29	20	0.50	330	1	0.50	16	0.05	50	0.18	<3	<10	<10	94	0.26	2	45	<10	35	51
ANX-D1A	0.2	4.86	>1000	409	2.3	<2	0.40	10.4	40	11	43	26	3.74	<2	2.11	21	0.97	475	<1	0.50	33	0.05	44	0.57	7	<10	<10	113	0.29	3	51	<10	87	56
ANX-D7a	<0.2	5.93	>1000	498	2.9	<2	0.63	7.3	43	5	53	34	3.54	<2	2.37	23	0.87	602	<1	0.72	22	0.07	37	0.12	18	<10	<10	172	0.38	4	56	<10	151	69
ANX-D7b	<0.2	4.94	>1000	423	2.5	<2	0.69	28.4	38	5	43	33	5.95	<2	1.91	21	0.72	650	<1	0.60	17	0.08	33	0.07	22	<10	<10	213	0.34	5	50	<10	163	60
ANX-D8a	0.2	10.07	>1000	968	3.6	<2	0.55	4.3	59	4	61	17	4.30	<2	4.36	30	1.48	672	1	0.58	18	0.07	28	0.02	11	<10	<10	132	0.38	4	109	<10	81	111

Your P.O. #: PENDING
Your Project #: GOLDBORO
Your C.O.C. #: N/A

Attention: Derek Bullock

Anaconda Mining Inc
Goldboro Gold Mine
570 Goldbrook Road
Goldboro, NS
Canada B0H 1L0

Report Date: 2021/09/27
Report #: R6829332
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BV LABS JOB #: C1R4583
Received: 2021/09/23, 09:20

Sample Matrix: Soil
Samples Received: 15

Analyses	Quantity	Date Extracted	Date Analyzed	Laboratory Method	Analytical Method
Metals Solids Acid Extr. ICPMS	15	2021/09/27	2021/09/27	ATL SOP 00058	EPA 6020B R2 m

Remarks:

Bureau Veritas is accredited to ISO/IEC 17025 for specific parameters on scopes of accreditation. Unless otherwise noted, procedures used by Bureau Veritas are based upon recognized Provincial, Federal or US method compendia such as CCME, MELCC, EPA, APHA.

All work recorded herein has been done in accordance with procedures and practices ordinarily exercised by professionals in Bureau Veritas' profession using accepted testing methodologies, quality assurance and quality control procedures (except where otherwise agreed by the client and Bureau Veritas in writing). All data is in statistical control and has met quality control and method performance criteria unless otherwise noted. All method blanks are reported; unless indicated otherwise, associated sample data are not blank corrected. Where applicable, unless otherwise noted, Measurement Uncertainty has not been accounted for when stating conformity to the referenced standard.

Bureau Veritas liability is limited to the actual cost of the requested analyses, unless otherwise agreed in writing. There is no other warranty expressed or implied. Bureau Veritas has been retained to provide analysis of samples provided by the Client using the testing methodology referenced in this report. Interpretation and use of test results are the sole responsibility of the Client and are not within the scope of services provided by Bureau Veritas, unless otherwise agreed in writing. Bureau Veritas is not responsible for the accuracy or any data impacts, that result from the information provided by the customer or their agent.

Solid sample results, except biota, are based on dry weight unless otherwise indicated. Organic analyses are not recovery corrected except for isotope dilution methods.
Results relate to samples tested. When sampling is not conducted by Bureau Veritas, results relate to the supplied samples tested.

Reference Method suffix “m” indicates test methods incorporate validated modifications from specific reference methods to improve performance.
* RPDs calculated using raw data. The rounding of final results may result in the apparent difference.

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Your P.O. #: PENDING
Your Project #: GOLDBORO
Your C.O.C. #: N/A

Attention: Derek Bullock

Anaconda Mining Inc
Goldboro Gold Mine
570 Goldbrook Road
Goldboro, NS
Canada B0H 1L0

Report Date: 2021/09/27
Report #: R6829332
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BV LABS JOB #: C1R4583
Received: 2021/09/23, 09:20

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Maryann Comeau, Customer Experience Supervisor/PM
Email: Maryann.COMEAU@bureauveritas.com
Phone# (902)420-0203 Ext:298
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BV Labs Job #: C1R4583
Report Date: 2021/09/27

Anaconda Mining Inc
Client Project #: GOLDBORO
Your P.O. #: PENDING

ELEMENTS BY ATOMIC SPECTROSCOPY (SOIL)

BV Labs ID		QSR126	QSR127	QSR128	QSR129	QSR130	QSR131	QSR132		
Sampling Date		2021/09/22 07:55	2021/09/22 07:57	2021/09/22 08:01	2021/09/22 08:03	2021/09/22 08:07	2021/09/22 08:08	2021/09/22 08:13		
COC Number		N/A	N/A	N/A	N/A	N/A	N/A	N/A		
	UNITS	ANX-A1A-M	ANX-A1B-M	ANX-A2A-M	ANX-A2B-M	ANX-A3A-M	ANX-A3B-M	ANX-A4A-M	RDL	QC Batch
Metals										
Acid Extractable Mercury (Hg)	mg/kg	1.6	1.6	1.8	1.1	2.4	1.4	2.1	0.10	7601659

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

BV Labs ID		QSR133	QSR134		QSR135	QSR136	QSR137	QSR138		
Sampling Date		2021/09/22 08:15	2021/09/22 08:33		2021/09/22 08:35	2021/09/22 08:40	2021/09/22 08:42	2021/09/22 08:50		
COC Number		N/A	N/A		N/A	N/A	N/A	N/A		
	UNITS	ANX-A4B-M	ANX-A5A-M	QC Batch	ANX-A5B-M	ANX-A6A-M	ANX-A6B-M	ANX-A7A-M	RDL	QC Batch
Metals										
Acid Extractable Mercury (Hg)	mg/kg	0.98	0.46	7601659	0.33	0.53	0.55	1.3	0.10	7601615

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

BV Labs ID		QSR139	QSR140		
Sampling Date		2021/09/22 08:54	2021/09/22 08:57		
COC Number		N/A	N/A		
	UNITS	ANX-A7B-M	ANX-A8A-M	RDL	QC Batch
Metals					
Acid Extractable Mercury (Hg)	mg/kg	1.2	4.3	0.10	7601615

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

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BV Labs Job #: C1R4583
Report Date: 2021/09/27

Anaconda Mining Inc
Client Project #: GOLDBORO
Your P.O. #: PENDING

GENERAL COMMENTS

Each temperature is the average of up to three cooler temperatures taken at receipt

Package 1	9.7°C

Results relate only to the items tested.

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BV Labs Job #: C1R4583
Report Date: 2021/09/27

Anaconda Mining Inc
Client Project #: GOLDBORO
Your P.O. #: PENDING

QUALITY ASSURANCE REPORT

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
7601615	BAN	Matrix Spike	Acid Extractable Mercury (Hg)	2021/09/27		101	%	75 - 125
7601615	BAN	Spiked Blank	Acid Extractable Mercury (Hg)	2021/09/27		97	%	75 - 125
7601615	BAN	Method Blank	Acid Extractable Mercury (Hg)	2021/09/27	<0.10		mg/kg	
7601615	BAN	RPD	Acid Extractable Mercury (Hg)	2021/09/27	1.4		%	35
7601659	BAN	Matrix Spike [QSR129-01]	Acid Extractable Mercury (Hg)	2021/09/27		100	%	75 - 125
7601659	BAN	Spiked Blank	Acid Extractable Mercury (Hg)	2021/09/27		99	%	75 - 125
7601659	BAN	Method Blank	Acid Extractable Mercury (Hg)	2021/09/27	<0.10		mg/kg	
7601659	BAN	RPD [QSR129-01]	Acid Extractable Mercury (Hg)	2021/09/27	6.2		%	35

Duplicate: Paired analysis of a separate portion of the same sample. Used to evaluate the variance in the measurement.

Matrix Spike: A sample to which a known amount of the analyte of interest has been added. Used to evaluate sample matrix interference.

Spiked Blank: A blank matrix sample to which a known amount of the analyte, usually from a second source, has been added. Used to evaluate method accuracy.

Method Blank: A blank matrix containing all reagents used in the analytical procedure. Used to identify laboratory contamination.

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BV Labs Job #: C1R4583
Report Date: 2021/09/27

Anaconda Mining Inc
Client Project #: GOLDBORO
Your P.O. #: PENDING

VALIDATION SIGNATURE PAGE

The analytical data and all QC contained in this report were reviewed and validated by:

Mike MacGillivray, Scientific Specialist (Inorganics)

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Your P.O. #: PENDING
Your Project #: GOLDBORO
Your C.O.C. #: N/A

Attention: Derek Bullock

Anaconda Mining Inc
Goldboro Gold Mine
570 Goldbrook Road
Goldboro, NS
Canada B0H 1L0

Report Date: 2021/09/27
Report #: R6829323
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BV LABS JOB #: C1R4587
Received: 2021/09/23, 09:20

Sample Matrix: Soil
Samples Received: 12

Analyses	Quantity	Date Extracted	Date Analyzed	Laboratory Method	Analytical Method
Metals Solids Acid Extr. ICPMS	12	2021/09/27	2021/09/27	ATL SOP 00058	EPA 6020B R2 m

Remarks:

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Solid sample results, except biota, are based on dry weight unless otherwise indicated. Organic analyses are not recovery corrected except for isotope dilution methods.
Results relate to samples tested. When sampling is not conducted by Bureau Veritas, results relate to the supplied samples tested.

Reference Method suffix “m” indicates test methods incorporate validated modifications from specific reference methods to improve performance.
* RPDs calculated using raw data. The rounding of final results may result in the apparent difference.

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Your P.O. #: PENDING
Your Project #: GOLDBORO
Your C.O.C. #: N/A

Attention: Derek Bullock

Anaconda Mining Inc
Goldboro Gold Mine
570 Goldbrook Road
Goldboro, NS
Canada B0H 1L0

Report Date: 2021/09/27
Report #: R6829323
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BV LABS JOB #: C1R4587
Received: 2021/09/23, 09:20

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Maryann Comeau, Customer Experience Supervisor/PM
Email: Maryann.COMEAU@bureauveritas.com
Phone# (902)420-0203 Ext:298
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BV Labs Job #: C1R4587
Report Date: 2021/09/27

Anaconda Mining Inc
Client Project #: GOLDBORO
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ELEMENTS BY ATOMIC SPECTROSCOPY (SOIL)

BV Labs ID		QSR152	QSR153	QSR154	QSR155	QSR156	QSR157	QSR158		
Sampling Date		2021/09/22 09:06	2021/09/22 09:08	2021/09/22 09:36	2021/09/22 10:05	2021/09/22 10:08	2021/09/22 10:11	2021/09/22 10:14		
COC Number		N/A	N/A	N/A	N/A	N/A	N/A	N/A		
	UNITS	ANX-A9A-M	ANX-A9B-M	ANX-D1A-M	ANX-D2A-M	ANX-D2B-M	ANX-D3A-M	ANX-D4A-M	RDL	QC Batch
Metals										
Acid Extractable Mercury (Hg)	mg/kg	1.1	1.5	2.8	5.2	1.8	9.0	12	0.10	7601615

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

BV Labs ID		QSR159	QSR160	QSR161	QSR162	QSR163		
Sampling Date		2021/09/22 10:16	2021/09/22 09:40	2021/09/22 09:48	2021/09/22 09:52	2021/09/22 09:55		
COC Number		N/A	N/A	N/A	N/A	N/A		
	UNITS	ANX-D5A-M	ANX-D6A-M	ANX-D7A-M	ANX-D7B-M	ANX-D8A-M	RDL	QC Batch
Metals								
Acid Extractable Mercury (Hg)	mg/kg	13	8.1	8.0	8.6	3.3	0.10	7601615

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

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BV Labs Job #: C1R4587
Report Date: 2021/09/27

Anaconda Mining Inc
Client Project #: GOLDBORO
Your P.O. #: PENDING

GENERAL COMMENTS

Each temperature is the average of up to three cooler temperatures taken at receipt

Package 1	9.7°C

Results relate only to the items tested.

Bureau Veritas Laboratories 200 Bluewater Rd, Suite 105, Bedford, Nova Scotia Canada B4B 1G9 Tel: 902-420-0203 Toll-free: 800-565-7227 Fax: 902-420-8612 www.bvlabs.com

BV Labs Job #: C1R4587
Report Date: 2021/09/27

Anaconda Mining Inc
Client Project #: GOLDBORO
Your P.O. #: PENDING

QUALITY ASSURANCE REPORT

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
7601615	BAN	Matrix Spike [QSR163-01]	Acid Extractable Mercury (Hg)	2021/09/27		101	%	75 - 125
7601615	BAN	Spiked Blank	Acid Extractable Mercury (Hg)	2021/09/27		97	%	75 - 125
7601615	BAN	Method Blank	Acid Extractable Mercury (Hg)	2021/09/27	<0.10		mg/kg	
7601615	BAN	RPD [QSR163-01]	Acid Extractable Mercury (Hg)	2021/09/27	1.4		%	35

Duplicate: Paired analysis of a separate portion of the same sample. Used to evaluate the variance in the measurement.

Matrix Spike: A sample to which a known amount of the analyte of interest has been added. Used to evaluate sample matrix interference.

Spiked Blank: A blank matrix sample to which a known amount of the analyte, usually from a second source, has been added. Used to evaluate method accuracy.

Method Blank: A blank matrix containing all reagents used in the analytical procedure. Used to identify laboratory contamination.

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BV Labs Job #: C1R4587
Report Date: 2021/09/27

Anaconda Mining Inc
Client Project #: GOLDBORO
Your P.O. #: PENDING

VALIDATION SIGNATURE PAGE

The analytical data and all QC contained in this report were reviewed and validated by:

Colleen Acker, B.Sc, Scientific Service Specialist

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Appendix F

Delineation Point Data

Delineation Point	Coordinates (NAD83 UTM 20N)		Samples Collected	Depth to Sample (m)	Depth of Hole (m)	Stratigraphy (m)	Suspected Tailings
	X	Y					
A-01	606628	5006299	None	-	0.35	0 - 0.1: organics, moss. 0.1 - 0.35: brown silty sand, moist, native.	N
A-02	606627	5006308	None	-	0.55	0.10: organic brown silty sand, moist organic odour, trace gravel	N
A-03	606627	5006322	None	-	0.4	0.15: organics, brown silty sand, trace gravel, dry to moist	N
A-04	606633	5006280	None	-	0.35	0 - 0.06: organics/moss. 0.06 - 0.35: sandy silt with trace cobbles, moist to wet, native.	N
A-05	606630	5006263	Metals, General Chemistry	0.15 - 0.25	0.25	0.0 - 0.7: organic. 0.07 - 0.25: native, silty sand loose, brown moist to wet, organics. 0.23 - 0.25: silty sand, native, moist to wet.	N
A-06	606640	5006295	None	-	0.45	0 - 0.1: organics, moss, grass and sticks. 0.1 - 0.45: dark brown with organics, wet, organic odour, native.	N
A-07	606640	5006280	None	-	0.25	0 - 0.05: organic / moss. 0.05 - 0.25: brown to black silty sand with organics, wet/ saturated.	N
A-08	606637	5006308	Metals, General Chemistry	0.10-0.3	0.3	0 - 0.1: organic, 0.1 - 0.3: brown silty sand, trace cobbles	N
A-09	606640	5006324	None	-	0.4	Brown, silty sand, moist, trace cobbles/gravel. 0.05 - 0.1: topsoil/organics	N
A-10	606639	5006270	None	0.45	0.5	0.0 - 0.12: organics. 0.132 - 0.45: topsoil, brown, silty sand with organics (moss), moist. 0.45: tailings - grey sandy, moist.	Y
A-11	606649	5006260	None	-	0.7	0 - 0.05: moss, green. 0.05 - 0.7: brown silty sand, dense organic/root mat, saturated organic throughout.	N
A-12	606644	5006239	None	0.15	0.2	0.0 - 0.1: moss, 0.1 - 0.15: topsoil, native silty sand. 0.15: tailings, grey sandy material.	Y
A-13	606606	5006218	Metals, General Chemistry	0.10 - 0.32	0.32	0.0 - 0.10: moss. 0.1 - 0.32: brown, native silty sand, moist to wet with trace organics throughout.	N
A-14	606650	5006342	Metals, General Chemistry, TCLP, TOC, Methyl Mercury, Grain Size	0.3-0.5	0.5	0.30 - 0.5: Brown silty sand, moist, trace cobbles. 0.05 - 0.1 : Topsoil/organics, grey to black sandy material at 0.20.	N
A-15	606657	5006270	None	-	1	Silty sand, dense grass/root mat on surface, wet. Water close to surface, brown in colour. No indication of tailings.	N
A-16	606659	5006258	None	-	1	Brown silty sand, dense root/organic mat, native, saturated, wet. Water almost at surface.	N
A-17	606667	5006240	None	-	1	0.0 - 0.2: moss/root, organic. 0.20 - 1.0: brown, wet, silty sand trace organics (grass).	N
A-18	606665	5006221	None	0.16	0.2	0.0 - 0.03: organics. 0.03 - 0.16: moss, silty sand, dark brown trace organics. 0.16: grey, sandy material (tailings).	Y

Delineation Point	Coordinates (NAD83 UTM 20N)		Samples Collected	Depth to Sample (m)	Depth of Hole (m)	Stratigraphy (m)	Suspected Tailings
	X	Y					
A-19	606642	5006206	None	-	0.35	0.0 - 0.05: organics. 0.05 - 0.35: brown, silty sand, moist trace cobble/gravel and more reddish brown native.	N
A-20	606668	5006313	None	-	0.7	0.05: organics. 0.07: Brown silty sand. 0.12: organics/sand. 0.13 - 0.7: Brown silty sand / black soft material	N
A-21	606667	5006327	None	-	0.3	0.0 - 0.15: organics. 0.15 - 0.3: Sand, coarse	N
A-22	606673	5006215	None	-	0.85	0.0 - 0.15: organics, edge of wetland. Thick root/grass material. 0.15 - 0.85: brown silty sand, with organics, saturated water at surface, standing water, wet.	N
A-23	606671	5006196	None	-	0.45	0.0 - 0.10: organic/moss. 0.1 - 0.45: light brown, reddish brown silty sand, moist and trace cobble. Very rocky area.	N
A-24	606689	5006229	Metals, General Chemistry, TCLP, TOC, Methyl Mercury, Grain Size, Modified Acid-Base Accounting	0.25 - 0.45	0.45	Water - 15cm. 0 - 0.1: organics. 0.1 - 0.2: Tailings, grey sand.	Y
A-26	606691	5006309	Metals, General Chemistry	0.1 - 0.4	0.4	0.01: organics. 0.1-0.4: Brown silty sand	N
A-27	606687	5006289	None	-	0.9	0.05: organics. 0.05-0.7: Brown silty sand. 0.7-0.9: Grey Clay. Wetland area.	N
A-28	606690	5006193	Metals, General Chemistry	0.10-0.23	0.23	0.0 - 0.10: organics. 0.10 - 0.23: brown, silty sand, wet organic	N
A-29	606687	5006215	None	-	0.75	0.0 - 0.20: thick root/grass, organics. 0.20 - 0.75: wet, brown silty sand with thick organic root grass throughout. In wetland.	N
A-30	606701	5006277	None	-	1.1	0.05: organics. 0.05-1.1: Silty clay organics, loose, heavily saturated.	N
A-31	606696	5006298	None	-	0.3	0 - 0.05: rootmat. 0.05 - 0.30: Soft black / dark brown and organics , moist	N
A-32	606701	5006234	None	-	0.81	Saturated heavily , dark brown /black clay/silt and organics	N
A-33	606701	5006281	None	-	0.1	0 - 0.1: organics	N
A-34	606703	5006186	None	-	0.2	Rootmat throughout. Saturated tailings.	Y
A-35	606702	5006208	None	-	0.7	0.05: root mat. 0.05 - 0.69: Highly saturated, dark brown clayey organics mixed, loose , soft.	N
A-36	606713	5006121	Metals, General Chemistry, TCLP, TOC, Methyl Mercury, Grain Size	0.05 - 0.30	0.3	Brown silty sand, trace cobbles, few gravel moist. Compacted area.	N
A-37	606719	5006264	None	-	0.2	0 - 0.05: Moss. 0.05 - 0.2: Brown silty sand and organics	N

Delineation Point	Coordinates (NAD83 UTM 20N)		Samples Collected	Depth to Sample (m)	Depth of Hole (m)	Stratigraphy (m)	Suspected Tailings
	X	Y					
A-38	606720	5006260	None	-	0.15	Rootmat/organics	N
A-39	606717	5006282	None	-	0.35	0.005: rootmat. 0.05 - 0.35: Brown silty sand, loose cobbles.	N
A-40	606718	5006205	None	-	0.4	0.05: organics. 0.05 - 0.4: Light brown sandy silt.	N
A-41	606714	5006217	Metals, General Chemistry	0.1 - 1.0	0 - 0.1	Rootmat. 0.1 - 1.0: grey/orange silt, some sand , moist trace cobbles.	N
A-42	606715	5006233	None	-	0.47	0 - 0.10: organics. 0.1 - 0.18: grey silt and sand, dense, suspected tailings. 0.18 - 0.47: sandy silt - orange/brown.	Y
A-43	606723	5006100	None	-	0.3	0.0 - 0.14: organic, thick grass. 0.14 - 0.30: brown to black silty sand, organic odour, trace organics throughout.	N
A-44	606737	5006115	None	-	0.26	brown to light . 0.0 - 0.14: brown silty sand, damp, organic moist, thick moss.	N
A-45	606729	5006267	Metals, General Chemistry	0.05-0.66	0.66	0 - 0.05: rootmat. 0.05 - 0.66: brown silty sand , trace cobbles	N
A-46	606728	5006256	None	-	0.5	0 - 0.05: topsoil. 0.05 - 0.13: grey silt. 0.13 - 0.5: sandy silt, black/brown	N
A-47	606736	5006102	None	-	0.22	0.0 - 0.05: grass/organics. 0.05 - 0.22: brown, silty sand, moist, trace cobbles, trace organics, uniform throughout.	N
B-01	606821	5006155	None	-	0.6	0.0 - 0.10: brown to black wet native silty sand with organic throughout.	N
B-02	606381	5006144	None	-	0.9	0.0 - 0.90: brown silty sand with organics throughout, damp to wet.	N
B-03	606858	5006126	None	-	0.53	0.0 - 0.10: organics, mainly moss and grass. 0.1 - 0.53: brown native silty sand with trace organics , wet.	N
B-04	606855	5006144	Metals, General Chemistry	0.2 - 0.5	0.5	0.02: organics. 0.2 - 0.5: silt, some sand , light brown, dense - possible tailings	Y
B-05	606858	5006155	None	-	0.63	0.05: moss. 0.2 - 0.63: silt (brown), organics mixed.	N
B-06	606872	5006072	Metals, General Chemistry	0.15 - 0.22	0.22	0.0 - 0.15: thick vegetation, dense root mat. 0.15 - 0.22:brown silty material, very wet and muggy, organic root/material grass throughout.	N
B-07	606872	5006055	None	-	0.5	0.0 - 0.05: moss/organic material , light brown. 0.05 - 0.5: brown, silty sand with trace organic throughout.	N
B-08	606860	5006019	None	-	0.25	uniform native brown silty sand with trace organics.	N
B-09	606866	5006005	None	0.2	0.32	0 - 0.10: moss/organics. 0.10 - 0.2: brown silty sand, wet with organics throughout. 0.20 - 0.32: tailings, grey and sandy.	Y
B-10	606873	5006111	None	-	0.38	Brown silty sand, very muddy wet. 0.0 - 0.1: grass/organic.	N

Delineation Point	Coordinates (NAD83 UTM 20N)		Samples Collected	Depth to Sample (m)	Depth of Hole (m)	Stratigraphy (m)	Suspected Tailings
	X	Y					
B-11	606685	5006130	None	-	0.45	0.05 - 0.45:organic material, some silt and brown and black, saturated.	N
B-12	606880	5006093	None	-	0.4	0.0 - 0.10: ,moss/organic vegetation. 0.10 - 0.4: brown silty sand, wet native uniform in colour, texture.	N
B-13	606883	5006030	Metals, General Chemistry	0.10-0.23	0.23	0.0 - 0.10: vegetation. 0.10 - 0.23: brown silty sand	N
B-15	606889	5006126	None	0.1	0.2	0 - 0.03: Moss/organics. 0.03 - 0.1: Brown silty sand with organics. 0.1: grey sandy materials, suspected tailings.	Y
B-16	606889	5006144	None	-	0.42	0.05: grey clayey silt mixed with organic matter. 0.15: brown sandy silt.	N
B-17	606879	5006001	None	0.16	0.25	0 - 0.05: moss/organic. 0.05 - 0.16: brown silty sand , trace organic. 0.16: suspected tailings, grey sandy material.	Y
B-19	606895	5006129	None	-	0.66	0.05: grass/roots. 0.15: brown, silt, organics. 0.15 - 0.66: silt slurry, grey, saturated - suspected tailings.	Y
B-20	606898	5006244	None	-	0.58	0.05: organics. 0.13: Silty organics, black. 0.58: sandy silt. Light brown, no tailings	N
B-21	606897	5006142	Metals, General Chemistry	0.1 - 0.3	0.3	0.05: moss. 0.1: Brown organic silt. 0.3: mis of brown silty sand followed with grey sand	N
B-22	606983	5006179	None	-	0.37	0 - 0.05: Moss. 0.05 - 0.15: grey sand silt. 0.15 - 0.37: more brown.	N
B-23	606901	5006167	None	-	0.5	0 - 0.05: Moss. 0.1 - 0.26: Silt and organics. 0.26 - 0.5: brown silt, clay, some sand.	N
B-24	606897	5006213	Metals, General Chemistry	0.3 - 0.8	0.8	0 - 0.05: top soil. 0.05: silt and organics. 0.7 - 0.8: light brown silty sand, wet sample	N
B-25	606895	5006197	None	-	0.67	0 - 0.05: moss.1: black organic silt. 0.1 - 0.15: light brown silty sand. 0.15 - 0.67: mix of both above.	N
B-26	606902	5006231	None	-	0.3	0 - 0.16: organics. 0.16 - 0.3: light brown, sandy silt, trace brown sand at bottom. No tailings	N
B-27	606901	5006101	None	0.1	0.15	0.0 - 0.03: Moss. 0.03 - 0.10: Brown silty sand , trace organics, moist. 0.1: light grey sandy material - suspected tailings.	Y
B-28	606922	5006003	None	-	0.25	Brown to reddish sand, silty sand, trace cobble, dry to moist.	N
B-29	606924	5006016	None	-	0.12	0.0 - 0.03: moss/organics. 0.03 - 0.12: brown dry to moist sand with trace cobbles. Berm area between two wetlands in pathway.	N
B-30	606933	5005987	None	-	0.2	0 - 0.05: organics, moss. 0.05 - 0.20: Dark brown to reddish brown with organics throughout, moist to wet.	N
B-31	606928	5006091	None	-	0.35	0 - 0.1: Moss/organics material, loose, damp. 0.1 - 0.35: brown, reddish brown silty sand	N

Delineation Point	Coordinates (NAD83 UTM 20N)		Samples Collected	Depth to Sample (m)	Depth of Hole (m)	Stratigraphy (m)	Suspected Tailings
	X	Y					
B-32	606915	5006144	None	-	0.12	0.0 - 0.12: organics. 0.12 downwards : grey silty sand - suspected tailings	Y
B-33	606923	5006130	None	0.08	0.18	0 - 0.03: Moss/organics. 0.03 - 0.08: Silty sand brown/reddish brown with organics at 0.08: suspected tailings, grey sandy material.	Y
B-34	606911	5006241	None	-	0.3	0 - 0.1: brown silty sand and organics. 0.1: tailings - grey sand	Y
B-35	606908	5006253	None	-	0.2	0.05: organics , 0.2: gray silt, sand, tailings, brown grey silty sand.	Y
B-36	606940	5006016	Metals, General Chemistry, TCLP, TOC, Methyl Mercury, Grain Size	0.05 - 0.3	0.34	0.0 - 0.05: organic, root material. 0.05 - 0.15: brown silty sand, topsoil moist, trace gravel and cobble with organic matter. 0.15: suspected tailings, grey sandy material.	Y
B-37	606926	5006229	Metals, General Chemistry, TCLP, TOC, Methyl Mercury, Grain Size, Modified Acid-Base Accounting	0.1-0.2	0.3	Tailings after 5cm.	Y
B-38	606921	5006172	Metals, General Chemistry	0.05-0.2	0.2	Tailings throughout	Y
B-39	606944	5006250	None	-	0.7	0.05: organics. 0.05 - 0.6: black grey sandy silt, organics throughout. 0.6 - 0.7: brown silt sandy.	N
B-40	606920	5006265	Metals, General Chemistry	0.08-0.3	0.3	0 - 0.08: organics. 0.08- 0.3: Brown silty sand.	N
B-41	606934	5006100	None	0.1	0.23	0.0 - 0.05: Moss/organics. 0.05 - 0.10: brown/reddish silty sand with organics.).10: suspected tailings, grey sandy material.	Y
B-42	606953	5006024	None	0.1	0.25	Surface: grass/organics , brown silty sand with organics to grey sandy material (suspected tailings) wet, few cobble.	Y
B-43	606948	5006135	None	-	0.5	0.05: moss. 0.09 - 0.5: organics and brown silt/sand	N
B-44	606949	5006145	None	-	0.6	0.05: Moss. 0.05 - 0.6:dark brown silty organics	N
B-45	606944	5006250	None	-	0.2	0.05: organics. 0.20: grey silt/sand - tailings.	Y
B-46	606943	5006111	Metals, General Chemistry	0.05-0.25	0.25	0.0 - 0.05: Moss, organics to reddish /brown silty sand to brown/grey sandy material	Y
B-47	606963	5006064	Metals, General Chemistry	0.03 - 0.14	0.14	0.03 - 0.14: brown with light grey sandy material with cobble. Sandy material is below surface material	Y
B-48	606967	5006053	None	-	0.22	Brown silty sand with trace cobbles and gravels. Rocky area.	N
B-49	606940	5006016	None	-	0.22	Brown silty sand dry to moist , trace cobbles.	N
B-50	606952	5006381	None	-	0.15	Surface organic / leaves debris, brown silty sand with cobbles and gravel	N

Delineation Point	Coordinates (NAD83 UTM 20N)		Samples Collected	Depth to Sample (m)	Depth of Hole (m)	Stratigraphy (m)	Suspected Tailings
	X	Y					
B-51	606959	5006136	None	-	0.4	0.1: organics, grass. 0.1 - 0.3: Dense grey silty sand - possible tailings. 0.3-0.4: dark brown silty sand	Y
B-52	606962	5006099	None	0.1	0.15	0 - 0.03: Moss. 0.03 - 0.10: Brown silty sand, moist. 0.10: grey sandy material, suspected tailings.	Y
B-53	606966	5006164	None	-	0.25	0 - 0.25: Brown silty sand and cobbles	N
B-54	606959	5006177	None	-	0.34	0.05 - 0.34: Brown silty sand and cobbles	N
B-55	606959	5006186	None	-	0.41	0.05 - 0.41: brown sand and silt, cobbles	N
B-56	606962	5006211	Metals, General Chemistry	0.1 - 0.4	0.4	0.05: organics. 0.4: sand and silt, cobbles	N
B-57	606956	5006225	None	-	0.1	Tailings under initial moss layer	Y
B-58	606955	5006257	None	-	0.4	0.05: Moss. 0.05 - 0.4: black silty organics	N
B-59	606961	5006107	None	-	0.7	0-0.1: brown silty sand. 0.1-0.6: Fill, brown sand. 0.6-0.7: tailings	Y
B-60	606961	5006230	None	-	0.1	Tailings under initial moss layer	Y
B-61	606963	5006152	None	-	0.25	0.1 - organics. 0.14: grey, white silty sand. 0.15: brown sandy silt.	N
B-62	606969	5006015	None	-	0.2	0.0 - 0.2: surface, leaves sticks, organic matter, brown silty sand to brown sandy material. Trace cobble.	N
B-63	606970	5006157	Metals, General Chemistry	0.05 - 0.3	0.3	0.3: brown cobbly sand	N
B-64	606983	5006102	None	-	0.45	0-0.45: brown silty sand, fill	N
B-65	606963	5006151	None	-	0.3	0-0.05: Organics 0.05 - 0.30: Brown silty sand	N
B-66	606969	5006142	None	-	0.2	0.1: organics, rest is tailings.	Y
B-67	606960	5006229	Metals, General Chemistry	0.1 - 0.5	0.5	0.1 - 0.2: brown sand some silt. 0.2- 0.22: grey silty sand. 0.22 - 0.5: Brown silt and sand.	N
B-68	606972	5005982	None	-	0.25	Surface: leaves/debris organics. Brown silty sand , trace organic , trace cobble, moist native.	N
B-69	607010	5006069	Metals, General Chemistry	0.1-0.3	0.3	0-0.1: organics, moss. 0.1 - 0.15: black silty organics. 0.15 - 0.3: black clayey silt	N
B-70	607024	5006064	None	-	0.2	0-0.1: organics. 0.1 - 0.2: brown sandy silt	N
C-01	606996	5006305	Metals, General Chemistry	0.25 - 0.45	0.45	0.0 - 0.05: organics/moss. 0.05 - 0.45: brown to reddish brown silty sand with trace cobbles.	N
C-02	606977	5006304	None	-	0.4	0.0 - 0.10: Moss/organics. 0.10 - 0.40: Brown to reddish brown silty sand wit trace cobbles. 0.3: light brown sand within brown/reddish brown silty sand.	N
C-03	606994	5006263	Metals, General Chemistry	0.07 - 0.27	0.27	0 - 0.10: grass/moss, organics. 0.10 - 0.20: suspected tailings , grey sandy material. 0.20: brown to reddish silty sand, trace cobbles.	Y
C-04	606991	5006322	None	-	0.4	0 - 0.05: organics/moss. 0.05 - 0.40: Brown to reddish brown silty sand with trace cobble. (trace organics in upper brown layer.)	N

Delineation Point	Coordinates (NAD83 UTM 20N)		Samples Collected	Depth to Sample (m)	Depth of Hole (m)	Stratigraphy (m)	Suspected Tailings
	X	Y					
C-05	607014	5006309	None	0.03	0.23	Grass/roots followed by grey sand ,arterial - suspected tailings.	Y
C-06	607007	5006292	None	0.05	0.25	Grass/roots followed by suspected tailings, grey sandy material, wet.	Y
C-07	607019	5006351	Metals, General Chemistry	0.1 - 0.25	0.26	Surface leaves/grass(organics) to brown silty sand with trace cobbles.	N
C-08	607015	5006329	None	-	0.3	0 - 0.07: Surface organics, roots/moss. 0.07 - 0.30: brown silty sand with organics, wet.	N
C-09	607006	5006270	None	-	0.15	0 - 0.03: Moss/organics. 0.03 - 0.15: Brown silty sand with organics throughout , saturated, very wet.	N
C-10	607005	5006255	None	-	0.32	0 - 0.05: organics/grass. 0.05 - 0.32: brown to reddish brown silty sand with trace cobbles. 0.32: slight brown sandy layers.	N
C-11	607019	5006320	None	0.1	0.3	Surface organics, small shallow layer of brown silty sand, grey sandy material below.	Y
C-12	607029	5006307	None	0.01	0.25	Thin grass/silty sand over suspected tailings.	Y
C-13	607026	5006269	Metals, General Chemistry, TCLP, TOC, Methyl Mercury, Grain Size	0.01-0.2	0.25	Thin grass/silty sand over suspected tailings.	Y
C-14	607021	5006229	None	-	0.24	0.0 - 0.07: organics/moss and thick intertwined roots. 0.07 - 0.24: brown to dark brown moist silty sand , loose with organics.	N
C-15	607034	5006343	None	0.2	0.4	0.0 - 0.3: grass/roots / organics. 0.03 - 0.20: Brown silty sand with trace cobble, trace organics, moist to wet. 0.20: suspected tailings , wet grey to black material.	Y
C-16	607049	5006225	None	0.25	0.35	0.0 - 0.10: Moss/organic (mostly moss). 0.10 - 0.25: Brown to dark brown silty sand , trace organics , trace gravel. 0.25: brown to grey sandy material - suspected tailings.	Y
C-17	607048	5006334	None	0.15	0.25	Brown silty sand with cobbles and gravel , trace. 0.15: suspected tailings, grey sandy material.	Y
C-18	607057	5006330	Metals, General Chemistry, TCLP, TOC, Methyl Mercury, Grain Size	0.1-0.22	0.22	0.1 - 0.05: roots/grass and moss. 0.05 - 0.22: Brown silty sand with organics throughout (roots) trace cobbles, moist to wet.	N
C-19	607058	5006257	None	Tailings at surface	0.25	Thin brown/organic layer , grey sandy suspected tailings. 0.12: dark brown silty sand with trace organics , trace cobbles, moist.	Y
C-20	607054	5006318	None	0.17	0.23	0 - 0.02: organic grass/moss/roots. 0.02 - 0.17: brown silty sand and trace organics with cobble. 0.17: Suspected tailings, grey sandy material.	Y

Delineation Point	Coordinates (NAD83 UTM 20N)		Samples Collected	Depth to Sample (m)	Depth of Hole (m)	Stratigraphy (m)	Suspected Tailings
	X	Y					
C-21	607062	5006311	None	-	0.34	Brown, silty sand, moist, native, trace cobble	N
C-22	607080	5006281	Metals, General Chemistry	0.05-0.2	0.25	0 - 0.05: Moss. 0.05 - 0.07: Loose brown silty sand with organics. 0.07: dark grey sand, suspected tailings.	Y
D-01	607187	5006182	None	-	0.32	0.15: moss, silty organic. O.15 - 0.32: brown sandy silt and organics.	N
D-02	607193	5006248	Metals, General Chemistry	0.0 - 0.3	0.3	0.03: brown silty sand. 0.03 - 0.3: area very rocky	N
D-03	607192	5006242	None	-	0.4	0.05: organics. 0.05 - 0.4: grey sand tailings	Y
D-04	607218	5006187	None	-	0.2	Tailings throughout	Y
D-05	607199	5006203	None	-	0.45	0-0.05: organics. 0.05-0.1: brown silty sand. 0.1 - 0.11: grey silty sand. 0.11 - 0.3: red brown silty sand. 0.3 - 0.45: brown sandy silt	N
D-06	607201	5006186	None	-	0.27	0.03: organics. 0.03 - 0.12: red brown silty sand. 0.12 - 0.2: grey sandy silt. 0.2 - 0.27: red/brown sandy silt	Y
D-07	607205	5006248	Metals, General Chemistry, TCLP, TOC, Methyl Mercury, Grain Size, Modified Acid-Base Accounting	0.1 - 0.6	0.6	0 - 0.01: organics. 0.01 - 0.6: sandy grey tailings	Y
D-08	607204	5006211	Metals, General Chemistry	0.05 - 0.2	0.2	0.05:organics. 0.05-0.2: brown sandy silt	N
D-09	607218	5006187	Metals, General Chemistry	0.1 - 0.4	0.4	0-0.1: brown, silty sand, some organics. 0.1-0.4: red brown sandy silt. Other holes in the area showed white rock dust	N
D-10	607217	5006203	None	-	0.3	0.11: organics/grass. 0.11 - 0.3: clayey silt trace sand, possible tailings	Y
D-11	607223	5006244	None	-	0.3	0.05: organics. 0.05 - 0.3: tailings grey silty sand	Y
D-12	607233	5006154	Metals, General Chemistry	0.35 - 0.55	0.55	0.025: moss, wet. 0.35: water. 0.55: organics, silt	N
D-13	607229	5006170	None	-	0.58	0-0.1: moss/organics. 0.1 - 0.38: water. 0.38 - 0.58: silt/organics.	N
D-15	607235	5006248	None	-	0.4	0.2: organics. 0.2 - 0.4: brown sandy silt.	N
D-16	607243	5006153	None	-	0.55	0.34: organic/water. 0.34 - 0.55: organics. Wetland	N
D-17	607242	5006169	None	-	0.85	0-0.1: organics, moss. 0.1-0.7: water. 0.7-0.85: black silt, organics	N
D-18	607243	5006231	None	-	0.2	Tailings throughout	Y
D-19	607257	5006260	Metals, General Chemistry	0.1 - 0.3	0.3	0.01: organics. 0.1 - 0.3: brown silt sand, trace gravel	N
D-20	607258	5006246	None	-	0.2	0.05: organics. 0.05 - 0.2: grey sandy silt, likely tailings	Y
D-21	607253	5006219	Metals, General Chemistry	0 - 0.3	0.5	0.3: tailings. 0.3-0.5: brown silt , all under water	Y

Delineation Point	Coordinates (NAD83 UTM 20N)		Samples Collected	Depth to Sample (m)	Depth of Hole (m)	Stratigraphy (m)	Suspected Tailings
	X	Y					
D-22	607256	5006191	Metals, General Chemistry, TCLP, TOC, Methyl Mercury, Grain Size, Modified Acid-Base Accounting	0.5 - 0.9	0.9	Wetland - floating moss water, organics. 0.4: black silt and organics	N
D-23	607262	5006157	None	-	0.4	0-0.2: water. 0.2-0.3: organics. 0.3 - 0.4: brown sandy silt	N
D-24	607262	5006109	None	-	0.75	0-0.7: organics, water. 0.7 - 0.75: black silt, organics, saturated	N
D-25	607258	5006233	None	-	0.2	Tailings throughout	Y
D-26	607269	5006249	None	-	0.4	0.05: Moss. 0.05 - 0.4: Dark brown sandy silt , organic with some light brown patches. 0.3-0.4: red brown	N
D-27	607272	5006169	None	-	0.3	0.1: moss. 0.1 - 0.2: brown silt, some sand/organics. 0.2 - 0.3: same, but saturated.	N
D-28	607275	5006182	None	-	0.1	organics, on bedrock, no material retrieved	N
D-29	607275	5006202	None	-	0.2	moss/organics, brown sand.	N
D-30	607278	5006208	None	-	0.2	0.18: organics. 0.18 - 0.2: silt, trace sandy brown	N
D-31	607288	5006208	None	-	0.2	0.15: organics. 0.15 - 0.2: brown sandy silt, some grey	N
D-32	607282	5006245	None	-	0.6	0.015: moss/organics. 0.15 - 0.6: light brown silt sand.	N
D-33	607300	5006199	None	-	0.2	organic top layer, 0.2: brown sandy silt.	N
D-34	607290	5006229	Metals, General Chemistry	0.1 - 0.4	0.4	0.08: organics. 0.08 - 0.2: brown sandy silt trace grey. 0.2-0.4: dark brown silty sand	N
D-35	607288	5006208	None	-	0.21	0.08: moss/organics. 0.08 - 0.21: brown sandy silt.	N
E-01	607015	5006224	None	-	0.25	Shallow, thin grass/vegetation followed by brown sandy silt with trace cobbles.	N
E-02	607021	5006236	None	-	0.18	0.0 - 0.03: Grass/roots and organics. 0.03: dark brown silty sand with organics throughout. 0.16: thin light brown sand. 0.18: reddish brown to brown silty sand with trace cobbles.	N
E-03	607035	5006230	None	0.13	0.2	0.0 - 0.05: Moss/organics and transitions to brown silty sand with organics, loose, wet. 0.13: Brown to grey sandy material. Suspected tailings	Y
E-04	607029	5006215	None	0.15	0.24	0.0 - 0.05: Moss. 0.05 - 0.15: brown silty sand with organics throughout. 0.15: suspected tailings distinct grey, brown grey sand.	Y
E-05	607051	5006232	Metals, General Chemistry	0.15 - 0.34	0.34	0.0 - 0.07: Moss/organics. 0.07: brown silty sand with organics throughout. 0.20: more sand, more brown in colour.	N
E-06	607036	5006210	None	-	0.3	0.0 - 0.07: Moss. 0.07 - 0.30: Brown, wet silty sand with organics throughout.	N

Delineation Point	Coordinates (NAD83 UTM 20N)		Samples Collected	Depth to Sample (m)	Depth of Hole (m)	Stratigraphy (m)	Suspected Tailings
	X	Y					
E-07	607061	5006249	None	-	0.35	0.0 - 0.03: Moss. 0.03: Brown silty sand with organics throughout. 0.15: more sandy / sandy silt, light brown in colour followed by reddish brown sandy silt with trace cobbles.	N
E-08	607058	5006207	Metals, General Chemistry	0.2 - 0.4	0.43	0.0 - 0.03: Moss/organics. 0.03: brown, reddish brown silty sand.	N
E-09	607065	5006234	None	0.13	0.2	0.0 - 0.05: Moss. 0.05 - 0.13: Brown silty sand with organics throughout, loose, wet. 0.13: turned into sandy material, light brown. Suspected tailings	Y
E-10	607073	5006252	None	Tailings at surface	0.25	Thin organic layer followed by grey sand , suspected tailings.	Y
E-11	607080	5006256	Metals, General Chemistry	0.0 - 0.15	0.25	0.0 - 0.02: thin layer of organics / brown silty sand. 0.02: suspected tailings, grey sandy material.	Y
E-12	607077	5006185	None	-	0.3	0.0-0.1: Moss, organics. 0.10 - 0.30: Brown, reddish brown silty sand with trace cobbles. Thin light brown sandy material at 0.25m.	N
E-13	607074	5006210	None	0.1	0.16	0.0 - 0.03: Moss/organics. 0.03 - 0.10: Brown silty sand with organics. 0.10: suspected tailings.	Y
E-14	607050	5006197	None	0.07	0.21	0.0 - 0.05: Moss/organics with layer of brown silty sand. 0.07: grey to light brown sandy material (suspected tailings) followed by reddish brown silty sand layer.	Y
E-15	607080	5006234	None	0.05	0.25	0.05: Moss/organics. 0.05 - 0.25: grey sand, suspected tailings.	Y
E-16	607084	5006318	None	-	0.17	0 - 0.05: trace debris /organics. 0.05 - 0.17: Brown silty sand with trace organics and trace cobble, moist . 0.15: more sandy brown/light brown in colour.	N
E-17	607087	5006310	None	0.13	0.18	0 - 0.05: grass/organics. 0.05 - 0.13: loose, light brown to brown silty sand , moist trace organics, trace cobble. 0.13: grey, sand , suspected tailings.	Y
E-18	607090	5006279	None	0.14	0.25	0.0 - 0.02: moss/organics, grass. 0.02 - 0.14: Brown silty sand with organics throughout. 0.14: grey sand , suspected tailings.	Y
E-19	607091	5006216	None	Tailings at surface	0.25	Thin layer of moss/organics over grey sand (suspected tailings) water at 0.10m.	Y
E-20	607085	5006206	None	0.01	0.2	0.0 - 0.03: Moss and thin organic layer. 0.03: tailings grey sandy material	Y
E-21	607096	5006185	None	Tailings at surface	0.25	0.0:Moss. Tailings below thin moss/organics layer. Tailings light grey sandy material.	Y
E-22	607102	5006229	Metals, General Chemistry	0.05 - 0.18	0.2	0.0 - 0.03: Moss/vegetation. 0.03 - 0.11: Brown sandy silt moist with trace cobbles. O.11: suspected tailings , grey sandy material	Y

Delineation Point	Coordinates (NAD83 UTM 20N)		Samples Collected	Depth to Sample (m)	Depth of Hole (m)	Stratigraphy (m)	Suspected Tailings
	X	Y					
E-23	607096	5006309	None	-	0.26	0.0 - 0.07: moss/organic. 0.07: Brown silty sand with trace organics, trace cobles. 0.20: more sandy light brown sand / sandy silt.	N
E-24	607099	5006269	None	0.08	0.2	Moss on surface, brown silty sand with trace organics. 0.08: grey sand material, suspected tailings.	Y
E-25	607106	5006255	None	-	0.25	0.0 - 0.03: Moss/vegetation. 0.03 - 0.12: Brown, silty sand with organics, loose moist. 0.12 - 0.30: reddish brown sandy silt, trace cobbles.	N
E-26	607104	5006207	None	Tailings at surface	0.25	Thin layer of moss/organics over grey sand (suspected tailings)	Y
E-27	607097	5006030	None	-	0.25	Moss/organics 0.1-0.25: tailings	Y
E-28	607102	5006002	None	-	0.2	Tailings throughout	Y
E-29	607111	5006046	None	-	0.2	Mid river, surge rock, hand grab at bottom resulted in tailings	Y
E-30	607101	5006305	None	-	0.4	0 - 0.07: moss/organics. 0.07 - 0.20: brown silty sand with trace organics, reddish brown. 0.20: more sandy light brown sand layer.	N
E-31	607106	5006191	Metals, General Chemistry, TCLP, TOC, Methyl Mercury, Grain Size	0.0 - 0.25	0.25	Tailings from surface, wet sandy material, grey in colour.	Y
E-32	607121	5006275	None	-	0.26	0.0 - 0.05: Moss/organics and vegetation. 0.05 - 0.14: brown , wet silty sand with organics throughout. 0.14 - 0.26: more brown to reddish brown silty sand , trace organics and trace cobbles, moist.	N
E-33	607117	5006261	Metals, General Chemistry	0.1 - 0.3	0.3	0.0 - 0.05: Moss/vegetation. 0.05 - 0.17: Brown silty sand with organics throughout, loose, moist. 0.17 - 0.30: Reddish brown sandy silt with trace cobble, moist.	N
E-34	607111	5006239	None	0.16	0.23	0.0 - 0.03: Moss/vegetation. 0.03 - 0.16: loose brown silty sand with organics throughout. 0.16: grey sandy , material, suspected tailings.	Y
E-35	607128	5006025	Metals, General Chemistry, TCLP, TOC, Methyl Mercury, Grain Size, Modified Acid-Base Accounting	0.2-0.35	0.35	0.2: tailings, more brown sand, some silt. 0.2-0.3: some orange colour silt. 0.3-0.35: grey brown sand and silt	Y
E-36	607117	5005987	None	-	0.2	0.05: brown saturated organics. 0.05-0.2: tailings	Y
E-37	607118	5006040	None	-	-	River bed, very rocky, signs of tailings	Y
E-38	607121	5006294	None	-	0.24	0 - 0.10: moss. 0.10 - 0.24: brown silty sand , wet with organics throughout.	N

Delineation Point	Coordinates (NAD83 UTM 20N)		Samples Collected	Depth to Sample (m)	Depth of Hole (m)	Stratigraphy (m)	Suspected Tailings
	X	Y					
E-39	607123	5006215	None	0.09	0.23	Thin surface of moss/vegetation followed by brown to reddish brown silty sand with trace organics. 0.09: grey sandy material , suspected tailings.	Y
E-40	607132	5006193	Metals, General Chemistry	0.08 - 0.18	0.18	Thin moss/organic over brown silty sand , loose moist with organics throughout. 0.08: more silty sand , dark brown and wet.	N
E-41	607141	5006222	None	0.02	0.25	Thin topsoil/vegetation layer over grey sandy material , suspected tailings. Patches of sandy grey suspected tailings exposed in this area.	Y
E-42	607132	5006042	None	-	0.1	organics, tailings	Y
E-43	607155	5006019	None	-	0.4	0-0.1: organics. 0.1-0.4: black organics and silt	N
E-44	607140	5005993	None	-	0.3	0-0.1: moss. 0.1 - 0.2: Void. 0.2-0.3: brown sandy silt.	N
E-45	607139	5006299	Metals, General Chemistry, TCLP, TOC, Methyl Mercury, Grain Size	0.15-0.30	0.3	0.0-0.07: brown silty sand with organics throughout, wet.	N
E-46	607163	5006231	Metals, General Chemistry	0.08 - 0.18	0.18	Brown silty sand , moist to dry trace organics	N
E-47	607148	5006138	Metals, General Chemistry	0.1 - 0.2	0.2	0.0 - 0.03: Moss/vegetation. 0.03 - 0.20: Brown silty sand with trace cobble, trace organics throughout, moist.	N
E-48	607154	5006189	None	-	0.4	0.0 - 0.08: grass/vegetation. 0.08 - 0.20: Brown silty sand with organics, moist, wet. 0.20: more sandy silt consistency , grey in colour, potential tailings	Y
E-49	607146	5006173	None	-	0.24	0.0 - 0.08: Moss/ vegetation. 0.08 - 0.24: brown silty sand, moist with organics throughout.	N
E-50	607149	5006210	None	-	0.17	0.0 - 0.03: Moss/organic . 0.03 - 0.17: wet, brown silty sand with organics throughout	N
E-51	607148	5006306	None	-	0.37	0 - 0.10: Moss. 0.10 - 0.37: brown silty sand with organics throughout, wet. 0.10:water.	N
E-52	607169	5006132	None	-	0.18	0 - 0.08: Moss/organics. 0.08 - 0.18: brown silty sand with organics throughout, loose, moist to wet.	N
E-53	607167	5006217	None	0.08	0.25	Thin vegetation / grass over brown, moist silty sand with organics. 0.08: grey sandy material (suspected tailings)	Y
E-54	607170	5006165	None	-	0.36	0.0 - 0.02: Moss/grass and vegetation. 0.02 - 0.20: brown to reddish brown silty sand, trace cobble, moist. 0.20-0.25: light grey /brown sand material with black starting at 0.20. 0.25 - 0.36: Same brown as previous layer.	N

Delineation Point	Coordinates (NAD83 UTM 20N)		Samples Collected	Depth to Sample (m)	Depth of Hole (m)	Stratigraphy (m)	Suspected Tailings
	X	Y					
E-55	607179	5006190	Metals, General Chemistry	0.1-0.3	0.3	0-0.1:Vegetation 0.1-0.08 over silty sand with organics. 0.08: grey sandy material, suspected tailings	Y
E-56	607177	5006207	Metals, General Chemistry	0.08 - 0.2	0.25	Thin vegetation /grass over silty sand with organics. 0.08: grey sandy material, suspected tailings	Y
E-57	607197	5006243	None	0.12	0.25	Thin grass/vegetation organic layer with brown silty sand, loose , moist trace organics. 0.12; Grey sandy material, suspected tailings.	Y
E-58	607216	5006072	None	-	0.25	0-0.1: organics. 0.1-0.2: organics and silt, black. 0.2-0.25: brown silty sand	N
E-59	607222	5006061	None	-	0.35	0-0.15: organics. 0.15-0.25: silt and organics. 0.25-0.35: brown silty sand	N
E-60	607210	5006089	None	-	0.2	0-0.05: organics. 0.05-0.2: brown silty sand	N
E-61	607238	5006089	None	-	0.6	0-0.2: moss/organics. 0.2-0.6: brown sandy silt possible o.2m of void.	N
E-62	607239	5006075	Metals, General Chemistry	0.2-0.5	0.5	0-0.2: moss/organics. 0.2-0.5: silt and organics, black	N
E-63	607237	5005057	None	-	0.35	0.15: organics, brown. 0.15-0.35: brown silt.	N
E-64	607238	5006089	None	-	0.6	0-0.6: moss/organics, sandy brown silt	N
E-65	607251	5006079	None	-	0.4	0.2: organics, black. 0.2-0.4: brown sandy silt , saturated.	N
E-66	607252	5006062	None	-	1	0-0.8: organics, void. 0.8-1.0: black silt organics.	N
E-67	607787	5006081	None	-	0.3	0.05:organics. 0.05 - 0.3: grey silt sand, trace cobbles, possible native	N
E-68	607804	5006090	Metals, General Chemistry	0.15 - 0.2	0.2	0.15: organics. 0.15 - 0.2: brown sandy silt, some grey	N
E-69	607818	5006079	None	-	0.3	0.12: organics. 0.12 - 0.2: grey silty sand. 0.2 - 0.3: brown sandy silt.	N
E-70	607826	5006109	None	-	0.3	0.15: organics. 0.15 - 0.18: grey sandy silt. 0.18 - 0.3: brown silty sand.	N
E-71	607844	5006133	None	-	0.48	0.05: organics. 0.05 - 0.35: silt, orange. 0.035-0.38: grey sand , some cobble. 0.38 - 0.48: light brown to grey silty sand , native.	N
E-72	607885	5006292	None	-	0.35	0.05: organics, moss. 0.05 - 0.1: possible tailings. 0.2 - 0.35: brown sandy silt	Y
E-73	607891	5006189	None	-	0.4	0.1-0.2: brown/grey silty sand. 0.2 - 0.4: brown sandy silt , saturated.	N
E-74	607900	5006175	Metals, General Chemistry	0.15 - 0.4	0.4	0.15: moss, organics. 0.15 - 0.4: grey sandy silt, possible tailings	Y
E-75	607966	5006164	None	-	0.3	0.15: organics. 15 - 0.3: light brown /grey silty sand	Y


GHD

Appendix E.2

Historic Tailings Management Plan

Historic Tailings Management Plan

Goldboro Gold Project

Anaconda Mining Inc.

27 May 2022

→ The Power of Commitment

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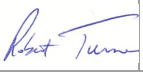
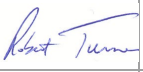
Document status

Status Code	Revision	Author	Reviewer		Approved for issue		
			Name	Signature	Name	Signature	Date
S3	00	Glen Merkley	Rob Turner		Rob Turner		14-Apr-2022
S4	01	Glen Merkley	Rob Turner		Rob Turner		20-May-2022
S4	02	Glen Merkley	Rob Turner		Rob Turner		27-May-2022

Contents

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Glossary of Terms

Anaconda	Anaconda Mining Inc.
ARD	Acid Rock Drainage
As	Arsenic
CCME	Canadian Council of Ministers of the Environment
EARD	Environmental Assessment Registration Document
EMP	Environmental Management Plan
EQS	Environmental Quality Standards
ESA	Environmental Site Assessment
GHD	GHD Limited
Hg	Mercury
HTMP	Historic Tailings Management Plan
IP	Induced Polarization
km	kilometres
ML	Metal Leaching
NPAG	Non-potentially acid Generating
Nordmin	Nordmin Engineering Ltd.
NPR	Net Potential Ration
NS	Nova Scotia
NSECC	Nova Scotia Environment and Climate Change
Onitap	Onitap Resources Inc.
Orex	Orex Exploration Inc.
Osisko	Osisko Mining Corporation
PA	Project Area
ROM	Run-of-Mine
Se	Selenium
SSWQG	Site-Specific Water Quality Guidelines
The Project	Goldboro Gold Project
TMF	Tailings Management Facility
tpd	tonne per day
VLF-EM	Very Low Frequency Electromagnetic
WRSAs	Waste Rock Storage Areas
WTS	Water Treatment System
Zn	Zinc

1. Introduction

GHD Limited (GHD) was tasked by Anaconda Mining Inc. (Anaconda) with developing a Historic Tailings Management Plan (HTMP) to address historic tailings found in vicinity of the proposed Goldboro Gold Project (the Project). This HTMP was completed as part of the Environmental Management Plan (EMP) for the development of the Project and serves as a management plan for the remediation and/or monitoring of metal impacted tailings present contamination within the Project Area (PA) from historical mining activity. The HTMP consists of a historic tailings assessment, remedial options for tailings, remediation measures, and monitoring plan.

Nova Scotia Lands Inc. (NSLI) is currently undertaking a Phase I and Phase II Environmental Site Assessment (ESA) and remedial action plan for all historic tailings located on Crown land within the Upper Seal Harbour Gold District and Lower Seal Harbour Gold District, including the PA. Anaconda is part of a historic tailings working group with NSLI and has provided the data and findings of the limited Phase I and Phase II ESA completed for the Project to assist with their assessment.

Management of historic tailings within the PA will be completed in accordance with the Nova Scotia (NS) *Contaminated Sites Regulations* as well as the Ministerial Protocols pursuant to those regulations. External reporting provided to the Nova Scotia Department of Environment and Climate Change (NSECC) will be completed in accordance with the *Confirmation of Remediation Protocol* (PRO-700). A Remedial Action Plan in accordance with Nova Scotia PRO-600 will also be completed prior to Project development.

1.1 Project Overview

The Project is located approximately 175 kilometres (km) northeast of Halifax, 60 km southeast of Antigonish, and 1.6 km northeast of the community of Goldboro on the eastern shore of Isaacs Harbour, in Guysborough County, NS, Canada. Anaconda proposes to develop the Project as a 4,000-tonne per day (tpd) mine and processing facility. For the purposes of the Environmental Assessment Registration Document (EARD) prepared for the Project, the PA was defined as the footprint of Project-related infrastructure plus a buffer of 100 – 200 m. The mine plan includes two open pits (East Pit and West Pit), an ore processing facility, a lined tailings management facility (TMF), three waste rock storage areas (WRSAs), till and organic material stockpiles, support buildings, and associated infrastructure. The anticipated mine life for extraction of ore is approximately 11 years.

The scope of the Project includes activities associated with construction, operation, and closure. Project construction activities will include:

– Clearing and grubbing, stripping of the overburden and developing organic and till stockpiles for reuse in future reclamation work.
– Preparation of the WRSAs, pits, plant, and TMF areas, and construction of the initial lift of the TMF, plant site, secondary access roads, construction laydowns, Run-of-Mill (ROM) pad, surface water management and other site infrastructure.

The operation phase will include conventional ore extraction methods (drilling, blasting, loading, and hauling), ore processing, and waste management. ROM ore will go directly to the crusher while stockpiled high-grade and low-grade ore will be progressively processed throughout the mine life. Non-ore bearing waste rock, not used for construction or backfill, will be stockpiled at its final disposal point, managed, and reclaimed in place.

The closure phase will include earthworks and demolition required to return the PA to a safe, stable, and vegetated state, and all monitoring and treatment, if required.

1.2 Objectives of the HTMP

Previous assessments have identified historic tailings that are likely to be impacted by proposed Project activities. The purpose of the HTMP is to provide a methodology for the management of these historic tailings in the PA. The HTMP was developed with the following objectives:

– Provide a summary of known areas of historic tailings within, and downstream of, the PA.
– Provide remedial and management options for historic tailings anticipated to be directly or indirectly impacted by Project activities.
– Develop procedures for internal and external reporting on historic tailings removal, transport, and disposal.
– Provide recommendations for further assessment of background soil conditions within the PA to refine the delineation of historic tailings areas.

The Project is still in the early stages of development and as such, historic tailings identification and delineation are on-going. As further information becomes available, this HTMP may be amended and improved to include these items.

2. Historical Tailings Assessment

2.1 Historic Mining Activity

Anaconda currently holds exploration license No. 05888 (the EL) through its wholly-owned subsidiary, Orex Exploration Inc. (Orex). The EL consists of 37 contiguous claims and covers a total area of approximately 592 hectares (ha) in the Goldboro area. Gold mineralization within the EL was first discovered in 1862 by Howard Richardson of the Geological Survey of Canada in quartz veins within the Isaacs Harbour anticline. The gold bearing Boston Richardson Belt (slate and quartz) was subsequently discovered by Howard Richardson in 1892. The Richardson Gold Mining Company (Richardson Gold Mining) began production from the belt in 1893 at an average reported grade of 13.03 grams per tonne (g/t) gold milled (the Boston Richardson Mine). Milling recoveries were reported to be in the 50% to 60% range (Nordmin Engineering Ltd. [Nordmin] 2021).

From 1901 to 1905, three gold bearing belts were intersected in the Dolliver Mountain mine, located 2 km west of the Boston Richardson Mine. In 1904, 7,195 tonnes were milled at a grade of 0.87 g/t to produce 205 ounces (oz) of gold. In 1905 results were unsatisfactory and mining at Dolliver Mountain mine ceased (Nordmin 2021).

From 1909 to 1910, the West Goldbrook exploration shaft intersected five gold bearing belts. Three of these were mill tested, but the milling results were considered unsatisfactory, and the mine was abandoned (Nordmin 2021).

The total volume mined from 1893 to 1910 within the EL has been estimated at 376,303 tonnes with an average recovered gold grade of 4.11 g/t to produce 54,871 oz. However, mill recovery is reported to have been approximately 67%. Operations at the mine continued on a small scale in 1911 and 1912 (Nordmin 2021).

In 1981, Patino Mines (Québec) Ltd. completed a geophysical program covering the Upper Seal Harbour district. In 1984, Onitap Resources Inc. (Onitap) acquired 37 claims overlying the EL. Between 1984 and 1988, Onitap conducted diamond drilling programs, airborne Very Low Frequency Electromagnetic (VLF-EM) surveys, and surface Induced Polarization (IP) surveys. During this period, several new mineralized belts were discovered (Nordmin 2021).

Orex acquired the EL from Onitap in 1988. Excepting a period of inactivity from 1996 to 2004, Orex pursued both surface and underground exploration programs, including large amounts of core drilling, metallurgical testing programs, resource estimation programs, and economic assessments of the EL.

Osisko Mining Corporation (Osisko), under the terms of an agreement with Orex, carried out an extensive core drilling assessment of the EL during the 2010 to 2012 period.

In March of 2017, Anaconda acquired control of the EL under the terms of a court approved Plan of Arrangement whereby Orex became a wholly-owned subsidiary of Anaconda. Work programs carried out in all years between 2017 to 2021 by Anaconda primarily focused on expansion and infill drilling of the Goldboro Gold Deposit as well as conducting an underground bulk sample in 2018.

2.1.1 Environmentally Sensitive Remnants of Past Activities

Records indicate that a large portion of the material brought to surface from the historic underground workings was milled in the area of the proposed Project. More than 385,000 tonnes of ore are reported to have been crushed from 1893 to 1912 in a stamp mill capable of processing up to 1,800 tonnes per month. The mill produced more than 1,700 kg of gold. Records also show that at least 775 tonnes of arsenical concentrate were produced for shipment to Belgium and Wales. Known areas of historic tailings, historic mine shafts, and stamp mills are shown in Figure 1.

Early gold production was via stamp mill and mainly mercury (Hg) amalgamation (Parsons et al., 2012). Gold concentrate was obtained by gravity methods using Wilfley tables until 1906, after which a bromo-cyanide plant was built. The continued use of gravity methods thereafter is uncertain.

Old foundations suggest the principal mill building was located immediately west of Gold Brook Lake, north of the existing Goldbrook Road. The presence of another mill is suggested based on the location of the tailings areas to the south of Goldbrook Road and Gold Brook Lake, however its location is unknown. The locations of past waste rock storage and ore storage areas are unknown.

Historically, tailings were deposited into streams and wetland areas with no provisions for containment or control of leachates. Consequently, tailings migrated along Gold Brook. Stream water samples collected downstream of the southernmost historic tailings areas have shown elevated levels of arsenic (As) and iron (Parsons et al., 2012). The PA has been subject to numerous research activities that are well documented. Sampling by the Geological Survey of Canada in 2012 (Parsons et al., 2012) showed elevated As and Hg levels within tailings of the Upper Seal Harbour area. Elevated As and Hg are also present along Gold Brook where tailings from mill processing from 1893 to 1910 were deposited within or adjacent to natural watercourses.

Orex has received an indemnification letter from the province of Nova Scotia releasing the Company from any liabilities related to the past mining and milling activities if those areas are not disturbed with new or proposed activities.

2.2 Summary of Phase I/II Environmental Site Assessment

GHD conducted a Limited Phase I and Phase II ESA for the Project in 2021 as described below.

2.2.1 Phase I ESA

The Phase I ESA consisted of a records review, site visit observations, an evaluation of information available from previous site work, and a screening of known areas of historic tailings within the area of Upper Seal Harbour.

In order to better define the potential impact of Project activities on historic tailings, a screening table was developed to summarize available information on 17 previously identified areas of historic tailings in the vicinity of Goldboro. Tailings areas A through Q are shown in Figure 1. Based on a review of previous tailings delineations (produced using sampling completed by the Geological Survey of Canada, WSP, and Anaconda), historic tailings areas F through Q are not anticipated to be directly or indirectly impacted by proposed Project infrastructure and were not retained for further investigation. Five tailings areas, A through E, are located in the vicinity of the Project and are likely to be disturbed by proposed activity. These five areas were the focus of further investigation in the Phase II ESA.

2.2.2 Phase II ESA

The Phase II ESA included collection of surface soils samples from five previously identified historic tailings areas, a review of analytical data, and recommendations for further assessment. The Phase II ESA was limited to the investigation of historic mine tailings found within the proposed mineral lease area for the Project.

In order to delineate the horizontal extent of historic tailings areas A through E, samples were collected using a hand auger. A total of 272 delineation points were inspected, including descriptions of lithology and any tailings material encountered; soils from 84 of these delineation points were sampled for analysis. Samples were visually inspected and submitted for analysis based on visual observations and geographic distribution. Delineation points and sample locations are shown in Figure 2.

Concentrations of As, selenium (Se), and zinc (Zn) in exceedance of the NS Tier 1 Environmental Quality Standards (EQS) were present in the historic tailings areas assessed. Arsenic exceedances were present in each of the historic tailings areas assessed (A through E) and are presented in Figure 3. Selenium exceedances were also present in each of the historic tailing areas assessed (A through E) and are presented in Figure 4. Zinc exceedances were present in historic tailings area B and were not recorded in the other areas assessed. The location of the Zn exceedance is presented in Figure 5.

Horizontal and vertical delineation of metals impacted soil was not achieved during this program. Further sampling is recommended to better define the horizontal and vertical extent of metals contamination. As discussed in Section 1, NSLI is currently undertaking a Phase I and Phase II ESA for all historic tailings located on Crown land within the Upper Seal Harbour Gold District and Lower Seal Harbour Gold District, including the PA. Further delineation of historic tailings within the PA will be completed as part of the NSLI program.

3. Remedial Options for Historic Tailings

The Limited Phase I and Phase II ESA has demonstrated tailings have been deposited by historic mining operations in the vicinity of Gold Brook Lake and Gold Brook. Five historic tailings areas, labelled A through E, are likely to be disturbed by proposed Project activities and will require remedial action prior to Project development. Areas of historic tailings overlapping with Project infrastructure are identified in Figure 6.

3.1 Short-Term Storage

Short-term storage of historic tailings disturbed by Project activities will be required during the construction of the initial stage of the TMF. Construction materials required for the TMF embankment, including till and non-potentially acid generating (NPAG) waste rock, will be extracted from the areas of the East Pit and West Pit. Historic tailings within the East Pit and West Pit areas will also be excavated at this time. Selection of short-term storage options will consider the following:

– Analytical results of historic tailings samples and comparison to provincial and/or site-specific screening values.
– Proximity of potential storage areas to ecological receptors and Project infrastructure.
– Installation of a geosynthetic liner, if required.
– Water management infrastructure required for the storage area, including ditches, settling ponds, and water treatment, if required.
– Construction, maintenance, and decommissioning of the storage areas.

Historic tailings in short-term storage areas will be transported to the lined TMF following the initial stage of its construction.

3.2 Long-Term Storage

The TMF constructed for the Project will be a paddock style, single cell facility located on a side hill northeast of Gold Brook Lake as shown in Figure 1. Tailings produced by the Project (in the form of a thickened tails slurry), PAG1 waste rock (Net Potential Ratio (NPR) <1, or 1 ≤ NPR ≤ 2 and total sulfur ≥ 0.2% by weight), and historic tailings will be transported to the TMF independently and deposited in separate locations within the TMF basin. Following placement, new and historic tailings and PAG1 waste rock will become inundated with thickened tailings slurry deposition and water. This will maintain new and historic tailings and the PAG1 waste rock below a water cover and in a saturated state. Maintaining these waste materials below the long-term saturated zone within the TMF will prevent the onset of acid rock drainage (ARD) conditions and help reduce metal leaching (ML).

The TMF embankment will be constructed of zoned earthfill and rockfill (i.e., finer materials at the core of the embankment with coarser materials upstream and downstream) with a geosynthetic lining system installed along the TMF basin floor and on the upstream face of the perimeter embankments. Installation of a liner beneath the TMF will minimize seepage exiting the facility and is preferred over construction of an unlined facility. The TMF design includes an initial starter embankment followed by subsequent stages. TMF stages will be expanded in stages throughout the operations phase.

3.2.1 Tailings Management Facility Water Management

Inflows will be temporarily stored in the TMF basin before being reclaimed for use in the process plant by a floating pump barge. Water reclaiming, treatment, and release will be conducted such as to maintain a 2 m minimum water cover over the deposited tailings surface.

A seepage collection system consisting of drains and pumps will be used to collect seepage from the TMF. Seepage from the TMF will be greatly reduced through use of a geosynthetic lining system. Drains will be installed in the foundation along the upstream toe of the TMF embankment to collect potential seepage below the embankment and safely direct it to the nearest downstream seepage collection sump, located adjacent to the downstream toe of the embankment.

Water collected in the seepage collection sumps will be transferred back into the TMF using a pump-back system. If the collected water is suitable for release to the environment (i.e., meets the discharge criteria), then it may be discharged to the downstream receiving environment.

Based on the predictive water quality analysis completed for the Project (GHD, 2022c), active water treatment is anticipated to be required to reduce metals, cyanide, and nitrogen series in effluent discharged from the TMF. A conceptual water treatment system (WTS) was designed for the TMF (GHD, 2022d) to treat effluent to applicable regulatory standards.

A polishing pond will be constructed southwest of the TMF and downstream of the TMF WTS to further clarify effluent prior to discharging to Gold Brook Lake. The polishing pond embankment will be constructed as a zoned rockfill dam and will include a geosynthetic lining system. The bulk fill within the embankment will consist of NPAG material, sourced from the open pits. The zoned embankment will be constructed with filter graded materials consisting of a liner bedding layer and one filter/transition zone (processed mine rock).

4. Mitigation Measures During Remediation

4.1 Historic Tailings Excavation

Historic tailings within the footprint of Project infrastructure, including the East Pit, West Pit, and haul road, will be removed via excavator. Tailings will be excavated to the delineated extents or to bedrock and under the supervision of a trained environmental professional.

Previous historic tailings assessments and delineation programs, including the Phase II ESA completed in 2021, will be used to identify the horizontal extent of tailings to be excavated. Further characterization and delineation will be completed using a combination of visual assessment and chemical analysis prior to excavation. Historic tailings in the Goldboro area are physically distinct from native soils and sediments and have the following characteristics:

– Tailings are a light grey-green to dark grey colour.
– Tailings are a silty sand-like material, with no rocks or gravel throughout.
– Tailings are a finer sand than most native soils in the area.

Historic tailings will be placed in haul trucks for transport to the short-term storage area. The volume of tailings material excavated shall be recorded, and photos shall be taken both during excavation and material placement.

Soil and sediment samples will be collected along the horizontal extents of the excavated areas in accordance with the NS *Confirmation of Remediation Protocol* (PRO-700). Samples will also be collected at the vertical extent of excavation where the excavation does not extend to the top of bedrock. Confirmatory samples will be analyzed for metals and Hg and compared to the NS Tier 1 EQS and/or site-specific screening values.

4.2 Water Management

The historic tailings that will be disturbed by Project activities are present in wetland areas south of Gold Brook Lake and in Gold Brook, as shown in Figure 6. Instream excavation work will be conducted in accordance with the Nova Scotia *Activities Designation Regulations* and the *Nova Scotia Watercourse Alterations Standard* and will be limited to the low flow period between June 1st and September 30th. Sections of Gold Brook will be temporarily diverted using cofferdams and a lined diversion channel in order to provide a relatively dry working area during excavation and prevent the mobilization of tailings further downstream.

4.3 Historic Tailings Transport

Historic tailings within the footprint of Project infrastructure will be deposited directly into haul trucks via excavator and transported directly to either the short-term storage area or the TMF. The tailings will be dewatered by gravity in the excavator bucket to the extent practicable prior to being loaded into haul trucks. Truck boxes will be sealed to reduce discharge of water during transport. Existing haul roads will be used to the extent possible with temporary roads constructed only when required to access historic tailings areas.

4.4 Monitoring

4.4.1 Monitoring of Remediated Areas

As noted in Section 4.1, soil and sediment samples will be collected along the horizontal extents of the excavated areas in accordance with the NS Confirmation of Remediation Protocol (PRO-700). Samples will also be collected at the vertical extent of excavation where excavation does not extend to the top of bedrock. Confirmatory samples will be analyzed for metals and Hg and compared to the NS Tier 1 EQS and/or site-specific screening values.

Should confirmatory samples exceed the relevant criteria, additional excavation and sampling will be completed in order to delineate the remedial area extent.

4.4.2 Tailings Management Facility Water Monitoring

Monitoring of the TMF and associated infrastructure will be carried out at specified regular intervals to evaluate the performance of the TMF and confirm regulatory compliance. Regular inspections of the TMF and associated infrastructure will be completed as part of the TMF operations to confirm that the TMF is being operated in accordance with the design intent.

Seepage from the TMF will be collected in the seepage collection system which will consist of drains and sumps. Water collected in the seepage collection sumps will be sampled at regular intervals, which will determine if the water will be transferred back into the TMF using a pump back system or if is suitable for release to the environment (i.e., meets the discharge criteria defined in the Industrial Approval). Water in the TMF polishing pond and receiving environment downstream will also be monitored regularly to confirm regulatory compliance.

4.4.3 Monitoring of Historic Tailings Not Directly Disturbed by the Project

Based on the water balance analysis and hydraulic modelling completed for the Project (GHD, 2022b; GHD, 2022e), there is an expected increase of water levels in Gold Brook from baseline to West Pit End of Mine (EOM) based on the under low flow conditions (defined as 10^{th} percentile flows). The predicted increase in water levels at West Pit EOM under low flow conditions is within the range observed in baseline. For average flow conditions, the maximum difference in water levels between baseline and West Pit EOM is considered negligible. Considering the predicted increase in water levels at West Pit EOM under low flow conditions it is unlikely that any new areas of historic tailings within the sediments of Gold Brook will be exposed as a result of the Project.

Surface water and groundwater in the vicinity of the historic tailings areas will be monitored over the duration of the Project as detailed in the Water Monitoring Plan developed for the Project (GHD, 2022a). Groundwater elevations will be monitored in existing wells located between the open pits and the historic tailings areas to provide an early indicator of potential reduction of groundwater contribution to Gold Brook and surrounding wetlands. If a reduction in groundwater elevations is observed that is greater than minimum predicted groundwater elevations, and there is an increase in constituent concentrations in surface water approaching applicable regulatory standards (Canadian Council of Ministers of the Environment (CCME) Water Quality Guidelines for the Protection of Aquatic Life, NS Tier 1 EQS, or Site-Specific Water Quality Guidelines (SSWQG)), Anaconda will implement an adaptive management approach. Additional mitigation measures that could be undertaken include excavation and transportation of dewatered tailings material to the TMF and covering disturbed tailings with a low permeability cover.

4.5 Reporting

Remediation of historic tailings will be documented and recorded for planning purposes and will include the following information:

– Confirmatory sampling results and laboratory certificates.
– Photos of the excavation, transport, and placement of the material.
– The delineation points used to determine extent of excavated historic tailings.
– Volumes of the removed material.
– Groundwater sampling results and water levels.

External reporting provided to NSECC will be completed in accordance with the Nova Scotia *Confirmation of Remediation Protocol* (PRO-700). A Remedial Action Plan in accordance with Nova Scotia PRO-600 will also be completed prior to Project development. Additional reporting requirements may be required by the Project's Industrial Approval.

5. Closure

All of which is respectfully submitted

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6. Limitations

This report: has been prepared by GHD for Anaconda Mining Inc. and may only be used and relied on by Anaconda Mining Inc. for the purpose agreed between GHD and Anaconda Mining Inc. as set out in this report.

GHD otherwise disclaims responsibility to any person other than Anaconda Mining Inc. arising in connection with this report. GHD also excludes implied warranties and conditions, to the extent legally permissible.

The services undertaken by GHD in connection with preparing this report were limited to those specifically detailed in the report and are subject to the scope limitations set out in the report.

The opinions, conclusions and any recommendations in this report are based on conditions encountered and information reviewed at the date of preparation of the report. GHD has no responsibility or obligation to update this report to account for events or changes occurring subsequent to the date that the report was prepared.

The opinions, conclusions and any recommendations in this report are based on assumptions made by GHD described in this report. GHD disclaims liability arising from any of the assumptions being incorrect.

7. References

GHD Limited (GHD). 2022a. Water Monitoring Plan, Goldboro Gold Project. May 2022.

GHD. 2022b. Water Balance Analysis Summary Report, Goldboro Gold Project. May 2022.

GHD. 2022c. Predictive Water Quality Assessment, Goldboro Gold Project. May 2022.

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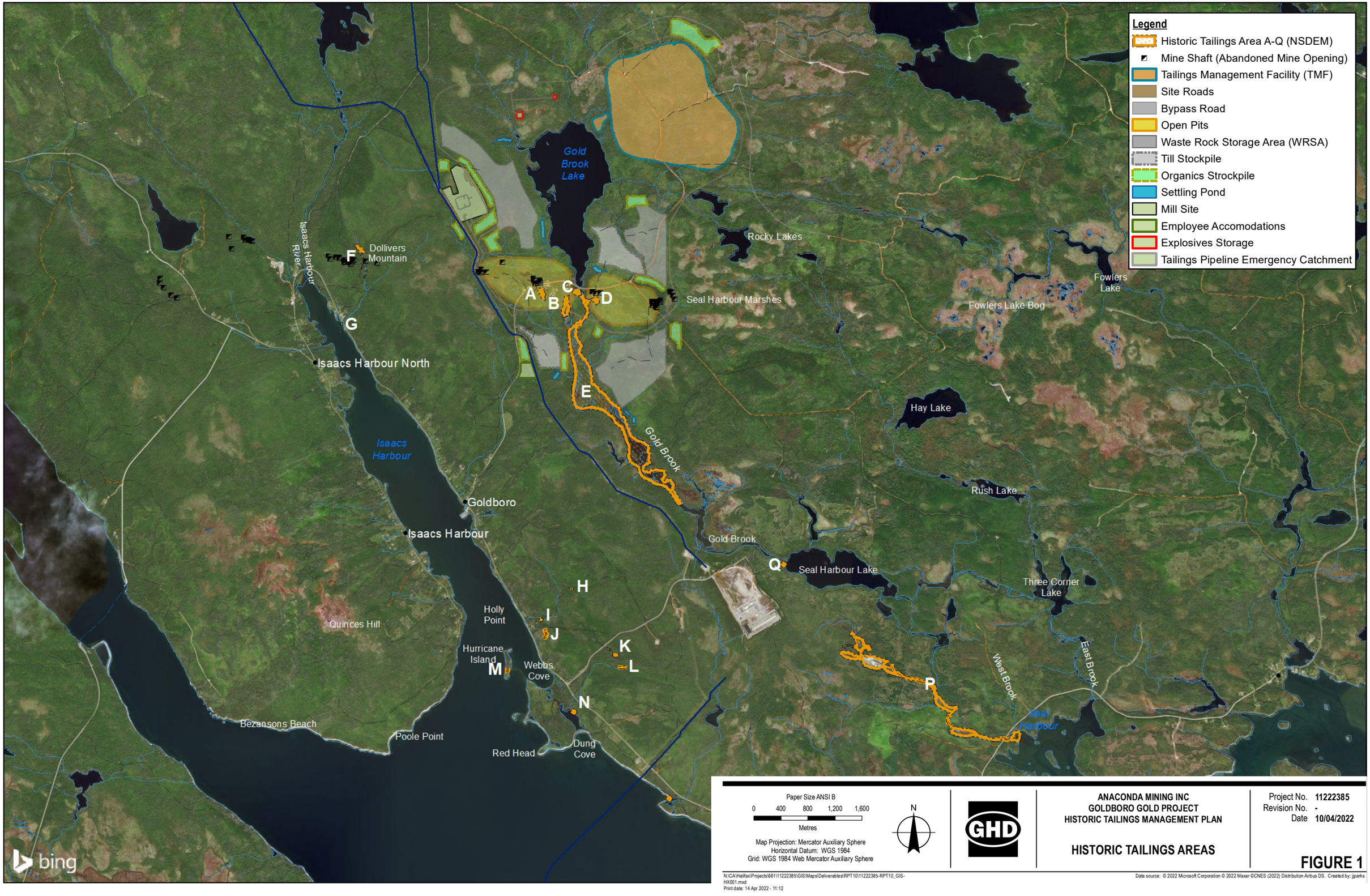
Parsons, M.B., Leblanc, K.W.G., Hall, G.E.M., Sangster, A.L., Vaive, J.E., and Pelchat, P. 2012. Environmental geochemistry of tailings, sediments and surface waters collected from 14 historical gold mining districts in Nova Scotia.



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GHD

ANACONDA MINING INC
GOLDBORO GOLD PROJECT
HISTORIC TAILINGS MANAGEMENT PLAN

HISTORIC TAILINGS AREAS

Project No. **11222385**
Revision No. **-**
Date **10/04/2022**

FIGURE 1

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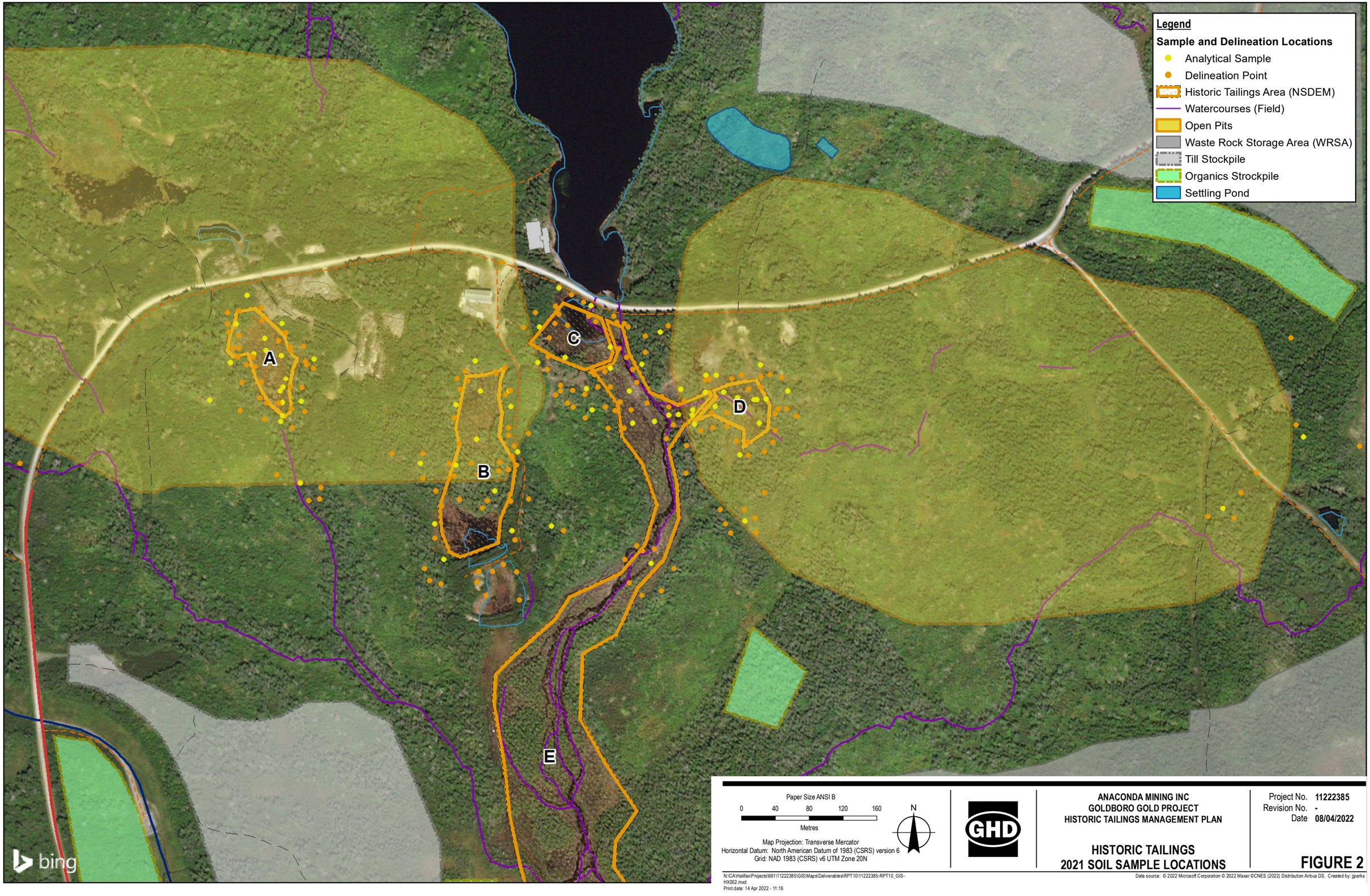

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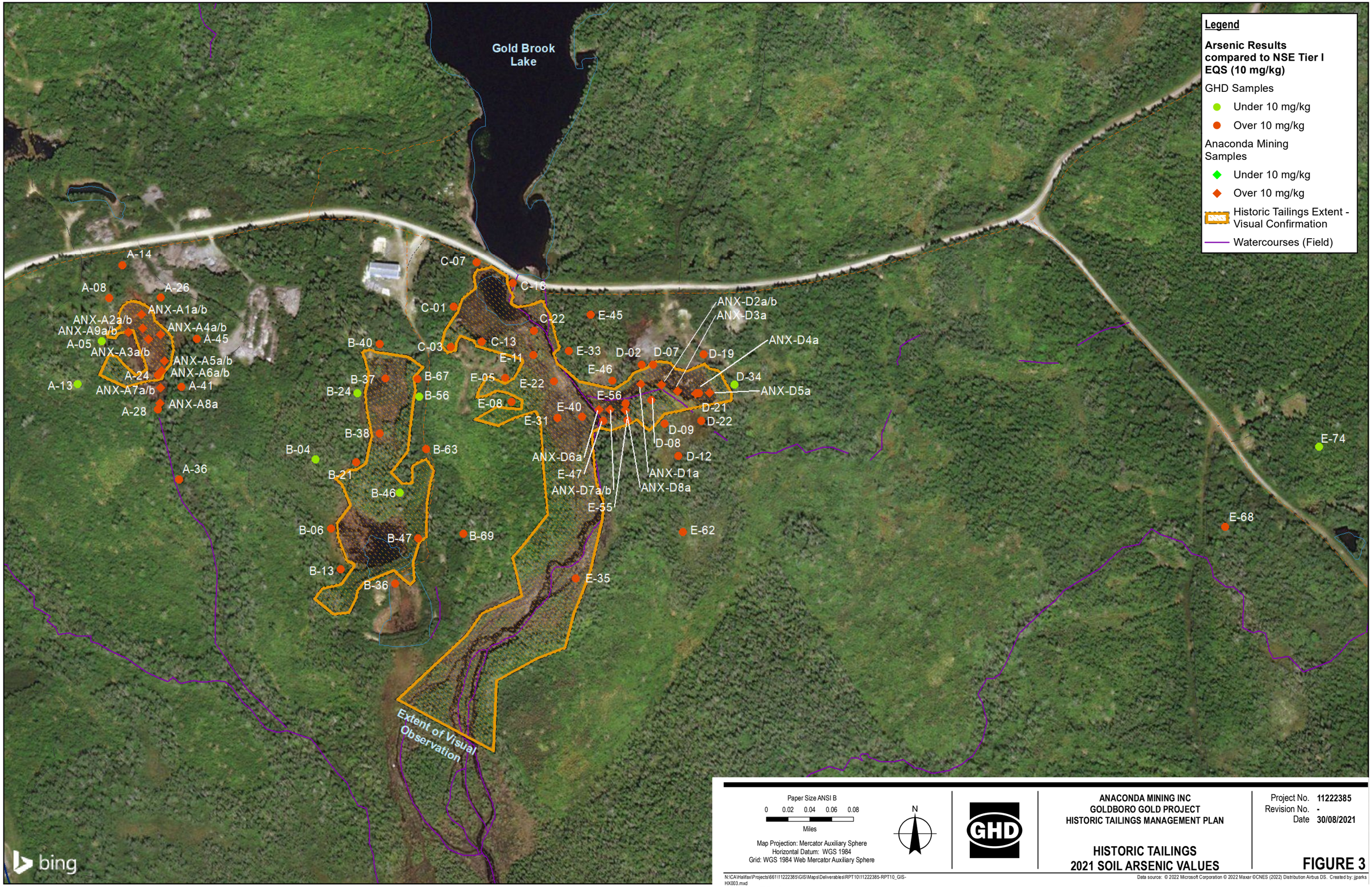
ANACONDA MINING INC
GOLDBORO GOLD PROJECT
HISTORIC TAILINGS MANAGEMENT PLAN

HISTORIC TAILINGS
2021 SOIL SAMPLE LOCATIONS

Project No. 11222385
Revision No. -
Date 08/04/2022

FIGURE 2



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Miles

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ANACONDA MINING INC
GOLDBORO GOLD PROJECT
HISTORIC TAILINGS MANAGEMENT PLAN

HISTORIC TAILINGS
2021 SOIL ARSENIC VALUES

Project No. 11222385
Revision No. -
Date 30/08/2021

FIGURE 3

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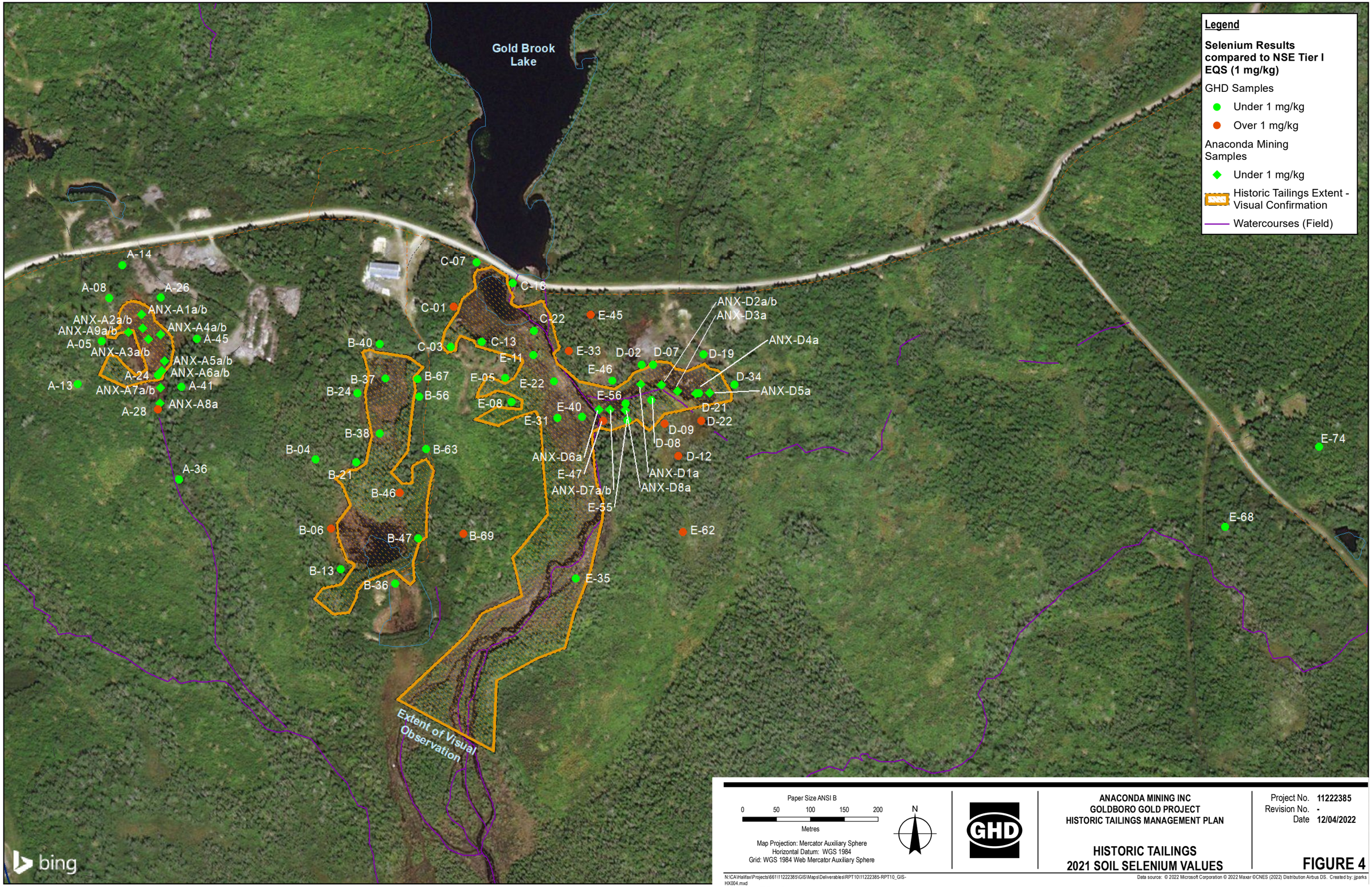
Gold Brook Lake
Legend
Selenium Results compared to NSE Tier I EQS (1 mg/kg)
GHD Samples
Under 1 mg/kg
Over 1 mg/kg
Anaconda Mining Samples
Under 1 mg/kg
Historic Tailings Extent - Visual Confirmation
Watercourses (Field)
A-14
A-08
A-26
ANX-A1a/b
ANX-A2a/b
ANX-A9a/b
ANX-A4a/b
A-45
A-05
ANX-A3a/b
ANX-A5a/b
ANX-A6a/b
A-24
A-13
ANX-A7a/b
A-41
A-28
ANX-A8a
A-36
B-40
B-37
B-67
B-24
B-56
B-38
B-04
B-63
B-21
B-46
B-06
B-47
B-69
B-13
B-36
C-07
C-16
C-01
C-22
C-03
C-13
E-11
E-05
E-22
E-08
E-31
E-45
E-33
D-02
D-07
D-19
E-46
E-56
E-40
E-47
ANX-D6a
ANX-D7a/b
E-55
ANX-D2a/b
ANX-D3a
ANX-D4a
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D-22
D-09
D-08
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ANACONDA MINING INC
GOLDBORO GOLD PROJECT
HISTORIC TAILINGS MANAGEMENT PLAN
HISTORIC TAILINGS
2021 SOIL SELENIUM VALUES
Project No. 11222385
Revision No. -
Date 12/04/2022
FIGURE 4
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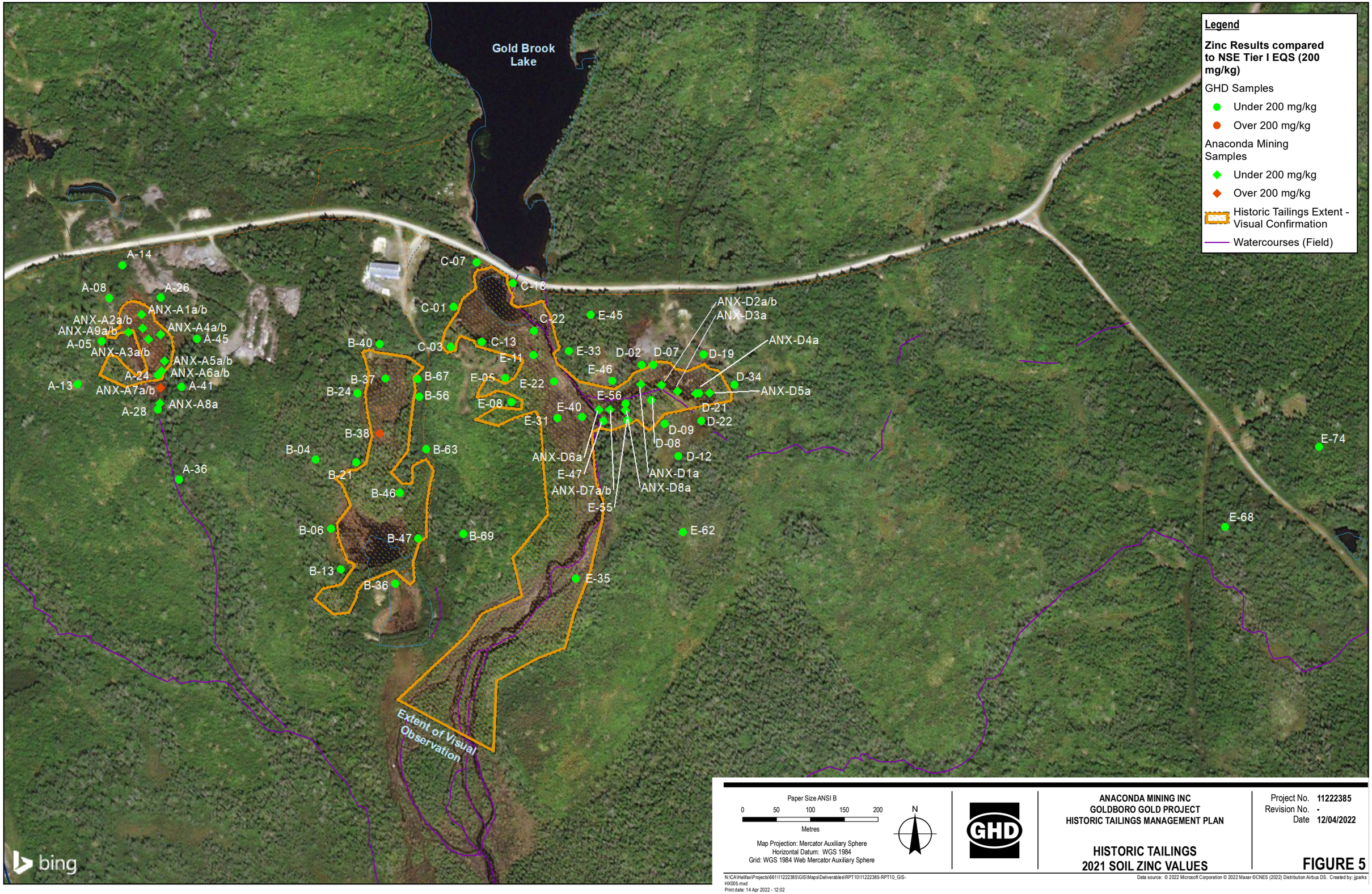
Gold Brook Lake
A-14
A-08
A-26
ANX-A1a/b
ANX-A2a/b
ANX-A9a/b
ANX-A4a/b
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A-45
ANX-A3a/b
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ANX-A6a/b
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ANX-D5a
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D-22
D-09
D-08
D-12
ANX-D1a
ANX-D8a
E-62
E-74
E-68
Extent of Visual Observation
bing
Legend
Zinc Results compared to NSE Tier I EQS (200 mg/kg)
GHD Samples
Under 200 mg/kg
Over 200 mg/kg
Anaconda Mining Samples
Under 200 mg/kg
Over 200 mg/kg
Historic Tailings Extent - Visual Confirmation
Watercourses (Field)
Paper Size ANSI B
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Grid: WGS 1984 Web Mercator Auxiliary Sphere
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ANACONDA MINING INC
GOLDBORO GOLD PROJECT
HISTORIC TAILINGS MANAGEMENT PLAN
HISTORIC TAILINGS
2021 SOIL ZINC VALUES
Project No. 11222385
Revision No. -
Date 12/04/2022
FIGURE 5
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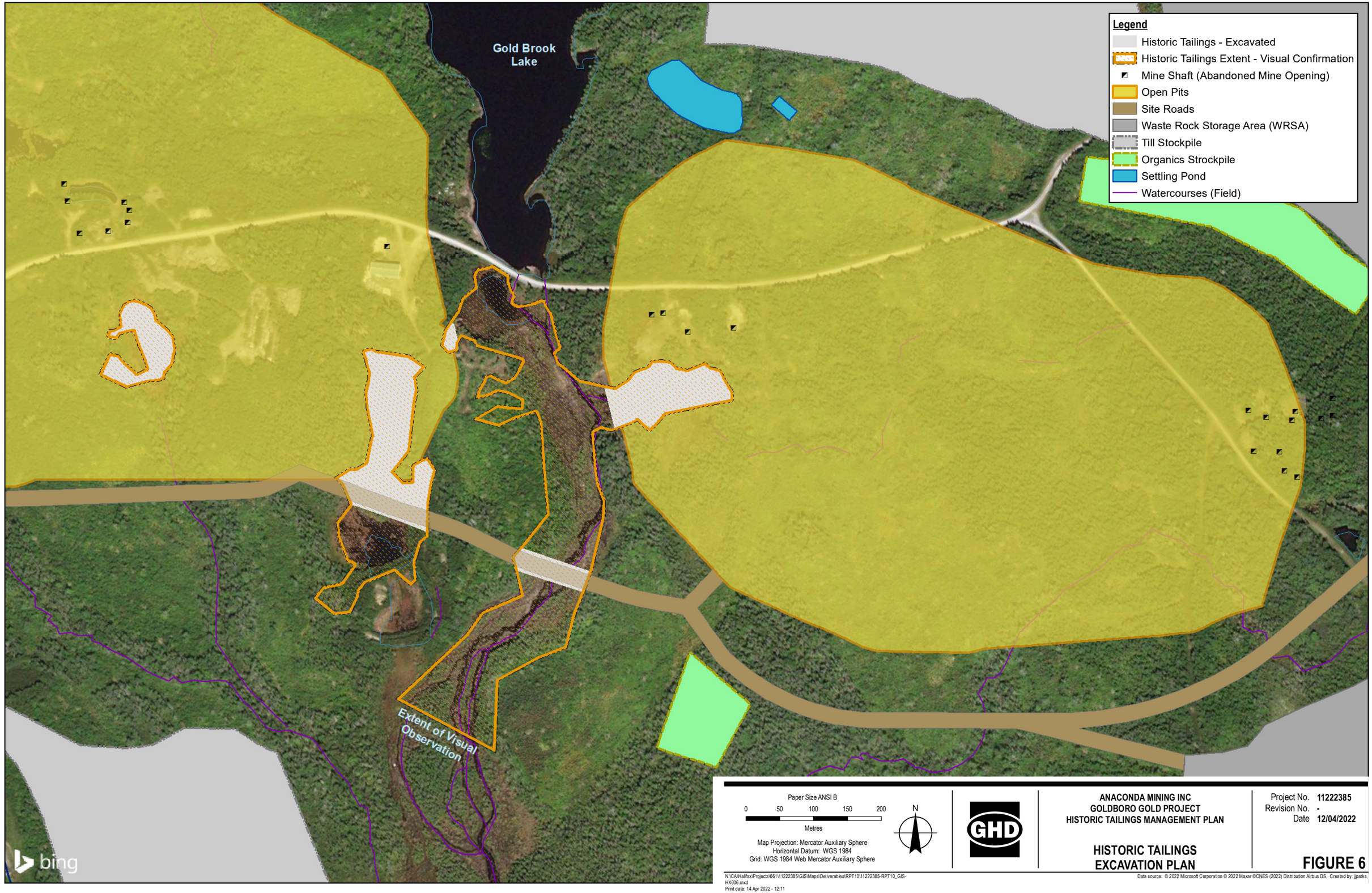

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ANACONDA MINING INC
GOLDBORO GOLD PROJECT
HISTORIC TAILINGS MANAGEMENT PLAN

HISTORIC TAILINGS EXCAVATION PLAN

Project No. **11222385**
Revision No. **-**
Date **12/04/2022**

FIGURE 6

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The Power of Commitment