Your P.O. #: 6404002992
Your Project #: 61980
Site Location: MDMER/SNP/SEEPAGE
Your C.O.C. #: 101246

Attention: COMPLIANCE TEAM

Arctic Canadian Diamond Company Ltd
900, 606 4 Street SW
Calgary, AB
CANADA T2P 1T1

Report Date: 2024/06/11
Report #: R3512053
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C438812
Received: 2024/05/30, 10:00

Sample Matrix: Water
Samples Received: 1

Analyses	Quantity	Date Extracted	Date Analyzed	Laboratory Method	Analytical Method
Acidity pH 4.5 & pH 8.3 (as CaCO3)	1	N/A	2024/06/04	AB SOP-00005	SM 24 2310 B m
Alkalinity - Low Level	1	N/A	2024/06/05	AB SOP-00005	SM 24 2320 B m
Low level chloride/sulphate by AC	1	N/A	2024/06/03	AB SOP-00020	SM24-4500-Cl/SO4-E m
Conductance - Low Level	1	N/A	2024/06/05	AB SOP-00005	SM 24 2510 B m
Fluoride - Low Level	1	N/A	2024/06/05	AB SOP-00005	SM 24 4500-F C m
Hardness Total (calculated as CaCO3) (1)	1	N/A	2024/06/10	BBY WI-00033	Auto Calc
Mercury (Total) by CV	1	2024/05/31	2024/06/05	AB SOP-00084	BCMOE BCLM Oct2013 m
Elements by ICP - Total	1	2024/06/07	2024/06/07	AB SOP-00014 / AB SOP-00042	EPA 6010d R5 m
Elements by ICPMS - Total	1	2024/06/07	2024/06/07	AB SOP-00014 / AB SOP-00043	EPA 6020b R2 m
Ammonia-N Low Level (Preserved)	1	N/A	2024/06/03	AB SOP-00007	SM 24 4500 NH3 A G m
Nitrate + Nitrite-N (calculated) Low Lev	1	N/A	2024/06/04		Auto Calc
Nitrogen (Nitrite - Nitrate) Low Level	1	N/A	2024/06/03	AB SOP-00023	SM 24 4110 B m
pH @25°C (2)	1	N/A	2024/06/05	AB SOP-00005	SM 24 4500-H+B m
pH (Field)	1	N/A	2024/05/30	Field Test	Field Test
Orthophosphate LL by Automated Analyzer (3)	1	N/A	2024/06/01	AB SOP-00025	SM 24 4500-P A, F m
Silica (Reactive)	1	N/A	2024/06/06	AB SOP-00011	EPA 370.1 R1978 m
Sulphate (SO4) by IC	1	N/A	2024/06/03	AB SOP-00026	SM 24 4110 B m
Carbon (total) (Calc. - Org. + Inorg.)	1	N/A	2024/06/04		Auto Calc
Hydrocarbons (C10-C30) in Water - GC/FID (4)	1	2024/05/31	2024/05/31	CAL SOP-00239	BCMOE EPH W 09/17
Temperature (Field)	1	N/A	2024/05/30	Field Test	Field Test
Carbon (Inorganic)	1	N/A	2024/06/03	CAL SOP-00076	Modified AE 2411
Total Kjeldahl Nitrogen (Total)	1	N/A	2024/06/04	BBY WI-00033	Auto Calc
Nitrogen (Total)	1	2024/06/03	2024/06/03	AB SOP-00093	SM 24 4500-N C m
Carbon (Total Organic) (5)	1	N/A	2024/06/04	AB SOP-00087	MMCW 119 1996 m
Total Phosphorus Low Level Dissolved (6)	1	2024/06/04	2024/06/05	AB SOP-00024	SM 24 4500-P A,B,F m
Total Phosphorus Low Level Total	1	2024/06/03	2024/06/03	AB SOP-00024	SM 24 4500-P A,B,F m
TPH (C5-C30) Water Calc	1	N/A	2024/06/01		
Total Suspended Solids (NFR)	1	2024/06/03	2024/06/04	AB SOP-00061	SM 24 2540 D m
Turbidity	1	N/A	2024/05/30	CAL SOP-00081	SM 24 2130 B m
Volatile HC-BTEX (7)	1	2024/05/30	2024/05/31		Auto Calc

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Report Date: 2024/06/11
Report #: R3512053
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CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C438812
Received: 2024/05/30, 10:00

Sample Matrix: Water
Samples Received: 1

Analyses	Quantity	Date Extracted	Date Analyzed	Laboratory Method	Analytical Method
BTEX/MTBE/Styrene/VPH in Water GC/MS/FID	1	2024/05/31	2024/05/31	CAL SOP-00240	BC MELP VH 2017
Ion Balance (8)	1	N/A	2024/06/10		
Total Dissolved Solids (Calculated) (8)	1	N/A	2024/06/10		

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, EPA, APHA or the Quebec Ministry of Environment.

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.
This Certificate shall not be reproduced except in full, without the written approval of the laboratory.
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) "Total Hardness" was calculated from Total Ca and Mg concentrations and may be biased high (Hardness, or Dissolved Hardness, calculated from Dissolved Ca and Mg, should be used for compliance if available).
(2) The CCME method requires pH to be analysed within 15 minutes of sampling and therefore field analysis is required for compliance. All Laboratory pH analyses in this report are reported past the CCME holding time. Bureau Veritas endeavours to analyze samples as soon as possible after receipt.
(3) Orthophosphate > Total Phosphorus Imbalance: When applicable, Orthophosphate, Total Phosphorus and dissolved Phosphorus results were reviewed and data quality meets acceptable levels unless otherwise noted.
(4) Sample(s) analyzed using methodologies that have been subjected to Bureau Veritas's standard validation process for the submitted matrix however it is not an accredited method.
(5) TOC present in the sample should be considered as non-purgeable TOC.
(6) Dissolved Phosphorus > Total Phosphorus Imbalance: When applicable, Dissolved Phosphorus and Total Phosphorus results were reviewed and data quality meets acceptable levels unless otherwise noted.

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(7) VPH = VH - (Benzene + Toluene + Ethylbenzene + m & p-Xylene + o-Xylene + Styrene)
(8) Calculation was conducted as per client request using CAL PDF-00333.

Encryption Key

Please direct all questions regarding this Certificate of Analysis to:
Geraldlyn Gouthro, Key Account Specialist
Email: geraldlyn.gouthro@bureauveritas.com
Phone# (403) 291-3077
==========
This report has been generated and distributed using a secure automated process.
Bureau Veritas 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 Signatures page if included, otherwise available by request. For Department specific Analyst/Supervisor validation names, please refer to the Test Summary section if included, otherwise available by request. This report is authorized by Scott Cantwell, General Manager responsible for Alberta Environmental laboratory operations.

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Bureau Veritas Job #: C438812
Report Date: 2024/06/11

Arctic Canadian Diamond Company Ltd
Client Project #: 61980
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

RESULTS OF CHEMICAL ANALYSES OF WATER

Bureau Veritas ID		COJ205		
Sampling Date		2024/05/27 10:50		
COC Number		101246		
	UNITS	**0008-SA3**	**RDL**	**QC Batch**
Calculated Parameters				
Total Hardness (CaCO3)	mg/L	46.1	0.50	B384822
Calculated Ion Balance (% Difference)	%	0.99		B384859
Nitrate plus Nitrite (N)	mg/L	0.88	0.0022	B384833
Calculated Total Dissolved Solids	mg/L	70	0.95	B384860
Total Total Kjeldahl Nitrogen (Calc)	mg/L	0.267	0.020	B385404
Field Parameters				
Field pH	pH	7.10	N/A	ONSITE
Field Temperature (Fd)	deg. C	1.9	N/A	ONSITE
Misc. Inorganics				
Fluoride (F)	mg/L	0.133	0.010	B391358
pH	pH	7.30	N/A	B391351
Reactive Silica	mg/L	0.52	0.050	B392376
Acidity (pH 4.5)	mg/L	<1.0	1.0	B389863
Alkalinity (Total as CaCO3)	mg/L	26.6	0.50	B391347
Total Organic Carbon (C)	mg/L	2.6	0.20	B390113
Acidity (pH 8.3)	mg/L	1.4	1.0	B389863
Alkalinity (PP as CaCO3)	mg/L	<0.50	0.50	B391347
Bicarbonate (HCO3)	mg/L	32.5	0.50	B391347
Carbonate (CO3)	mg/L	<0.50	0.50	B391347
Hydroxide (OH)	mg/L	<0.50	0.50	B391347
Total Suspended Solids	mg/L	1.1	1.0	B388402
Anions				
Orthophosphate (P)	mg/L	<0.0010	0.0010	B387232
Chloride (Cl)	mg/L	2.4	0.50	B388640
Dissolved-Low Level Sulphate (SO4)	mg/L	25	0.30	B388306
Nutrients				
Total Carbon (C)	mg/L	8.3	0.50	B384850
Total Inorganic Carbon (C)	mg/L	5.7	1.0	B388552
Dissolved Phosphorus (P)	mg/L	<0.0020	0.0020	B389816
Total Phosphorus (P)	mg/L	0.0069	0.0020	B388576
Total Ammonia (N)	mg/L	0.028	0.0050	B388430

RDL = Reportable Detection Limit
N/A = Not Applicable

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Arctic Canadian Diamond Company Ltd
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RESULTS OF CHEMICAL ANALYSES OF WATER

Bureau Veritas ID		COJ205		
Sampling Date		2024/05/27 10:50		
COC Number		101246		
	UNITS	**0008-SA3**	**RDL**	**QC Batch**
Nitrite (N)	mg/L	0.019	0.0010	B388650
Nitrate (N)	mg/L	0.86	0.0020	B388650
Total Nitrogen (N)	mg/L	1.1	0.020	B388755
Physical Properties				
Conductivity	uS/cm	115	1.0	B391354
Physical Properties				
Turbidity - NTU	NTU	2.7	0.10	B384602
RDL = Reportable Detection Limit				

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MERCURY BY COLD VAPOR (WATER)

Bureau Veritas ID		COJ205		
Sampling Date		2024/05/27 10:50		
COC Number		101246		
	UNITS	**0008-SA3**	**RDL**	**QC Batch**
Elements				
Total Mercury (Hg)	mg/L	<0.0000019	0.0000019	B386464
RDL = Reportable Detection Limit				

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ELEMENTS BY ATOMIC SPECTROSCOPY (WATER)

Bureau Veritas ID		COJ205		
Sampling Date		2024/05/27 10:50		
COC Number		101246		
	UNITS	**0008-SA3**	**RDL**	**QC Batch**
Elements				
Total Aluminum (Al)	mg/L	0.087	0.0030	B394112
Total Antimony (Sb)	mg/L	<0.00060	0.00060	B394112
Total Arsenic (As)	mg/L	0.00029	0.00020	B394112
Total Barium (Ba)	mg/L	0.024	0.010	B394104
Total Beryllium (Be)	mg/L	<0.0010	0.0010	B394112
Total Boron (B)	mg/L	<0.020	0.020	B394104
Total Cadmium (Cd)	mg/L	<0.000020	0.000020	B394112
Total Calcium (Ca)	mg/L	7.9	0.30	B394104
Total Chromium (Cr)	mg/L	<0.0010	0.0010	B394112
Total Cobalt (Co)	mg/L	0.00040	0.00030	B394112
Total Copper (Cu)	mg/L	<0.0010	0.0010	B394112
Total Iron (Fe)	mg/L	0.26	0.060	B394104
Total Lead (Pb)	mg/L	0.00038	0.00020	B394112
Total Lithium (Li)	mg/L	<0.020	0.020	B394104
Total Magnesium (Mg)	mg/L	6.4	0.20	B394104
Total Manganese (Mn)	mg/L	0.059	0.0040	B394104
Total Molybdenum (Mo)	mg/L	0.00088	0.00020	B394112
Total Nickel (Ni)	mg/L	0.0054	0.00050	B394112
Total Potassium (K)	mg/L	3.9	0.30	B394104
Total Selenium (Se)	mg/L	<0.00020	0.00020	B394112
Total Silicon (Si)	mg/L	0.56	0.50	B394104
Total Silver (Ag)	mg/L	<0.00010	0.00010	B394112
Total Sodium (Na)	mg/L	3.9	0.50	B394104
Total Strontium (Sr)	mg/L	0.066	0.020	B394104
Total Sulphur (S)	mg/L	8.2	0.20	B394104
Total Thallium (Tl)	mg/L	<0.00020	0.00020	B394112
Total Tin (Sn)	mg/L	<0.0010	0.0010	B394112
Total Titanium (Ti)	mg/L	0.0045	0.0010	B394112
Total Uranium (U)	mg/L	0.0012	0.00010	B394112
Total Vanadium (V)	mg/L	<0.0010	0.0010	B394112
Total Zinc (Zn)	mg/L	<0.0030	0.0030	B394112
RDL = Reportable Detection Limit				

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TOTAL PETROLEUM HYDROCARBONS (WATER)

Bureau Veritas ID		COJ205		
Sampling Date		2024/05/27 10:50		
COC Number		101246		
	UNITS	**0008-SA3**	**RDL**	**QC Batch**
Hydrocarbons				
Total Extractables C10 to C30	mg/L	<0.20	0.20	B385198
Total hydrocarbons C5-C30	mg/L	<0.22	0.22	B384853
Surrogate Recovery (%)				
O-TERPHENYL (sur.)	%	93		B385198
RDL = Reportable Detection Limit				

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VOLATILE ORGANICS BY GC-MS (WATER)

Bureau Veritas ID		COJ205		
Sampling Date				
COC Number		101246		
	UNITS	**0008-SA3**	**RDL**	**QC Batch**
Volatiles				
LH (C5-C10)	mg/L	<0.10	0.10	B384561
Xylenes (Total)	mg/L	<0.00057	0.00057	B384854
VH C6-C10	mg/L	<0.14	0.14	B384854
VPH (VH6 to 10 - BTEX)	mg/L	<0.14	0.14	B384854
Benzene	mg/L	<0.00040	0.00040	B384561
Toluene	mg/L	<0.00040	0.00040	B384561
Ethylbenzene	mg/L	<0.00040	0.00040	B384561
m & p-Xylene	mg/L	<0.00040	0.00040	B384561
o-Xylene	mg/L	<0.00040	0.00040	B384561
Styrene	mg/L	<0.00040	0.00040	B384561
Surrogate Recovery (%)				
1,4-Difluorobenzene (sur.)	%	99		B384561
4-Bromofluorobenzene (sur.)	%	102		B384561
D4-1,2-Dichloroethane (sur.)	%	90		B384561
RDL = Reportable Detection Limit				

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GENERAL COMMENTS

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

Package 1	7.7°C
Package 2	2.5°C
Package 3	1.5°C
Package 4	2.1°C

Sample COJ205 [0008-SA3] : Sample was analyzed past method specified hold time for Nitrogen (Nitrite - Nitrate) Low Level. Exceedance of hold time increases the uncertainty of test results but does not necessarily imply that results are compromised.

RESULTS OF CHEMICAL ANALYSES OF WATER Comments

Sample COJ205 [0008-SA3] Nitrogen (Nitrite - Nitrate) Low Level: Sample analyzed past hold time.

Results relate only to the items tested.

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QUALITY ASSURANCE REPORT

Arctic Canadian Diamond Company Ltd
Client Project #: 61980
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

			Matrix Spike		Spiked Blank		Method Blank		RPD		QC Standard	
QC Batch	Parameter	Date	% Recovery	QC Limits	% Recovery	QC Limits	Value	UNITS	Value (%)	QC Limits	% Recovery	QC Limits
B384561	1,4-Difluorobenzene (sur.)	2024/05/31	102	70 - 130	101	70 - 130	101	%				
B384561	4-Bromofluorobenzene (sur.)	2024/05/31	102	70 - 130	101	70 - 130	101	%				
B384561	D4-1,2-Dichloroethane (sur.)	2024/05/31	98	70 - 130	97	70 - 130	91	%				
B385198	O-TERPHENYL (sur.)	2024/05/31	95	60 - 140	90	60 - 140	89	%				
B384561	Benzene	2024/05/31	94	50 - 140	84	60 - 130	<0.00040	mg/L	NC	30		
B384561	Ethylbenzene	2024/05/31	95	50 - 140	83	60 - 130	<0.00040	mg/L	NC	30		
B384561	LH (C5-C10)	2024/05/31					<0.10	mg/L	NC	30		
B384561	m & p-Xylene	2024/05/31	93	50 - 140	82	60 - 130	<0.00040	mg/L	NC	30		
B384561	o-Xylene	2024/05/31	94	50 - 140	82	60 - 130	<0.00040	mg/L	NC	30		
B384561	Styrene	2024/05/31	111	50 - 140	97	60 - 130	<0.00040	mg/L	NC	40		
B384561	Toluene	2024/05/31	91	50 - 140	80	60 - 130	<0.00040	mg/L	NC	30		
B384602	Turbidity - NTU	2024/05/30			102	80 - 120	<0.10	NTU	2.7	20		
B385198	Total Extractables C10 to C30	2024/05/31	94	60 - 140	85	70 - 130	<0.20	mg/L	NC	30		
B386464	Total Mercury (Hg)	2024/06/04	95	80 - 120	95	80 - 120	<0.0000019	mg/L	5.2	20		
B387232	Orthophosphate (P)	2024/06/01	NC	80 - 120	110	80 - 120	0.0010, RDL=0.0010 (1)	mg/L	6.1	20		
B388306	Dissolved-Low Level Sulphate (SO4)	2024/06/03	104	80 - 120	105	80 - 120	<0.050	mg/L	0.54	20		
B388402	Total Suspended Solids	2024/06/03	100	80 - 120	100	80 - 120	<1.0	mg/L	NC	20		
B388430	Total Ammonia (N)	2024/06/03	102	80 - 120	102	80 - 120	<0.0050	mg/L	NC	20		
B388552	Total Inorganic Carbon (C)	2024/06/03	109	80 - 120	109	80 - 120	<1.0	mg/L	1.8	20		
B388576	Total Phosphorus (P)	2024/06/03	97	80 - 120	92	80 - 120	<0.0010	mg/L	0.91	20	85	80 - 120
B388640	Chloride (Cl)	2024/06/03	102	80 - 120	101	80 - 120	<0.50	mg/L				
B388650	Nitrate (N)	2024/06/03	107	80 - 120	106	80 - 120	0.0043, RDL=0.0020 (2)	mg/L	0.37	20		
B388650	Nitrite (N)	2024/06/03	103	80 - 120	101	80 - 120	0.0018, RDL=0.0010 (1)	mg/L	3.8	20		
B388755	Total Nitrogen (N)	2024/06/03	NC	80 - 120	106	80 - 120	<0.020	mg/L	1.8	20	107	80 - 120
B389816	Dissolved Phosphorus (P)	2024/06/05	95	80 - 120	95	80 - 120	<0.0010	mg/L	NC	20	89	80 - 120
B389863	Acidity (pH 4.5)	2024/06/04					<1.0	mg/L	NC	20		
B389863	Acidity (pH 8.3)	2024/06/04			96	80 - 120	<1.0	mg/L	NC	20		

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Bureau Veritas Job #: C438812
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QUALITY ASSURANCE REPORT(CONT'D)

Arctic Canadian Diamond Company Ltd
Client Project #: 61980
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

			Matrix Spike		Spiked Blank		Method Blank		RPD		QC Standard	
QC Batch	Parameter	Date	% Recovery	QC Limits	% Recovery	QC Limits	Value	UNITS	Value (%)	QC Limits	% Recovery	QC Limits
B390113	Total Organic Carbon (C)	2024/06/04	101	80 - 120	105	80 - 120	<0.20	mg/L	1.5	20		
B391347	Alkalinity (PP as CaCO3)	2024/06/05					<0.50	mg/L				
B391347	Alkalinity (Total as CaCO3)	2024/06/05			100	80 - 120	<0.50	mg/L				
B391347	Bicarbonate (HCO3)	2024/06/05					<0.50	mg/L				
B391347	Carbonate (CO3)	2024/06/05					<0.50	mg/L				
B391347	Hydroxide (OH)	2024/06/05					<0.50	mg/L				
B391351	pH	2024/06/05			100	97 - 103						
B391354	Conductivity	2024/06/05			101	90 - 110	<1.0	uS/cm	0.42	20		
B391358	Fluoride (F)	2024/06/05	97	80 - 120	103	80 - 120	0.011, RDL=0.010 (1)	mg/L	NC	20		
B392376	Reactive Silica	2024/06/06	NC	80 - 120	112	80 - 120	<0.050	mg/L	3.6	20		
B394104	Total Barium (Ba)	2024/06/07	113	80 - 120	113	80 - 120	<0.010	mg/L	4.3	20		
B394104	Total Boron (B)	2024/06/07	111	80 - 120	113	80 - 120	<0.020	mg/L	7.0	20		
B394104	Total Calcium (Ca)	2024/06/07	109	80 - 120	109	80 - 120	<0.30	mg/L	5.7	20		
B394104	Total Iron (Fe)	2024/06/07	117	80 - 120	116	80 - 120	<0.060	mg/L	8.6	20		
B394104	Total Lithium (Li)	2024/06/07	111	80 - 120	110	80 - 120	<0.020	mg/L	NC	20		
B394104	Total Magnesium (Mg)	2024/06/07	109	80 - 120	110	80 - 120	<0.20	mg/L	6.5	20		
B394104	Total Manganese (Mn)	2024/06/07	113	80 - 120	114	80 - 120	<0.0040	mg/L	8.6	20		
B394104	Total Potassium (K)	2024/06/07	105	80 - 120	105	80 - 120	<0.30	mg/L	4.7	20		
B394104	Total Silicon (Si)	2024/06/07	110	80 - 120	112	80 - 120	<0.50	mg/L	5.6	20		
B394104	Total Sodium (Na)	2024/06/07	105	80 - 120	105	80 - 120	<0.50	mg/L	4.9	20		
B394104	Total Strontium (Sr)	2024/06/07	110	80 - 120	111	80 - 120	<0.020	mg/L	4.3	20		
B394104	Total Sulphur (S)	2024/06/07	111	80 - 120	112	80 - 120	<0.20	mg/L	6.5	20		
B394112	Total Aluminum (Al)	2024/06/07	120	80 - 120	119	80 - 120	<0.0030	mg/L	2.2	20		
B394112	Total Antimony (Sb)	2024/06/07	113	80 - 120	114	80 - 120	<0.00060	mg/L	7.3	20		
B394112	Total Arsenic (As)	2024/06/07	113	80 - 120	117	80 - 120	<0.00020	mg/L	3.7	20		
B394112	Total Beryllium (Be)	2024/06/07	108	80 - 120	108	80 - 120	<0.0010	mg/L	NC	20		
B394112	Total Cadmium (Cd)	2024/06/07	112	80 - 120	115	80 - 120	<0.000020	mg/L	15	20		
B394112	Total Chromium (Cr)	2024/06/07	111	80 - 120	114	80 - 120	<0.0010	mg/L	12	20		
B394112	Total Cobalt (Co)	2024/06/07	110	80 - 120	114	80 - 120	<0.00030	mg/L	2.9	20		
B394112	Total Copper (Cu)	2024/06/07	110	80 - 120	115	80 - 120	<0.0010	mg/L	14	20		
B394112	Total Lead (Pb)	2024/06/07	117	80 - 120	116	80 - 120	<0.00020	mg/L	20	20		

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Bureau Veritas Job #: C438812
Report Date: 2024/06/11

QUALITY ASSURANCE REPORT(CONT'D)

Arctic Canadian Diamond Company Ltd
Client Project #: 61980
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

			Matrix Spike		Spiked Blank		Method Blank		RPD		QC Standard	
QC Batch	Parameter	Date	% Recovery	QC Limits	% Recovery	QC Limits	Value	UNITS	Value (%)	QC Limits	% Recovery	QC Limits
B394112	Total Molybdenum (Mo)	2024/06/07	114	80 - 120	116	80 - 120	<0.00020	mg/L	0.20	20		
B394112	Total Nickel (Ni)	2024/06/07	109	80 - 120	113	80 - 120	<0.00050	mg/L	3.2	20		
B394112	Total Selenium (Se)	2024/06/07	111	80 - 120	115	80 - 120	<0.00020	mg/L	7.2	20		
B394112	Total Silver (Ag)	2024/06/07	112	80 - 120	114	80 - 120	<0.00010	mg/L	NC	20		
B394112	Total Thallium (Tl)	2024/06/07	116	80 - 120	114	80 - 120	<0.00020	mg/L	NC	20		
B394112	Total Tin (Sn)	2024/06/07	112	80 - 120	116	80 - 120	<0.0010	mg/L	NC	20		
B394112	Total Titanium (Ti)	2024/06/07	112	80 - 120	115	80 - 120	<0.0010	mg/L	1.4	20		
B394112	Total Uranium (U)	2024/06/07	115	80 - 120	114	80 - 120	<0.00010	mg/L	3.1	20		
B394112	Total Vanadium (V)	2024/06/07	115	80 - 120	114	80 - 120	<0.0010	mg/L	2.7	20		
B394112	Total Zinc (Zn)	2024/06/07	110	80 - 120	115	80 - 120	<0.0030	mg/L	42 (3)	20		

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.

Surrogate: A pure or isotopically labeled compound whose behavior mirrors the analytes of interest. Used to evaluate extraction efficiency.

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) Method blank exceeds acceptance limits, 2x RDL acceptable for low level analysis

(2) Method blank above criteria. Data inspected. All data < RDL or greater than 10x Method Blank.

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

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Bureau Veritas Job #: C438812
Report Date: 2024/06/11

Arctic Canadian Diamond Company Ltd
Client Project #: 61980
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

VALIDATION SIGNATURE PAGE

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

Gita Pokhrel, Laboratory Supervisor

Rahul Suryawanshi, Senior Analyst

Sandy Yuan, M.Sc., QP, Scientific Specialist

Bureau Veritas 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 Signatures page if included, otherwise available by request. For Department specific Analyst/Supervisor validation names, please refer to the Test Summary section if included, otherwise available by request. This report is authorized by Scott Cantwell, General Manager responsible for Alberta Environmental laboratory operations.

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BURGANDY

COR FCD-00265 / 5
Page 1 of 1

Chemistries

ADDITIONAL COOLER TEMPERATURE RECORD

CHAIN-OF-CUSTODY RECORD

CHAIN OF CUSTODY #	
Page ___ of ___	
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COOLER OBSERVATIONS:

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP	8.9	6.9	7.2
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP	2.9	2.0	2.6
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP	0.7	1.3	2.6
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP	2.0	2.1	2.1
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						

BV JOB#:

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						

RECEIVED BY (SIGN & PRINT)		DATE (YYYY/MM/DD)	TIME (HH:MM)
[signature]	JASON BIL	2024/05/30	1000

CHAIN OF CUSTODY FORM

COC# 101246

SO# 61980

BUREAU VERITAS

Burgundy Diamond Mines

900 - 606 4 Street SW, Calgary, Alberta, Canada T2P 1T1
Tel: 867-880-4400 ext 2157
Burgundy Contact: Richard Ehlert / Jonah Kelly

BURGUNDY DIAMOND MINES

ANALYSIS REQUESTED

Indicate Filtered (F), Preserved (P) or Filtered and Preserved (F/P) below

For Lab Use	SAMPLE INFORMATION						Dissolved Nutrients	Major Ions	SNP Total Nutrients	Standard Total Metals	TPH & BTEX													pH Field (pH)	Water Temp (°C)
	Sample Point	Station Type	Date	Time	Matrix	Type																			
	0008-Sa3	EKA 2002 0008	27-May-2024	10:50	Water	SNP	Y	Y	Y	Y	Y													7.10	1.9

FOR LAB USE ONLY

MCAL-2024-05-1968

Special Instructions (Billing details, QC reporting etc):
To monitor the quality of effluent leaving Two Rock Sedimentation Pond prior to Discharge entering the Receiving Environment.

Frequency: Up to 4 weeks prior to discharge
Parameters: TSS, major ions, physical parameters, total metals and nutrients, TPH and BTEX.

** Sample: 0008-Sa3, 0008-Sa9b with profile**

Relinquished by:	Date 28-May-2024 Time 06:30	Received by: JASON BIL	Date 2024 05 30 Time 1000
Relinquished by:	Date Time	Received by:	Date Time

FOR LAB USE ONLY

Cooler seal intact upon receipt? ☐ Yes ☐ No ☐ N/A

Sample temperature upon receipt: Frozen? ☐ Yes ☐ No

ACTR

Send Analytical Results to: compliance.team@burgundydiamonds.com

Your P.O. #: 6404002992
Your Project #: 61046
Site Location: MDMER/SNP/SEEPAGE
Your C.O.C. #: 101752

Attention: COMPLIANCE TEAM

Arctic Canadian Diamond Company Ltd
900, 606 4 Street SW
Calgary, AB
CANADA T2P 1T1

Report Date: 2024/07/31
Report #: R3535984
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C454226
Received: 2024/07/18, 10:30

Sample Matrix: Water
Samples Received: 7

Analyses	Quantity	Date Extracted	Date Analyzed	Laboratory Method	Analytical Method
Acidity pH 4.5 & pH 8.3 (as CaCO3)	7	N/A	2024/07/22	AB SOP-00005	SM 24 2310 B m
Alkalinity - Low Level	7	N/A	2024/07/26	AB SOP-00005	SM 24 2320 B m
Low level chloride/sulphate by AC	7	N/A	2024/07/22	AB SOP-00020	SM24-4500-Cl/SO4-E m
Conductance - Low Level	7	N/A	2024/07/26	AB SOP-00005	SM 24 2510 B m
Fluoride - Low Level	6	N/A	2024/07/26	AB SOP-00005	SM 24 4500-F C m
Fluoride - Low Level	1	N/A	2024/07/30	AB SOP-00005	SM 24 4500-F C m
Hardness Total (calculated as CaCO3) (1)	7	N/A	2024/07/29	BBY WI-00033	Auto Calc
Mercury (Total) by CV	7	2024/07/20	2024/07/24	AB SOP-00084	BCMOE BCLM Oct2013 m
Elements by ICP - Total	2	2024/07/26	2024/07/28	AB SOP-00014 / AB SOP-00042	EPA 6010d R5 m
Elements by ICP - Total	5	2024/07/28	2024/07/28	AB SOP-00014 / AB SOP-00042	EPA 6010d R5 m
Elements by ICPMS - Total	2	2024/07/26	2024/07/28	AB SOP-00014 / AB SOP-00043	EPA 6020b R2 m
Elements by ICPMS - Total	5	2024/07/28	2024/07/28	AB SOP-00014 / AB SOP-00043	EPA 6020b R2 m
Ammonia-N Low Level (Preserved)	7	N/A	2024/07/20	AB SOP-00007	SM 24 4500 NH3 A G m
Nitrate + Nitrite-N (calculated) Low Lev	5	N/A	2024/07/22		Auto Calc
Nitrate + Nitrite-N (calculated) Low Lev	2	N/A	2024/07/25		Auto Calc
Nitrogen (Nitrite - Nitrate) Low Level	5	N/A	2024/07/19	AB SOP-00023	SM 24 4110 B m
Nitrogen (Nitrite - Nitrate) Low Level	2	N/A	2024/07/30	AB SOP-00023	SM 24 4110 B m
pH @25°C (2)	7	N/A	2024/07/26	AB SOP-00005	SM 24 4500-H+B m
pH (Field)	5	N/A	2024/07/18	Field Test	Field Test
Orthophosphate LL by Automated Analyzer (3)	6	N/A	2024/07/19	AB SOP-00025	SM 24 4500-P A, F m
Orthophosphate LL by Automated Analyzer (3)	1	N/A	2024/07/20	AB SOP-00025	SM 24 4500-P A, F m
Silica (Reactive)	7	N/A	2024/07/25	AB SOP-00011	EPA 370.1 R1978 m
Sulphate (SO4) by IC	5	N/A	2024/07/22	AB SOP-00026	SM 24 4110 B m
Sulphate (SO4) by IC	2	N/A	2024/07/30	AB SOP-00026	SM 24 4110 B m
Carbon (total) (Calc. - Org. + Inorg.)	6	N/A	2024/07/23		Auto Calc
Carbon (total) (Calc. - Org. + Inorg.)	1	N/A	2024/07/30		Auto Calc
Temperature (Field)	5	N/A	2024/07/18	Field Test	Field Test
Carbon (Inorganic)	4	N/A	2024/07/23	CAL SOP-00076	Modified AE 2411

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Your P.O. #: 6404002992
Your Project #: 61046
Site Location: MDMER/SNP/SEEPAGE
Your C.O.C. #: 101752

Attention: COMPLIANCE TEAM

Arctic Canadian Diamond Company Ltd
900, 606 4 Street SW
Calgary, AB
CANADA T2P 1T1

Report Date: 2024/07/31
Report #: R3535984
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C454226
Received: 2024/07/18, 10:30

Sample Matrix: Water
Samples Received: 7

Analyses	Quantity	Date Extracted	Date Analyzed	Laboratory Method	Analytical Method
Carbon (Inorganic)	3	N/A	2024/07/31	CAL SOP-00076	Modified AE 2411
Total Kjeldahl Nitrogen (Total)	7	N/A	2024/07/25	BBY WI-00033	Auto Calc
Nitrogen (Total)	7	2024/07/25	2024/07/25	AB SOP-00093	SM 24 4500-N C m
Carbon (Total Organic) (4)	6	N/A	2024/07/23	AB SOP-00087	MMCW 119 1996 m
Carbon (Total Organic) (4)	1	N/A	2024/07/30	AB SOP-00087	MMCW 119 1996 m
Total Phosphorus Low Level Dissolved (5)	7	2024/07/24	2024/07/24	AB SOP-00024	SM 24 4500-P A,B,F m
Total Phosphorus Low Level Total	6	2024/07/25	2024/07/26	AB SOP-00024	SM 24 4500-P A,B,F m
Total Phosphorus Low Level Total	1	2024/07/30	2024/07/30	AB SOP-00024	SM 24 4500-P A,B,F m
Total Suspended Solids (NFR)	6	2024/07/20	2024/07/22	AB SOP-00061	SM 24 2540 D m
Total Suspended Solids (NFR)	1	2024/07/21	2024/07/21	AB SOP-00061	SM 24 2540 D m
Turbidity	7	N/A	2024/07/18	CAL SOP-00081	SM 24 2130 B m
Ion Balance (6)	7	N/A	2024/07/29		
Total Dissolved Solids (Calculated) (6)	5	N/A	2024/07/29		
Total Dissolved Solids (Calculated) (6)	2	N/A	2024/07/31		

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, EPA, APHA or the Quebec Ministry of Environment.

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.

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Your P.O. #: 6404002992
Your Project #: 61046
Site Location: MDMER/SNP/SEEPAGE
Your C.O.C. #: 101752

Attention: COMPLIANCE TEAM

Arctic Canadian Diamond Company Ltd
900, 606 4 Street SW
Calgary, AB
CANADA T2P 1T1

Report Date: 2024/07/31
Report #: R3535984
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C454226
Received: 2024/07/18, 10:30

This Certificate shall not be reproduced except in full, without the written approval of the laboratory.

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) "Total Hardness" was calculated from Total Ca and Mg concentrations and may be biased high (Hardness, or Dissolved Hardness, calculated from Dissolved Ca and Mg, should be used for compliance if available).
(2) The CCME method requires pH to be analysed within 15 minutes of sampling and therefore field analysis is required for compliance. All Laboratory pH analyses in this report are reported past the CCME holding time. Bureau Veritas endeavours to analyze samples as soon as possible after receipt.
(3) Orthophosphate > Total Phosphorus Imbalance: When applicable, Orthophosphate, Total Phosphorus and dissolved Phosphorus results were reviewed and data quality meets acceptable levels unless otherwise noted.
(4) TOC present in the sample should be considered as non-purgeable TOC.
(5) Dissolved Phosphorus > Total Phosphorus Imbalance: When applicable, Dissolved Phosphorus and Total Phosphorus results were reviewed and data quality meets acceptable levels unless otherwise noted.
(6) Calculation was conducted as per client request using CAL PDF-00333.

Encryption Key

Please direct all questions regarding this Certificate of Analysis to:
Geraldlyn Gouthro, Key Account Specialist
Email: geraldlyn.gouthro@bureauveritas.com
Phone# (403) 291-3077

==========

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Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Bureau Veritas Job #: C454226
Report Date: 2024/07/31

Arctic Canadian Diamond Company Ltd
Client Project #: 61046
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

RESULTS OF CHEMICAL ANALYSES OF WATER

Bureau Veritas ID		CRM404		CRM405			CRM406		
Sampling Date		2024/07/15 12:35		2024/07/15 11:15			2024/07/15 12:35		
COC Number		101752		101752			101752		
	UNITS	**0008-121**	**QC Batch**	**0008-494**	**RDL**	**QC Batch**	**0008-SA103**	**RDL**	**QC Batch**
Calculated Parameters									
Total Hardness (CaCO3)	mg/L	<0.50	B443298	<0.50	0.50	B443298	154	0.50	B443298
Calculated Ion Balance (% Difference)	%	NC	B443710	NC		B443710	1.2		B443710
Nitrate plus Nitrite (N)	mg/L	<0.0022	B443706	<0.0022	0.0022	B443706	18	0.010	B443706
Calculated Total Dissolved Solids	mg/L	<0.95	B443712	<0.95	0.95	B443712	290	1.8	B443712
Total Total Kjeldahl Nitrogen (Calc)	mg/L	<0.020	B443563	<0.020	0.020	B443563	<0.20	0.20	B443563
Field Parameters									
Field pH	pH						7.23	N/A	ONSITE
Field Temperature (Fd)	deg. C						18.2	N/A	ONSITE
Misc. Inorganics									
Fluoride (F)	mg/L	<0.010	B455725	<0.010	0.010	B459531	0.168	0.010	B455725
pH	pH	5.79	B455722	5.67	N/A	B455722	6.92	N/A	B455722
Reactive Silica	mg/L	<0.050	B452676	<0.050	0.050	B452676	0.083	0.050	B452681
Acidity (pH 4.5)	mg/L	<1.0	B447454	<1.0	1.0	B447454	<1.0	1.0	B447454
Alkalinity (Total as CaCO3)	mg/L	<0.50	B455720	<0.50	0.50	B455720	21.3	0.50	B455720
Total Organic Carbon (C)	mg/L	<0.20	B448915	<0.20	0.20	B448915	2.0	0.20	B448915
Acidity (pH 8.3)	mg/L	<1.0	B447454	<1.0	1.0	B447454	1.4	1.0	B447454
Alkalinity (PP as CaCO3)	mg/L	<0.50	B455720	<0.50	0.50	B455720	<0.50	0.50	B455720
Bicarbonate (HCO3)	mg/L	<0.50	B455720	<0.50	0.50	B455720	26.0	0.50	B455720
Carbonate (CO3)	mg/L	<0.50	B455720	<0.50	0.50	B455720	<0.50	0.50	B455720
Hydroxide (OH)	mg/L	<0.50	B455720	<0.50	0.50	B455720	<0.50	0.50	B455720
Total Suspended Solids	mg/L	<1.0	B446292	<1.0	1.0	B446292	1.3	1.0	B446292
Anions									
Orthophosphate (P)	mg/L	<0.0010	B445982	<0.0010	0.0010	B445982	<0.0010	0.0010	B445982
Chloride (Cl)	mg/L	<0.50	B447887	<0.50	0.50	B447887	9.3	0.50	B447887
Dissolved-Low Level Sulphate (SO4)	mg/L	0.35	B447640	<0.30	0.30	B447649	110	1.5	B447649
Nutrients									
Total Carbon (C)	mg/L	<0.50	B443709	<0.50	0.50	B443709	6.4	0.50	B443709
Total Inorganic Carbon (C)	mg/L	<1.0	B449230	<1.0	1.0	B449230	4.4	1.0	B459784
Dissolved Phosphorus (P)	mg/L	<0.0020	B451408	<0.0020	0.0020	B451408	<0.0020	0.0020	B451408
Total Phosphorus (P)	mg/L	<0.0020	B452475	<0.0020	0.0020	B459471	0.0038	0.0020	B452475
Total Ammonia (N)	mg/L	<0.0050	B445251	<0.0050	0.0050	B445251	0.010	0.0050	B445251

RDL = Reportable Detection Limit
N/A = Not Applicable

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Bureau Veritas Job #: C454226
Report Date: 2024/07/31

Arctic Canadian Diamond Company Ltd
Client Project #: 61046
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

RESULTS OF CHEMICAL ANALYSES OF WATER

Bureau Veritas ID		CRM404		CRM405			CRM406		
Sampling Date		2024/07/15 12:35		2024/07/15 11:15			2024/07/15 12:35		
COC Number		101752		101752			101752		
	UNITS	**0008-121**	**QC Batch**	**0008-494**	**RDL**	**QC Batch**	**0008-SA103**	**RDL**	**QC Batch**
Nitrite (N)	mg/L	<0.0010	B455482	<0.0010	0.0010	B455482	0.055	0.0010	B446154
Nitrate (N)	mg/L	<0.0020	B455482	<0.0020	0.0020	B455482	18	0.010	B446154
Total Nitrogen (N)	mg/L	<0.020 (1)	B452658	<0.020 (1)	0.020	B452658	16 (1)	0.20	B452658
Physical Properties									
Conductivity	uS/cm	<1.0	B455723	<1.0	1.0	B455723	444	1.0	B455723
Physical Properties									
Turbidity - NTU	NTU	<0.10	B444493	<0.10	0.10	B444493	1.4	0.10	B444493

RDL = Reportable Detection Limit
(1) Nitrogen < Nitrate: Both values fall within the method uncertainty for duplicates and are likely equivalent.

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Bureau Veritas Job #: C454226
Report Date: 2024/07/31

Arctic Canadian Diamond Company Ltd
Client Project #: 61046
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

RESULTS OF CHEMICAL ANALYSES OF WATER

Bureau Veritas ID		CRM407			CRM408		CRM409		
Sampling Date		2024/07/15 12:30			2024/07/15 12:10		2024/07/15 11:20		
COC Number		101752			101752		101752		
	UNITS	**0008-SA10**	**RDL**	**QC Batch**	**0008-SA32**	**QC Batch**	**0008-SA3**	**RDL**	**QC Batch**
Calculated Parameters									
Total Hardness (CaCO3)	mg/L	145	0.50	B443769	62.4	B443769	67.8	0.50	B443769
Calculated Ion Balance (% Difference)	%	2.9		B443710	1.6	B443710	0.99		B443710
Nitrate plus Nitrite (N)	mg/L	17	0.010	B443706	0.76	B443706	0.78	0.0022	B443706
Calculated Total Dissolved Solids	mg/L	280	1.8	B443712	99	B443712	100	0.95	B443712
Total Total Kjeldahl Nitrogen (Calc)	mg/L	<0.20	0.20	B443563	0.349	B443563	0.346	0.020	B443563
Field Parameters									
Field pH	pH	7.23	N/A	ONSITE	6.97	ONSITE	6.97	N/A	ONSITE
Field Temperature (Fd)	deg. C	18.2	N/A	ONSITE	16.6	ONSITE	16.6	N/A	ONSITE
Misc. Inorganics									
Fluoride (F)	mg/L	0.165	0.010	B455725	0.192	B455725	0.185	0.010	B455725
pH	pH	6.88	N/A	B455722	7.29	B455722	7.20	N/A	B455722
Reactive Silica	mg/L	0.098	0.050	B452681	0.14	B452681	0.14	0.050	B452676
Acidity (pH 4.5)	mg/L	<1.0	1.0	B447454	<1.0	B447454	<1.0	1.0	B447454
Alkalinity (Total as CaCO3)	mg/L	17.9	0.50	B455720	37.6	B455720	39.1	0.50	B455720
Total Organic Carbon (C)	mg/L	1.9	0.20	B448915	2.8	B448915	3.0	0.20	B448915
Acidity (pH 8.3)	mg/L	1.5	1.0	B447454	1.2	B447454	1.4	1.0	B447454
Alkalinity (PP as CaCO3)	mg/L	<0.50	0.50	B455720	<0.50	B455720	<0.50	0.50	B455720
Bicarbonate (HCO3)	mg/L	21.8	0.50	B455720	45.8	B455720	47.7	0.50	B455720
Carbonate (CO3)	mg/L	<0.50	0.50	B455720	<0.50	B455720	<0.50	0.50	B455720
Hydroxide (OH)	mg/L	<0.50	0.50	B455720	<0.50	B455720	<0.50	0.50	B455720
Total Suspended Solids	mg/L	<1.0	1.0	B446292	1.5	B446292	12	1.0	B446292
Anions									
Orthophosphate (P)	mg/L	0.0020	0.0010	B446735	0.0014	B445982	0.0012	0.0010	B445982
Chloride (Cl)	mg/L	9.7	0.50	B447887	3.6	B447887	4.2	0.50	B447887
Dissolved-Low Level Sulphate (SO4)	mg/L	110	1.5	B447649	38	B447649	38	0.30	B447640
Nutrients									
Total Carbon (C)	mg/L	6.5	0.50	B443709	11	B443709	11	0.50	B443709
Total Inorganic Carbon (C)	mg/L	4.6	1.0	B449230	8.5	B459784	8.1	1.0	B459784
Dissolved Phosphorus (P)	mg/L	<0.0020 (1)	0.0020	B451408	<0.0020 (1)	B451408	0.0022	0.0020	B451408

RDL = Reportable Detection Limit
N/A = Not Applicable
(1) Phosphorus < Orthophosphate: Both values fall within the method uncertainty for duplicates and are likely equivalent.

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Bureau Veritas Job #: C454226
Report Date: 2024/07/31

Arctic Canadian Diamond Company Ltd
Client Project #: 61046
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

RESULTS OF CHEMICAL ANALYSES OF WATER

Bureau Veritas ID		CRM407			CRM408		CRM409		
Sampling Date		2024/07/15 12:30			2024/07/15 12:10		2024/07/15 11:20		
COC Number		101752			101752		101752		
	UNITS	**0008-SA10**	**RDL**	**QC Batch**	**0008-SA32**	**QC Batch**	**0008-SA3**	**RDL**	**QC Batch**
Total Phosphorus (P)	mg/L	0.0053	0.0020	B452437	0.0054	B452475	0.0082	0.0020	B452475
Total Ammonia (N)	mg/L	0.012	0.0050	B445251	0.017	B445251	0.015	0.0050	B445216
Nitrite (N)	mg/L	0.057	0.0010	B446154	0.0063	B446154	0.0064	0.0010	B446154
Nitrate (N)	mg/L	17	0.010	B446154	0.75	B446154	0.77	0.0020	B446154
Total Nitrogen (N)	mg/L	17 (1)	0.20	B452668	1.1	B452658	1.1	0.020	B452658
Physical Properties									
Conductivity	uS/cm	444	1.0	B455723	167	B455723	167	1.0	B455723
Physical Properties									
Turbidity - NTU	NTU	<0.10	0.10	B444493	0.13	B444493	3.1	0.10	B444493

RDL = Reportable Detection Limit
(1) Due to the sample matrix, sample required dilution. Detection limit was adjusted accordingly. Nitrogen < Nitrate: Both values fall within the method uncertainty for duplicates and are likely equivalent.

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Bureau Veritas Job #: C454226
Report Date: 2024/07/31

Arctic Canadian Diamond Company Ltd
Client Project #: 61046
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

RESULTS OF CHEMICAL ANALYSES OF WATER

Bureau Veritas ID		CRM410		
Sampling Date		2024/07/15 11:10		
COC Number		101752		
	UNITS	**0008-SA9B**	**RDL**	**QC Batch**
Calculated Parameters				
Total Hardness (CaCO3)	mg/L	9.82	0.50	B443769
Calculated Ion Balance (% Difference)	%	5.6		B443710
Nitrate plus Nitrite (N)	mg/L	0.0043	0.0022	B443706
Calculated Total Dissolved Solids	mg/L	15	0.95	B443712
Total Total Kjeldahl Nitrogen (Calc)	mg/L	0.332	0.020	B443563
Field Parameters				
Field pH	pH	6.81	N/A	ONSITE
Field Temperature (Fd)	deg. C	16.8	N/A	ONSITE
Misc. Inorganics				
Fluoride (F)	mg/L	0.034	0.010	B455725
pH	pH	6.65	N/A	B455722
Reactive Silica	mg/L	0.19	0.050	B452681
Acidity (pH 4.5)	mg/L	<1.0	1.0	B447454
Alkalinity (Total as CaCO3)	mg/L	7.69	0.50	B455720
Total Organic Carbon (C)	mg/L	4.2	0.20	B459026
Acidity (pH 8.3)	mg/L	1.1	1.0	B447454
Alkalinity (PP as CaCO3)	mg/L	<0.50	0.50	B455720
Bicarbonate (HCO3)	mg/L	9.39	0.50	B455720
Carbonate (CO3)	mg/L	<0.50	0.50	B455720
Hydroxide (OH)	mg/L	<0.50	0.50	B455720
Total Suspended Solids	mg/L	1.3	1.0	B446812
Anions				
Orthophosphate (P)	mg/L	<0.0010	0.0010	B445982
Chloride (Cl)	mg/L	0.84	0.50	B447887
Dissolved-Low Level Sulphate (SO4)	mg/L	3.6	0.30	B447640
Nutrients				
Total Carbon (C)	mg/L	6.2	0.50	B443709
Total Inorganic Carbon (C)	mg/L	2.0	1.0	B449230
Dissolved Phosphorus (P)	mg/L	<0.0020	0.0020	B451408
Total Phosphorus (P)	mg/L	0.0051	0.0020	B452475
Total Ammonia (N)	mg/L	0.011	0.0050	B445216

RDL = Reportable Detection Limit
N/A = Not Applicable

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Bureau Veritas Job #: C454226
Report Date: 2024/07/31

Arctic Canadian Diamond Company Ltd
Client Project #: 61046
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

RESULTS OF CHEMICAL ANALYSES OF WATER

Bureau Veritas ID		CRM410		
Sampling Date		2024/07/15 11:10		
COC Number		101752		
	UNITS	**0008-SA9B**	**RDL**	**QC Batch**
Nitrite (N)	mg/L	<0.0010	0.0010	B446154
Nitrate (N)	mg/L	0.0043	0.0020	B446154
Total Nitrogen (N)	mg/L	0.34	0.020	B452658
Physical Properties				
Conductivity	uS/cm	28.9	1.0	B455723
Physical Properties				
Turbidity - NTU	NTU	1.1	0.10	B444493
RDL = Reportable Detection Limit				

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Bureau Veritas Job #: C454226
Report Date: 2024/07/31

Arctic Canadian Diamond Company Ltd
Client Project #: 61046
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

MERCURY BY COLD VAPOR (WATER)

Bureau Veritas ID		CRM404	CRM405	CRM406	CRM407	CRM408		
Sampling Date		2024/07/15 12:35	2024/07/15 11:15	2024/07/15 12:35	2024/07/15 12:30	2024/07/15 12:10		
COC Number		101752	101752	101752	101752	101752		
	UNITS	**0008-121**	**0008-494**	**0008-SA103**	**0008-SA10**	**0008-SA32**	**RDL**	**QC Batch**
Elements								
Total Mercury (Hg)	mg/L	<0.0000019	<0.0000019	<0.0000019	<0.0000019	<0.0000019	0.0000019	B446484
RDL = Reportable Detection Limit								

Bureau Veritas ID		CRM409	CRM410		
Sampling Date		2024/07/15 11:20	2024/07/15 11:10		
COC Number		101752	101752		
	UNITS	**0008-SA3**	**0008-SA9B**	**RDL**	**QC Batch**
Elements					
Total Mercury (Hg)	mg/L	<0.0000019	<0.0000019	0.0000019	B446484
RDL = Reportable Detection Limit					

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Bureau Veritas Job #: C454226
Report Date: 2024/07/31

Arctic Canadian Diamond Company Ltd
Client Project #: 61046
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

ELEMENTS BY ATOMIC SPECTROSCOPY (WATER)

Bureau Veritas ID		CRM404	CRM405	CRM406	CRM407		
Sampling Date		2024/07/15 12:35	2024/07/15 11:15	2024/07/15 12:35	2024/07/15 12:30		
COC Number		101752	101752	101752	101752		
	UNITS	**0008-121**	**0008-494**	**0008-SA103**	**0008-SA10**	**RDL**	**QC Batch**
Elements							
Total Aluminum (Al)	mg/L	<0.0030	<0.0030	0.036	0.041	0.0030	B456772
Total Antimony (Sb)	mg/L	<0.00060	<0.00060	<0.00060	<0.00060	0.00060	B456772
Total Arsenic (As)	mg/L	<0.00020	<0.00020	0.00031	0.00041	0.00020	B456772
Total Barium (Ba)	mg/L	<0.010	<0.010	0.084	0.079	0.010	B456768
Total Beryllium (Be)	mg/L	<0.0010	<0.0010	<0.0010	<0.0010	0.0010	B456772
Total Boron (B)	mg/L	<0.020	<0.020	<0.020	<0.020	0.020	B456768
Total Cadmium (Cd)	mg/L	<0.000020	<0.000020	0.000022	0.000032	0.000020	B456772
Total Calcium (Ca)	mg/L	<0.30	<0.30	24	23	0.30	B456768
Total Chromium (Cr)	mg/L	<0.0010	<0.0010	<0.0010	<0.0010	0.0010	B456772
Total Cobalt (Co)	mg/L	<0.00030	<0.00030	<0.00030	<0.00030	0.00030	B456772
Total Copper (Cu)	mg/L	<0.0010	<0.0010	<0.0010	<0.0010	0.0010	B456772
Total Iron (Fe)	mg/L	<0.070	<0.070	<0.070	<0.070	0.070	B456768
Total Lead (Pb)	mg/L	<0.00020	<0.00020	<0.00020	<0.00020	0.00020	B456772
Total Lithium (Li)	mg/L	<0.020	<0.020	<0.020	<0.020	0.020	B456768
Total Magnesium (Mg)	mg/L	<0.20	<0.20	23	21	0.20	B456768
Total Manganese (Mn)	mg/L	<0.0040	<0.0040	0.011	0.0094	0.0040	B456768
Total Molybdenum (Mo)	mg/L	<0.00020	<0.00020	0.036	0.049	0.00020	B456772
Total Nickel (Ni)	mg/L	<0.00050	<0.00050	0.026	0.033	0.00050	B456772
Total Potassium (K)	mg/L	<0.30	<0.30	19	18	0.30	B456768
Total Selenium (Se)	mg/L	<0.00020	<0.00020	0.00032	0.00038	0.00020	B456772
Total Silicon (Si)	mg/L	<0.50	<0.50	<0.50	<0.50	0.50	B456768
Total Silver (Ag)	mg/L	<0.00010	<0.00010	<0.00010	<0.00010	0.00010	B456772
Total Sodium (Na)	mg/L	<0.50	<0.50	15	14	0.50	B456768
Total Strontium (Sr)	mg/L	<0.020	<0.020	0.28	0.26	0.020	B456768
Total Sulphur (S)	mg/L	<0.20	<0.20	36	34	0.20	B456768
Total Thallium (Tl)	mg/L	<0.00020	<0.00020	<0.00020	<0.00020	0.00020	B456772
Total Tin (Sn)	mg/L	<0.0010	<0.0010	<0.0010	<0.0010	0.0010	B456772
Total Titanium (Ti)	mg/L	<0.0010	<0.0010	<0.0010	<0.0010	0.0010	B456772
Total Uranium (U)	mg/L	<0.00010	<0.00010	0.0029	0.0039	0.00010	B456772
Total Vanadium (V)	mg/L	<0.0010	<0.0010	<0.0010	<0.0010	0.0010	B456772
Total Zinc (Zn)	mg/L	<0.0030	<0.0030	0.0054	<0.0030	0.0030	B456772
RDL = Reportable Detection Limit							

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Bureau Veritas Job #: C454226
Report Date: 2024/07/31

Arctic Canadian Diamond Company Ltd
Client Project #: 61046
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

ELEMENTS BY ATOMIC SPECTROSCOPY (WATER)

Bureau Veritas ID		CRM408	CRM409			CRM410		
Sampling Date		2024/07/15 12:10	2024/07/15 11:20			2024/07/15 11:10		
COC Number		101752	101752			101752		
	UNITS	**0008-SA32**	**0008-SA3**	**RDL**	**QC Batch**	**0008-SA9B**	**RDL**	**QC Batch**
Elements								
Total Aluminum (Al)	mg/L	0.017	0.20	0.0030	B454423	0.013	0.0030	B456772
Total Antimony (Sb)	mg/L	<0.00060	<0.00060	0.00060	B454423	<0.00060	0.00060	B456772
Total Arsenic (As)	mg/L	0.00046	0.00049	0.00020	B454423	0.00051	0.00020	B456772
Total Barium (Ba)	mg/L	0.018	0.024	0.010	B454426	<0.010	0.010	B456768
Total Beryllium (Be)	mg/L	<0.0010	<0.0010	0.0010	B454423	<0.0010	0.0010	B456772
Total Boron (B)	mg/L	<0.020	<0.020	0.020	B454426	<0.020	0.020	B456768
Total Cadmium (Cd)	mg/L	<0.000020	<0.000020	0.000020	B454423	<0.000020	0.000020	B456772
Total Calcium (Ca)	mg/L	11	11	0.30	B454426	1.6	0.30	B456768
Total Chromium (Cr)	mg/L	<0.0010	<0.0010	0.0010	B454423	<0.0010	0.0010	B456772
Total Cobalt (Co)	mg/L	<0.00030	0.00040	0.00030	B454423	<0.00030	0.00030	B456772
Total Copper (Cu)	mg/L	<0.0010	<0.0010	0.0010	B454423	<0.0010	0.0010	B456772
Total Iron (Fe)	mg/L	0.11	0.34	0.064	B454426	0.13	0.070	B456768
Total Lead (Pb)	mg/L	<0.00020	<0.00020	0.00020	B454423	<0.00020	0.00020	B456772
Total Lithium (Li)	mg/L	<0.020	<0.020	0.020	B454426	<0.020	0.020	B456768
Total Magnesium (Mg)	mg/L	8.8	9.7	0.20	B454426	1.4	0.20	B456768
Total Manganese (Mn)	mg/L	0.010	0.016	0.0040	B454426	0.013	0.0040	B456768
Total Molybdenum (Mo)	mg/L	0.0020	0.0026	0.00020	B454423	<0.00020	0.00020	B456772
Total Nickel (Ni)	mg/L	0.0028	0.0069	0.00050	B454423	0.0010	0.00050	B456772
Total Potassium (K)	mg/L	5.8	6.1	0.30	B454426	0.94	0.30	B456768
Total Selenium (Se)	mg/L	<0.00020	<0.00020	0.00020	B454423	<0.00020	0.00020	B456772
Total Silicon (Si)	mg/L	<0.50	0.67	0.50	B454426	<0.50	0.50	B456768
Total Silver (Ag)	mg/L	<0.00010	<0.00010	0.00010	B454423	<0.00010	0.00010	B456772
Total Sodium (Na)	mg/L	5.8	6.1	0.50	B454426	1.4	0.50	B456768
Total Strontium (Sr)	mg/L	0.079	0.084	0.020	B454426	<0.020	0.020	B456768
Total Sulphur (S)	mg/L	11	12	0.20	B454426	1.0	0.20	B456768
Total Thallium (Tl)	mg/L	<0.00020	<0.00020	0.00020	B454423	<0.00020	0.00020	B456772
Total Tin (Sn)	mg/L	<0.0010	<0.0010	0.0010	B454423	<0.0010	0.0010	B456772
Total Titanium (Ti)	mg/L	<0.0010	0.016	0.0010	B454423	<0.0010	0.0010	B456772
Total Uranium (U)	mg/L	0.0024	0.0029	0.00010	B454423	0.00016	0.00010	B456772
Total Vanadium (V)	mg/L	<0.0010	<0.0010	0.0010	B454423	<0.0010	0.0010	B456772
Total Zinc (Zn)	mg/L	<0.0030	<0.0030	0.0030	B454423	<0.0030	0.0030	B456772
RDL = Reportable Detection Limit								

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GENERAL COMMENTS

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

Package 1	9.5°C
Package 2	8.9°C
Package 3	10.0°C
Package 4	6.3°C
Package 5	8.0°C
Package 6	6.6°C
Package 7	7.8°C
Package 8	7.9°C
Package 9	7.3°C
Package 10	8.6°C
Package 11	7.3°C
Package 12	8.3°C
Package 13	2.9°C
Package 14	6.7°C
Package 15	8.6°C
Package 16	7.9°C
Package 17	8.8°C
Package 18	8.7°C
Package 19	8.2°C
Package 20	5.0°C
Package 21	9.5°C
Package 22	6.4°C
Package 23	4.9°C
Package 24	7.8°C
Package 25	8.0°C
Package 26	7.7°C
Package 27	6.8°C
Package 28	6.3°C
Package 29	8.4°C
Package 30	4.5°C
Package 31	6.2°C

Sample CRM404 [0008-121] : Nitrogen (Nitrite - Nitrate) Low Level completed within five days of sampling. Data is satisfactory for compliance purposes. Sample was analyzed past method specified hold time for Nitrogen (Nitrite - Nitrate) Low Level. Exceedance of hold time increases the uncertainty of test results but does not necessarily imply that results are compromised.

Sample CRM405 [0008-494] : Nitrogen (Nitrite - Nitrate) Low Level completed within five days of sampling. Data is satisfactory for compliance purposes. Sample was analyzed past method specified hold time for Nitrogen (Nitrite - Nitrate) Low Level. Exceedance of hold time increases the uncertainty of test results but does not necessarily imply that results are compromised.

Sample CRM406 [0008-SA103] : Nitrogen (Nitrite - Nitrate) Low Level completed within five days of sampling. Data is satisfactory for compliance purposes. Sample was analyzed past method specified hold time for Carbon (Inorganic). Exceedance of hold time increases the uncertainty of test results but does not necessarily imply that results are compromised.

Sample CRM407 [0008-SA10] : Nitrogen (Nitrite - Nitrate) Low Level completed within five days of sampling. Data is satisfactory for compliance purposes.

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Sample CRM408 [0008-SA32] : Nitrogen (Nitrite - Nitrate) Low Level completed within five days of sampling. Data is satisfactory for compliance purposes. Sample was analyzed past method specified hold time for Carbon (Inorganic). Exceedance of hold time increases the uncertainty of test results but does not necessarily imply that results are compromised.

Sample CRM409 [0008-SA3] : Nitrogen (Nitrite - Nitrate) Low Level completed within five days of sampling. Data is satisfactory for compliance purposes. Sample was analyzed past method specified hold time for Carbon (Inorganic). Exceedance of hold time increases the uncertainty of test results but does not necessarily imply that results are compromised.

Sample CRM410 [0008-SA9B] : Nitrogen (Nitrite - Nitrate) Low Level completed within five days of sampling. Data is satisfactory for compliance purposes.

Results relate only to the items tested.

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Bureau Veritas Job #: C454226
Report Date: 2024/07/31

QUALITY ASSURANCE REPORT

Arctic Canadian Diamond Company Ltd
Client Project #: 61046
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

			Matrix Spike		Spiked Blank		Method Blank		RPD		QC Standard	
QC Batch	Parameter	Date	% Recovery	QC Limits	% Recovery	QC Limits	Value	UNITS	Value (%)	QC Limits	% Recovery	QC Limits
B444493	Turbidity - NTU	2024/07/18			100	80 - 120	<0.10	NTU	NC	20		
B445216	Total Ammonia (N)	2024/07/20	NC	80 - 120	102	80 - 120	<0.0050	mg/L	3.1	20		
B445251	Total Ammonia (N)	2024/07/20	103	80 - 120	101	80 - 120	<0.0050	mg/L	NC	20		
B445982	Orthophosphate (P)	2024/07/19	90	80 - 120	100	80 - 120	<0.0010	mg/L				
B446154	Nitrate (N)	2024/07/19	106	80 - 120	103	80 - 120	<0.0020	mg/L	NC	20		
B446154	Nitrite (N)	2024/07/19	103	80 - 120	101	80 - 120	<0.0010	mg/L	NC	20		
B446292	Total Suspended Solids	2024/07/22	100	80 - 120	100	80 - 120	<0.99	mg/L	6.5	20		
B446484	Total Mercury (Hg)	2024/07/24	100	80 - 120	102	80 - 120	<0.0000019	mg/L	NC	20		
B446735	Orthophosphate (P)	2024/07/20	120	80 - 120	98	80 - 120	<0.0010	mg/L	7.7	20		
B446812	Total Suspended Solids	2024/07/21	88	80 - 120	91	80 - 120	<1.0	mg/L	0.58	20		
B447454	Acidity (pH 4.5)	2024/07/22					<1.0	mg/L	NC	20		
B447454	Acidity (pH 8.3)	2024/07/22			98	80 - 120	<1.0	mg/L	NC	20		
B447640	Dissolved-Low Level Sulphate (SO4)	2024/07/22	NC	80 - 120	106	80 - 120	<0.050	mg/L	0.47	20		
B447649	Dissolved-Low Level Sulphate (SO4)	2024/07/22	113	80 - 120	112	80 - 120	<0.050	mg/L	NC	20		
B447887	Chloride (Cl)	2024/07/22	104	80 - 120	102	80 - 120	<0.50	mg/L	NC	20		
B448915	Total Organic Carbon (C)	2024/07/23	106	80 - 120	100	80 - 120	<0.20	mg/L	4.4	20		
B449230	Total Inorganic Carbon (C)	2024/07/23	102	80 - 120	104	80 - 120	<1.0	mg/L	9.4	20		
B451408	Dissolved Phosphorus (P)	2024/07/24	100	80 - 120	99	80 - 120	0.0011, RDL=0.0010 (1)	mg/L			91	80 - 120
B452437	Total Phosphorus (P)	2024/07/26	102	80 - 120	96	80 - 120	<0.0010	mg/L	NC	20	89	80 - 120
B452475	Total Phosphorus (P)	2024/07/26	112	80 - 120	101	80 - 120	<0.0010	mg/L	7.8	20	91	80 - 120
B452658	Total Nitrogen (N)	2024/07/25	109	80 - 120	104	80 - 120	<0.020	mg/L	4.3	20	105	80 - 120
B452668	Total Nitrogen (N)	2024/07/25	NC	80 - 120	106	80 - 120	<0.020	mg/L	0.34	20	104	80 - 120
B452676	Reactive Silica	2024/07/25	NC	80 - 120	103	80 - 120	<0.050	mg/L	2.0	20		
B452681	Reactive Silica	2024/07/25	NC	80 - 120	104	80 - 120	<0.050	mg/L	0.99	20		
B454423	Total Aluminum (Al)	2024/07/28	97	80 - 120	92	80 - 120	<0.0030	mg/L	NC	20		
B454423	Total Antimony (Sb)	2024/07/28	102	80 - 120	102	80 - 120	<0.00060	mg/L	NC	20		
B454423	Total Arsenic (As)	2024/07/28	102	80 - 120	98	80 - 120	<0.00020	mg/L	10	20		
B454423	Total Beryllium (Be)	2024/07/28	99	80 - 120	85	80 - 120	<0.0010	mg/L	NC	20		
B454423	Total Cadmium (Cd)	2024/07/28	98	80 - 120	102	80 - 120	<0.000020	mg/L				
B454423	Total Chromium (Cr)	2024/07/28	100	80 - 120	95	80 - 120	<0.0010	mg/L	4.5	20		

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Bureau Veritas Job #: C454226
Report Date: 2024/07/31

QUALITY ASSURANCE REPORT(CONT'D)

Arctic Canadian Diamond Company Ltd
Client Project #: 61046
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

			Matrix Spike		Spiked Blank		Method Blank		RPD		QC Standard	
QC Batch	Parameter	Date	% Recovery	QC Limits	% Recovery	QC Limits	Value	UNITS	Value (%)	QC Limits	% Recovery	QC Limits
B454423	Total Cobalt (Co)	2024/07/28	99	80 - 120	96	80 - 120	<0.00030	mg/L	NC	20		
B454423	Total Copper (Cu)	2024/07/28	99	80 - 120	95	80 - 120	<0.0010	mg/L	NC	20		
B454423	Total Lead (Pb)	2024/07/28	99	80 - 120	102	80 - 120	<0.00020	mg/L	NC	20		
B454423	Total Molybdenum (Mo)	2024/07/28	101	80 - 120	101	80 - 120	<0.00020	mg/L	75 (2)	20		
B454423	Total Nickel (Ni)	2024/07/28	99	80 - 120	96	80 - 120	<0.00050	mg/L	NC	20		
B454423	Total Selenium (Se)	2024/07/28	98	80 - 120	102	80 - 120	<0.00020	mg/L	NC	20		
B454423	Total Silver (Ag)	2024/07/28	98	80 - 120	99	80 - 120	<0.00010	mg/L	NC	20		
B454423	Total Thallium (Tl)	2024/07/28	101	80 - 120	103	80 - 120	<0.00020	mg/L	NC	20		
B454423	Total Tin (Sn)	2024/07/28	99	80 - 120	103	80 - 120	<0.0010	mg/L	NC	20		
B454423	Total Titanium (Ti)	2024/07/28	96	80 - 120	92	80 - 120	<0.0010	mg/L	NC	20		
B454423	Total Uranium (U)	2024/07/28	103	80 - 120	101	80 - 120	<0.00010	mg/L	NC	20		
B454423	Total Vanadium (V)	2024/07/28	100	80 - 120	96	80 - 120	<0.0010	mg/L	NC	20		
B454423	Total Zinc (Zn)	2024/07/28	99	80 - 120	100	80 - 120	<0.0030	mg/L	13	20		
B454426	Total Barium (Ba)	2024/07/29	97	80 - 120	98	80 - 120	<0.010	mg/L	3.1	20		
B454426	Total Boron (B)	2024/07/29	92	80 - 120	94	80 - 120	<0.020	mg/L	2.8	20		
B454426	Total Calcium (Ca)	2024/07/29	NC	80 - 120	98	80 - 120	<0.30	mg/L	1.5	20		
B454426	Total Iron (Fe)	2024/07/29	NC	80 - 120	104	80 - 120	<0.064	mg/L	2.0	20		
B454426	Total Lithium (Li)	2024/07/29	95	80 - 120	100	80 - 120	<0.020	mg/L	8.3	20		
B454426	Total Magnesium (Mg)	2024/07/29	NC	80 - 120	104	80 - 120	<0.20	mg/L	1.2	20		
B454426	Total Manganese (Mn)	2024/07/29	98	80 - 120	98	80 - 120	<0.0040	mg/L	2.0	20		
B454426	Total Potassium (K)	2024/07/29	NC	80 - 120	100	80 - 120	<0.30	mg/L	1.9	20		
B454426	Total Silicon (Si)	2024/07/29	NC	80 - 120	101	80 - 120	<0.50	mg/L	NC	20		
B454426	Total Sodium (Na)	2024/07/29	NC	80 - 120	99	80 - 120	<0.50	mg/L	3.3	20		
B454426	Total Strontium (Sr)	2024/07/29	91	80 - 120	94	80 - 120	<0.020	mg/L	1.7	20		
B454426	Total Sulphur (S)	2024/07/29	NC	80 - 120	96	80 - 120	<0.20	mg/L	3.4	20		
B455482	Nitrate (N)	2024/07/26	103	80 - 120	98	80 - 120	<0.0020	mg/L	NC	20		
B455482	Nitrite (N)	2024/07/26	96	80 - 120	93	80 - 120	<0.0010	mg/L	NC	20		
B455720	Alkalinity (PP as CaCO3)	2024/07/26					<0.50	mg/L	NC	20		
B455720	Alkalinity (Total as CaCO3)	2024/07/26			98	80 - 120	<0.50	mg/L	1.8	20		
B455720	Bicarbonate (HCO3)	2024/07/26					<0.50	mg/L	1.8	20		
B455720	Carbonate (CO3)	2024/07/26					<0.50	mg/L	NC	20		
B455720	Hydroxide (OH)	2024/07/26					<0.50	mg/L	NC	20		

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Bureau Veritas Job #: C454226
Report Date: 2024/07/31

QUALITY ASSURANCE REPORT(CONT'D)

Arctic Canadian Diamond Company Ltd
Client Project #: 61046
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

			Matrix Spike		Spiked Blank		Method Blank		RPD		QC Standard	
QC Batch	Parameter	Date	% Recovery	QC Limits	% Recovery	QC Limits	Value	UNITS	Value (%)	QC Limits	% Recovery	QC Limits
B455722	pH	2024/07/26			100	97 - 103			1.0	N/A		
B455723	Conductivity	2024/07/26			100	90 - 110	<1.0	uS/cm	0.48	20		
B455725	Fluoride (F)	2024/07/26	95	80 - 120	93	80 - 120	<0.010	mg/L	1.0	20		
B456768	Total Barium (Ba)	2024/07/28	96	80 - 120	96	80 - 120	<0.010	mg/L	NC	20		
B456768	Total Boron (B)	2024/07/28	93	80 - 120	93	80 - 120	<0.020	mg/L	NC	20		
B456768	Total Calcium (Ca)	2024/07/28	97	80 - 120	97	80 - 120	<0.30	mg/L	1.1	20		
B456768	Total Iron (Fe)	2024/07/28	103	80 - 120	102	80 - 120	<0.070	mg/L	3.2	20		
B456768	Total Lithium (Li)	2024/07/28	99	80 - 120	98	80 - 120	<0.020	mg/L	NC	20		
B456768	Total Magnesium (Mg)	2024/07/28	102	80 - 120	101	80 - 120	<0.20	mg/L	0.22	20		
B456768	Total Manganese (Mn)	2024/07/28	98	80 - 120	97	80 - 120	<0.0040	mg/L	0.78	20		
B456768	Total Potassium (K)	2024/07/28	99	80 - 120	98	80 - 120	<0.30	mg/L	5.8	20		
B456768	Total Silicon (Si)	2024/07/28	102	80 - 120	101	80 - 120	<0.50	mg/L	NC	20		
B456768	Total Sodium (Na)	2024/07/28	96	80 - 120	98	80 - 120	<0.50	mg/L	0.089	20		
B456768	Total Strontium (Sr)	2024/07/28	92	80 - 120	92	80 - 120	<0.020	mg/L	NC	20		
B456768	Total Sulphur (S)	2024/07/28	97	80 - 120	97	80 - 120	<0.20	mg/L	2.9	20		
B456772	Total Aluminum (Al)	2024/07/28	99	80 - 120	104	80 - 120	<0.0030	mg/L	NC	20		
B456772	Total Antimony (Sb)	2024/07/28	102	80 - 120	115	80 - 120	<0.00060	mg/L	NC	20		
B456772	Total Arsenic (As)	2024/07/28	100	80 - 120	109	80 - 120	<0.00020	mg/L	4.7	20		
B456772	Total Beryllium (Be)	2024/07/28	100	80 - 120	98	80 - 120	<0.0010	mg/L	NC	20		
B456772	Total Cadmium (Cd)	2024/07/28	96	80 - 120	114	80 - 120	<0.000020	mg/L	NC	20		
B456772	Total Chromium (Cr)	2024/07/28	99	80 - 120	105	80 - 120	<0.0010	mg/L	NC	20		
B456772	Total Cobalt (Co)	2024/07/28	100	80 - 120	106	80 - 120	<0.00030	mg/L	NC	20		
B456772	Total Copper (Cu)	2024/07/28	98	80 - 120	106	80 - 120	<0.0010	mg/L	8.4	20		
B456772	Total Lead (Pb)	2024/07/28	99	80 - 120	115	80 - 120	<0.00020	mg/L	NC	20		
B456772	Total Molybdenum (Mo)	2024/07/28	99	80 - 120	112	80 - 120	<0.00020	mg/L	3.6	20		
B456772	Total Nickel (Ni)	2024/07/28	98	80 - 120	106	80 - 120	<0.00050	mg/L	12	20		
B456772	Total Selenium (Se)	2024/07/28	98	80 - 120	111	80 - 120	<0.00020	mg/L	NC	20		
B456772	Total Silver (Ag)	2024/07/28	96	80 - 120	110	80 - 120	<0.00010	mg/L	NC	20		
B456772	Total Thallium (Tl)	2024/07/28	101	80 - 120	118	80 - 120	<0.00020	mg/L	NC	20		
B456772	Total Tin (Sn)	2024/07/28	97	80 - 120	115	80 - 120	<0.0010	mg/L	NC	20		
B456772	Total Titanium (Ti)	2024/07/28	98	80 - 120	103	80 - 120	<0.0010	mg/L	NC	20		
B456772	Total Uranium (U)	2024/07/28	103	80 - 120	113	80 - 120	<0.00010	mg/L	8.0	20		

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Bureau Veritas Job #: C454226
Report Date: 2024/07/31

QUALITY ASSURANCE REPORT(CONT'D)

Arctic Canadian Diamond Company Ltd
Client Project #: 61046
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

			Matrix Spike		Spiked Blank		Method Blank		RPD		QC Standard	
QC Batch	Parameter	Date	% Recovery	QC Limits	% Recovery	QC Limits	Value	UNITS	Value (%)	QC Limits	% Recovery	QC Limits
B456772	Total Vanadium (V)	2024/07/28	102	80 - 120	107	80 - 120	<0.0010	mg/L	NC	20		
B456772	Total Zinc (Zn)	2024/07/28	95	80 - 120	110	80 - 120	<0.0030	mg/L	NC	20		
B459026	Total Organic Carbon (C)	2024/07/30	101	80 - 120	99	80 - 120	<0.20	mg/L	4.2	20		
B459471	Total Phosphorus (P)	2024/07/30	103	80 - 120	95	80 - 120	<0.0010	mg/L	NC	20	90	80 - 120
B459531	Fluoride (F)	2024/07/30	94	80 - 120	94	80 - 120	<0.010	mg/L	NC	20		
B459784	Total Inorganic Carbon (C)	2024/07/31	NC	80 - 120	104	80 - 120	<1.0	mg/L	0.68	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) Method blank exceeds acceptance limits, 2x RDL acceptable for low level analysis

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

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Bureau Veritas Job #: C454226
Report Date: 2024/07/31

Arctic Canadian Diamond Company Ltd
Client Project #: 61046
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

VALIDATION SIGNATURE PAGE

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

Suwan (Sze Yeung) Fock, B.Sc., Scientific Specialist

Bureau Veritas 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 Signatures page if included, otherwise available by request. For Department specific Analyst/Supervisor validation names, please refer to the Test Summary section if included, otherwise available by request. This report is authorized by Scott Cantwell, General Manager responsible for Alberta Environmental laboratory operations.

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

CHAIN OF CUSTODY FORM

COC# 101752

SO# 61046

BUREAU VERITAS

Burgundy Diamond Mines
900 - 606 4 Street SW, Calgary, Alberta, Canada T2P 1T1
Tel: 867-880-4400 ext 2157
Burgundy Contact: Richard Ehlert / Jonah Kelly

BURGUNDY DIAMOND MINES

For Lab Use	SAMPLE INFORMATION						ANALYSIS REQUESTED (Indicate Filtered (F), Preserved (P) or Filtered and Preserved (F/P) below)					
	Sample Point	Station Type	Date	Time	Matrix	Type	Dissolved Nutrients	Major Ions	SNP Total Nutrients	Standard Total Metals	pH Field (pH)	Water Temp (°C)
	0008-121	EKA 2002 0008	15-Jul-2024	12:35	Water	SNP	Y	Y	Y	Y		
	0008-494	EKA 2002 0008	15-Jul-2024	11:15	Water	SNP	Y	Y	Y	Y		
	0008-Sa103	EKA 2002 0008	15-Jul-2024	12:35	Water	SNP	Y	Y	Y	Y	7.23	18.2
	0008-Sa10	EKA 2002 0008	15-Jul-2024	12:30	Water	SNP	Y	Y	Y	Y	7.23	18.2
	0008-Sa32	EKA 2002 0008	15-Jul-2024	12:10	Water	SNP	Y	Y	Y	Y	6.97	16.6
	0008-Sa3	EKA 2002 0008	15-Jul-2024	11:20	Water	SNP	Y	Y	Y	Y	6.97	16.6
	0008-Sa9b	EKA 2002 0008	15-Jul-2024	11:10	Water	SNP	Y	Y	Y	Y	6.81	16.8

FOR LAB USE ONLY

MCAL-2024-07-1450

Special Instructions (Billing details, QC reporting etc):

Frequency: On the first day of Discharge, weekly during periods of Discharge, and on the final day of Discharge.
Parameters: TSS, major ions1, physical parameters, total metals and nutrients.

*** Sample :0008-Sa3, 0008-Sa9b with Profil, 0008-Sa10***

Sent results to Tania.robitaille@burgundydiamonds.com,

Relinquished by:	Date / Time	Received by:	Date / Time
[signature]	Date 17-Jul-24 Time 0900	Charlie KA LONG NG	Date 2024/07/18 Time 10:30
Relinquished by:	Date Time	Received by:	Date Time

FOR LAB USE ONLY

Cooler seal intact upon receipt? ☐ Yes ☐ No ☐ N/A

Sample temperature upon receipt: Frozen? ☐ Yes ☐ No

See ACTR

Send Analytical Results to: compliance.team@burgundydiamonds.com

C454226
2024/07/18 10:30

Your P.O. #: 6404002992
Site Location: MDMER/SNP/SEEPAGE
Your C.O.C. #: 101949

Attention: COMPLIANCE TEAM

Arctic Canadian Diamond Company Ltd
900, 606 4 Street SW
Calgary, AB
CANADA T2P 1T1

Report Date: 2024/08/18
Report #: R3543111
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C460552
Received: 2024/08/08, 13:15

Sample Matrix: Water
Samples Received: 5

Analyses	Quantity	Date Extracted	Date Analyzed	Laboratory Method	Analytical Method
Acidity pH 4.5 & pH 8.3 (as CaCO3)	5	N/A	2024/08/09	AB SOP-00005	SM 24 2310 B m
Alkalinity - Low Level	5	N/A	2024/08/14	AB SOP-00005	SM 24 2320 B m
Low level chloride/sulphate by AC	5	N/A	2024/08/09	AB SOP-00020	SM24-4500-Cl/SO4-E m
Conductance - Low Level	5	N/A	2024/08/14	AB SOP-00005	SM 24 2510 B m
Fluoride - Low Level	5	N/A	2024/08/14	AB SOP-00005	SM 24 4500-F C m
Hardness Total (calculated as CaCO3) (1)	5	N/A	2024/08/15	BBY WI-00033	Auto Calc
Mercury (Total) by CV	5	2024/08/09	2024/08/13	AB SOP-00084	BCMOE BCLM Oct2013 m
Elements by ICP - Total	5	2024/08/14	2024/08/14	AB SOP-00014 / AB SOP-00042	EPA 6010d R5 m
Elements by ICPMS - Total	5	2024/08/14	2024/08/14	AB SOP-00014 / AB SOP-00043	EPA 6020b R2 m
Ammonia-N Low Level (Preserved)	5	N/A	2024/08/13	AB SOP-00007	SM 24 4500 NH3 A G m
Nitrate + Nitrite-N (calculated) Low Lev	5	N/A	2024/08/12		Auto Calc
Nitrogen (Nitrite - Nitrate) Low Level	5	N/A	2024/08/08	AB SOP-00023	SM 24 4110 B m
pH @25°C (2)	5	N/A	2024/08/14	AB SOP-00005	SM 24 4500-H+B m
pH (Field)	4	N/A	2024/08/08	Field Test	Field Test
Orthophosphate LL by Automated Analyzer (3)	5	N/A	2024/08/08	AB SOP-00025	SM 24 4500-P A, F m
Silica (Reactive)	5	N/A	2024/08/15	AB SOP-00011	EPA 370.1 R1978 m
Sulphate (SO4) by IC	1	N/A	2024/08/13	AB SOP-00026	SM 24 4110 B m
Sulphate (SO4) by IC	4	N/A	2024/08/09	AB SOP-00026	SM 24 4110 B m
Carbon (total) (Calc. - Org. + Inorg.)	5	N/A	2024/08/12		Auto Calc
Temperature (Field)	4	N/A	2024/08/08	Field Test	Field Test
Carbon (Inorganic)	5	N/A	2024/08/12	CAL SOP-00076	Modified AE 2411
Total Kjeldahl Nitrogen (Total)	5	N/A	2024/08/12	BBY WI-00033	Auto Calc
Nitrogen (Total)	5	2024/08/11	2024/08/12	AB SOP-00093	SM 24 4500-N C m
Carbon (Total Organic) (4)	5	N/A	2024/08/12	AB SOP-00087	MMCW 119 1996 m
Total Phosphorus Low Level Total	5	2024/08/11	2024/08/12	AB SOP-00024	SM 24 4500-P A,B,F m
Total Suspended Solids (NFR)	5	2024/08/09	2024/08/09	AB SOP-00061	SM 24 2540 D m
Turbidity	5	N/A	2024/08/08	CAL SOP-00081	SM 24 2130 B m
Ion Balance (5)	5	N/A	2024/08/15		
Total Dissolved Solids (Calculated) (5)	5	N/A	2024/08/15		

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Your P.O. #: 6404002992
Site Location: MDMER/SNP/SEEPAGE
Your C.O.C. #: 101949

Attention: COMPLIANCE TEAM

Arctic Canadian Diamond Company Ltd
900, 606 4 Street SW
Calgary, AB
CANADA T2P 1T1

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CERTIFICATE OF ANALYSIS

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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, EPA, APHA or the Quebec Ministry of Environment.

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.
This Certificate shall not be reproduced except in full, without the written approval of the laboratory.

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) "Total Hardness" was calculated from Total Ca and Mg concentrations and may be biased high (Hardness, or Dissolved Hardness, calculated from Dissolved Ca and Mg, should be used for compliance if available).
(2) The CCME method requires pH to be analysed within 15 minutes of sampling and therefore field analysis is required for compliance. All Laboratory pH analyses in this report are reported past the CCME holding time. Bureau Veritas endeavours to analyze samples as soon as possible after receipt.
(3) Orthophosphate > Total Phosphorus Imbalance: When applicable, Orthophosphate, Total Phosphorus and dissolved Phosphorus results were reviewed and data quality meets acceptable levels unless otherwise noted.
(4) TOC present in the sample should be considered as non-purgeable TOC.
(5) Calculation was conducted as per client request using CAL PDF-00333.

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Encryption Key

Please direct all questions regarding this Certificate of Analysis to:
Geraldlyn Gouthro, Key Account Specialist
Email: geraldlyn.gouthro@bureauveritas.com
Phone# (403) 291-3077
==========
This report has been generated and distributed using a secure automated process.
Bureau Veritas 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 Signatures page if included, otherwise available by request. For Department specific Analyst/Supervisor validation names, please refer to the Test Summary section if included, otherwise available by request. This report is authorized by Scott Cantwell, General Manager responsible for Alberta Environmental laboratory operations.

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Bureau Veritas Job #: C460552
Report Date: 2024/08/18

Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

RESULTS OF CHEMICAL ANALYSES OF WATER

Bureau Veritas ID		CSW888			CSW889			CSW890		
Sampling Date		2024/08/03 10:34			2024/08/03 12:07			2024/08/03 10:41		
COC Number		101949			101949			101949		
	UNITS	**0008-121**	**RDL**	**QC Batch**	**0008-SA10**	**RDL**	**QC Batch**	**0008-SA32**	**RDL**	**QC Batch**
Calculated Parameters										
Total Hardness (CaCO3)	mg/L	<0.50	0.50	B470597	141	0.50	B470597	58.0	0.50	B470597
Calculated Ion Balance (% Difference)	%	NC		B470466	3.0		B470466	4.9		B470466
Nitrate plus Nitrite (N)	mg/L	<0.0022	0.0022	B470451	17	0.010	B470451	0.65	0.0022	B470451
Calculated Total Dissolved Solids	mg/L	<0.98	0.98	B470468	270	1.8	B470468	95	0.95	B470468
Total Total Kjeldahl Nitrogen (Calc)	mg/L	<0.020	0.020	B470612	0.26	0.20	B470612	0.385	0.020	B470612
Field Parameters										
Field pH	pH				7.27	N/A	ONSITE	7.24	N/A	ONSITE
Field Temperature (Fd)	deg. C				15.63	N/A	ONSITE	15.50	N/A	ONSITE
Misc. Inorganics										
Fluoride (F)	mg/L	<0.010	0.010	B476061	0.178	0.010	B476061	0.215	0.010	B476061
pH	pH	5.92	N/A	B476063	6.51	N/A	B476063	6.80	N/A	B476063
Reactive Silica	mg/L	<0.25 (1)	0.25	B478922	0.25	0.050	B478922	0.27	0.050	B478922
Acidity (pH 4.5)	mg/L	<1.0	1.0	B471218	<1.0	1.0	B471218	<1.0	1.0	B471218
Alkalinity (Total as CaCO3)	mg/L	0.59	0.50	B476056	23.7	0.50	B476056	41.8	0.50	B476056
Total Organic Carbon (C)	mg/L	0.38	0.20	B474014	2.4	0.20	B474014	3.4	0.20	B474014
Acidity (pH 8.3)	mg/L	<1.0	1.0	B471218	<1.0	1.0	B471218	<1.0	1.0	B471218
Alkalinity (PP as CaCO3)	mg/L	<0.50	0.50	B476056	<0.50	0.50	B476056	<0.50	0.50	B476056
Bicarbonate (HCO3)	mg/L	0.72	0.50	B476056	29.0	0.50	B476056	51.0	0.50	B476056
Carbonate (CO3)	mg/L	<0.50	0.50	B476056	<0.50	0.50	B476056	<0.50	0.50	B476056
Hydroxide (OH)	mg/L	<0.50	0.50	B476056	<0.50	0.50	B476056	<0.50	0.50	B476056
Total Suspended Solids	mg/L	<1.0	1.0	B471350	<1.0	1.0	B471350	<1.0	1.0	B471350
Anions										
Orthophosphate (P)	mg/L	<0.0010	0.0010	B470849	<0.0010	0.0010	B470849	<0.0010	0.0010	B470849
Chloride (Cl)	mg/L	<0.50	0.50	B472198	8.9	0.50	B472198	3.2	0.50	B472639
Dissolved-Low Level Sulphate (SO4)	mg/L	<0.30	0.30	B472147	100	1.5	B472147	34	0.30	B472147
Nutrients										
Total Carbon (C)	mg/L	<0.50	0.50	B470381	7.1	0.50	B470381	13	0.50	B470381
Total Inorganic Carbon (C)	mg/L	<1.0	1.0	B474185	4.7	1.0	B474185	9.2	1.0	B474141
Total Phosphorus (P)	mg/L	<0.0020	0.0020	B473551	<0.0020	0.0020	B473551	0.0042	0.0020	B473551
Total Ammonia (N)	mg/L	<0.0050	0.0050	B475364	0.026	0.0050	B475354	0.025	0.0050	B475354

RDL = Reportable Detection Limit
N/A = Not Applicable
(1) Detection limits raised due to matrix interference.

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Arctic Canadian Diamond Company Ltd
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Your P.O. #: 6404002992

RESULTS OF CHEMICAL ANALYSES OF WATER

Bureau Veritas ID		CSW888			CSW889			CSW890		
Sampling Date		2024/08/03 10:34			2024/08/03 12:07			2024/08/03 10:41		
COC Number		101949			101949			101949		
	UNITS	**0008-121**	**RDL**	**QC Batch**	**0008-SA10**	**RDL**	**QC Batch**	**0008-SA32**	**RDL**	**QC Batch**
Nitrite (N)	mg/L	<0.0010	0.0010	B470568	0.062	0.0010	B470568	0.0060	0.0010	B470568
Nitrate (N)	mg/L	<0.0020	0.0020	B470568	17	0.010	B470568	0.64	0.0020	B470568
Total Nitrogen (N)	mg/L	<0.020	0.020	B473382	17 (1)	0.20	B473390	1.0	0.020	B473390
Physical Properties										
Conductivity	uS/cm	<1.0	1.0	B476060	454	1.0	B476060	174	1.0	B476060
Physical Properties										
Turbidity - NTU	NTU	<0.10	0.10	B470654	<0.10	0.10	B470654	<0.10	0.10	B470654

RDL = Reportable Detection Limit
(1) Due to the sample matrix, sample required dilution. Detection limit was adjusted accordingly.

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Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

RESULTS OF CHEMICAL ANALYSES OF WATER

Bureau Veritas ID		CSW891		CSW892		
Sampling Date		2024/08/03 10:29		2024/08/03 11:00		
COC Number		101949		101949		
	UNITS	**0008-SA3**	**QC Batch**	**0008-SA9B**	**RDL**	**QC Batch**
Calculated Parameters						
Total Hardness (CaCO3)	mg/L	57.5	B470597	9.32	0.50	B470597
Calculated Ion Balance (% Difference)	%	5.4	B470466	4.0		B470466
Nitrate plus Nitrite (N)	mg/L	0.65	B470451	<0.0022	0.0022	B470451
Calculated Total Dissolved Solids	mg/L	95	B470468	14	0.95	B470468
Total Total Kjeldahl Nitrogen (Calc)	mg/L	0.362	B470612	0.399	0.020	B470612
Field Parameters						
Field pH	pH	7.24	ONSITE	7.10	N/A	ONSITE
Field Temperature (Fd)	deg. C	15.60	ONSITE	14.0	N/A	ONSITE
Misc. Inorganics						
Fluoride (F)	mg/L	0.215	B476061	0.039	0.010	B476061
pH	pH	6.82	B476063	6.42	N/A	B476063
Reactive Silica	mg/L	0.27	B478922	0.15	0.050	B478922
Acidity (pH 4.5)	mg/L	<1.0	B471218	<1.0	1.0	B471218
Alkalinity (Total as CaCO3)	mg/L	41.3	B476056	9.37	0.50	B476056
Total Organic Carbon (C)	mg/L	3.4	B474014	5.9	0.20	B474014
Acidity (pH 8.3)	mg/L	<1.0	B471218	1.4	1.0	B471218
Alkalinity (PP as CaCO3)	mg/L	<0.50	B476056	<0.50	0.50	B476056
Bicarbonate (HCO3)	mg/L	50.4	B476056	11.4	0.50	B476056
Carbonate (CO3)	mg/L	<0.50	B476056	<0.50	0.50	B476056
Hydroxide (OH)	mg/L	<0.50	B476056	<0.50	0.50	B476056
Total Suspended Solids	mg/L	<1.0	B471350	<1.0	1.0	B471350
Anions						
Orthophosphate (P)	mg/L	<0.0010	B470849	<0.0010	0.0010	B470849
Chloride (Cl)	mg/L	3.6	B472198	<0.50	0.50	B472639
Dissolved-Low Level Sulphate (SO4)	mg/L	34	B472147	3.2	0.30	B472340
Nutrients						
Total Carbon (C)	mg/L	11	B470381	8.3	0.50	B470381
Total Inorganic Carbon (C)	mg/L	7.3	B474185	2.4	1.0	B474185
Total Phosphorus (P)	mg/L	0.0039	B473551	0.0046	0.0020	B473551
Total Ammonia (N)	mg/L	0.023	B475354	0.020	0.0050	B475354
Nitrite (N)	mg/L	0.0059	B470568	<0.0010	0.0010	B470568

RDL = Reportable Detection Limit
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Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

RESULTS OF CHEMICAL ANALYSES OF WATER

Bureau Veritas ID		CSW891		CSW892		
Sampling Date		2024/08/03 10:29		2024/08/03 11:00		
COC Number		101949		101949		
	UNITS	**0008-SA3**	**QC Batch**	**0008-SA9B**	**RDL**	**QC Batch**
Nitrate (N)	mg/L	0.64	B470568	<0.0020	0.0020	B470568
Total Nitrogen (N)	mg/L	1.0	B473382	0.40	0.020	B473382
Physical Properties						
Conductivity	uS/cm	173	B476060	29.7	1.0	B476060
Physical Properties						
Turbidity - NTU	NTU	<0.10	B470654	1.4	0.10	B470654
RDL = Reportable Detection Limit						

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MERCURY BY COLD VAPOR (WATER)

Bureau Veritas ID		CSW888	CSW889	CSW890	CSW891	CSW892		
Sampling Date		2024/08/03 10:34	2024/08/03 12:07	2024/08/03 10:41	2024/08/03 10:29	2024/08/03 11:00		
COC Number		101949	101949	101949	101949	101949		
	UNITS	**0008-121**	**0008-SA10**	**0008-SA32**	**0008-SA3**	**0008-SA9B**	**RDL**	**QC Batch**
Elements								
Total Mercury (Hg)	mg/L	<0.0000019	<0.0000019	<0.0000019	<0.0000019	<0.0000019	0.0000019	B471735
RDL = Reportable Detection Limit								

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Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

ELEMENTS BY ATOMIC SPECTROSCOPY (WATER)

Bureau Veritas ID		CSW888	CSW889	CSW890	CSW891	CSW892		
Sampling Date		2024/08/03 10:34	2024/08/03 12:07	2024/08/03 10:41	2024/08/03 10:29	2024/08/03 11:00		
COC Number		101949	101949	101949	101949	101949		
	UNITS	**0008-121**	**0008-SA10**	**0008-SA32**	**0008-SA3**	**0008-SA9B**	**RDL**	**QC Batch**
Elements								
Total Aluminum (Al)	mg/L	<0.0030	0.019	0.015	0.017	0.011	0.0030	B477803
Total Antimony (Sb)	mg/L	<0.00060	<0.00060	<0.00060	<0.00060	<0.00060	0.00060	B477803
Total Arsenic (As)	mg/L	<0.00020	0.00025	0.00043	0.00046	0.00035	0.00020	B477803
Total Barium (Ba)	mg/L	<0.010	0.081	0.015	0.015	<0.010	0.010	B477811
Total Beryllium (Be)	mg/L	<0.0010	<0.0010	<0.0010	<0.0010	<0.0010	0.0010	B477803
Total Boron (B)	mg/L	<0.020	<0.020	<0.020	<0.020	<0.020	0.020	B477811
Total Cadmium (Cd)	mg/L	<0.000020	0.000025	<0.000020	<0.000020	<0.000020	0.000020	B477803
Total Calcium (Ca)	mg/L	<0.30	23	10	9.8	1.5	0.30	B477811
Total Chromium (Cr)	mg/L	<0.0010	<0.0010	<0.0010	<0.0010	<0.0010	0.0010	B477803
Total Cobalt (Co)	mg/L	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030	0.00030	B477803
Total Copper (Cu)	mg/L	<0.0010	<0.0010	<0.0010	<0.0010	<0.0010	0.0010	B477803
Total Iron (Fe)	mg/L	<0.060	<0.060	0.13	0.12	0.18	0.060	B477811
Total Lead (Pb)	mg/L	<0.00020	0.00022	<0.00020	<0.00020	<0.00020	0.00020	B477803
Total Lithium (Li)	mg/L	<0.020	<0.020	<0.020	<0.020	<0.020	0.020	B477811
Total Magnesium (Mg)	mg/L	<0.20	20	8.1	8.0	1.3	0.20	B477811
Total Manganese (Mn)	mg/L	<0.0040	<0.0040	0.036	0.036	0.016	0.0040	B477811
Total Molybdenum (Mo)	mg/L	<0.00020	0.033	0.0018	0.0018	<0.00020	0.00020	B477803
Total Nickel (Ni)	mg/L	<0.00050	0.024	0.0027	0.0026	0.00079	0.00050	B477803
Total Potassium (K)	mg/L	<0.30	17	5.5	5.4	0.98	0.30	B477811
Total Selenium (Se)	mg/L	<0.00020	0.00022	<0.00020	<0.00020	<0.00020	0.00020	B477803
Total Silicon (Si)	mg/L	<0.50	<0.50	<0.50	<0.50	<0.50	0.50	B477811
Total Silver (Ag)	mg/L	<0.00010	<0.00010	<0.00010	<0.00010	<0.00010	0.00010	B477803
Total Sodium (Na)	mg/L	<0.50	14	5.4	5.3	1.3	0.50	B477811
Total Strontium (Sr)	mg/L	<0.020	0.28	0.081	0.080	<0.020	0.020	B477811
Total Sulphur (S)	mg/L	<0.20	33	10	10	0.92	0.20	B477811
Total Thallium (Tl)	mg/L	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020	0.00020	B477803
Total Tin (Sn)	mg/L	<0.0010	<0.0010	<0.0010	<0.0010	<0.0010	0.0010	B477803
Total Titanium (Ti)	mg/L	<0.0010	<0.0010	<0.0010	<0.0010	<0.0010	0.0010	B477803
Total Uranium (U)	mg/L	<0.00010	0.0026	0.0021	0.0020	<0.00010	0.00010	B477803
Total Vanadium (V)	mg/L	<0.0010	<0.0010	<0.0010	<0.0010	<0.0010	0.0010	B477803
Total Zinc (Zn)	mg/L	<0.0030	<0.0030	<0.0030	<0.0030	<0.0030	0.0030	B477803
RDL = Reportable Detection Limit								

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GENERAL COMMENTS

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

Package 1	9.3°C
Package 2	8.0°C
Package 3	8.7°C
Package 4	7.2°C
Package 5	7.8°C
Package 6	8.8°C
Package 7	9.6°C
Package 8	4.9°C
Package 9	9.2°C
Package 10	5.4°C
Package 11	5.8°C
Package 12	5.8°C
Package 13	6.3°C
Package 14	8.4°C
Package 15	6.0°C
Package 16	8.0°C
Package 17	5.0°C
Package 18	7.2°C
Package 19	6.0°C
Package 20	5.0°C
Package 21	5.8°C
Package 22	8.1°C
Package 23	6.5°C
Package 24	6.5°C
Package 25	7.9°C
Package 26	6.2°C
Package 27	6.8°C
Package 28	6.2°C

Sample CSW888 [0008-121] : Turbidity completed within five days of sampling. Data is satisfactory for compliance purposes. Nitrogen (Nitrite - Nitrate) Low Level completed within five days of sampling. Data is satisfactory for compliance purposes.

Sample CSW889 [0008-SA10] : Turbidity completed within five days of sampling. Data is satisfactory for compliance purposes. Nitrogen (Nitrite - Nitrate) Low Level completed within five days of sampling. Data is satisfactory for compliance purposes.

Sample CSW890 [0008-SA32] : Turbidity completed within five days of sampling. Data is satisfactory for compliance purposes. Nitrogen (Nitrite - Nitrate) Low Level completed within five days of sampling. Data is satisfactory for compliance purposes.

Sample CSW891 [0008-SA3] : Turbidity completed within five days of sampling. Data is satisfactory for compliance purposes. Nitrogen (Nitrite - Nitrate) Low Level completed within five days of sampling. Data is satisfactory for compliance purposes.

Sample CSW892 [0008-SA9B] : Turbidity completed within five days of sampling. Data is satisfactory for compliance purposes. Nitrogen (Nitrite - Nitrate) Low Level completed within five days of sampling. Data is satisfactory for compliance purposes.

Results relate only to the items tested.

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Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Bureau Veritas Job #: C460552
Report Date: 2024/08/18

QUALITY ASSURANCE REPORT

Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

			Matrix Spike		Spiked Blank		Method Blank		RPD		QC Standard	
QC Batch	Parameter	Date	% Recovery	QC Limits	% Recovery	QC Limits	Value	UNITS	Value (%)	QC Limits	% Recovery	QC Limits
B470568	Nitrate (N)	2024/08/08	101	80 - 120	100	80 - 120	<0.0020	mg/L	0.074	20		
B470568	Nitrite (N)	2024/08/08	94	80 - 120	93	80 - 120	<0.0010	mg/L	2.9	20		
B470654	Turbidity - NTU	2024/08/08			102	80 - 120	<0.10	NTU	NC	20		
B470849	Orthophosphate (P)	2024/08/08	89	80 - 120	100	80 - 120	<0.0010	mg/L	NC	20		
B471218	Acidity (pH 4.5)	2024/08/09					<1.0	mg/L	NC	20		
B471218	Acidity (pH 8.3)	2024/08/09			94	80 - 120	<1.0	mg/L	5.5	20		
B471350	Total Suspended Solids	2024/08/09	102	80 - 120	103	80 - 120	<1.0	mg/L	NC	20		
B471735	Total Mercury (Hg)	2024/08/13	96	80 - 120	97	80 - 120	<0.0000019	mg/L	NC	20		
B472147	Dissolved-Low Level Sulphate (SO4)	2024/08/09	105	80 - 120	102	80 - 120	<0.050	mg/L	1.7	20		
B472198	Chloride (Cl)	2024/08/09	102	80 - 120	101	80 - 120	<0.50	mg/L	NC	20		
B472340	Dissolved-Low Level Sulphate (SO4)	2024/08/09	103	80 - 120	102	80 - 120	<0.050	mg/L	5.6	20		
B472639	Chloride (Cl)	2024/08/09	99	80 - 120	99	80 - 120	<0.50	mg/L	1.3	20		
B473382	Total Nitrogen (N)	2024/08/12	101	80 - 120	98	80 - 120	<0.020	mg/L	NC	20	102	80 - 120
B473390	Total Nitrogen (N)	2024/08/12	NC	80 - 120	100	80 - 120	<0.020	mg/L	1.0	20	104	80 - 120
B473551	Total Phosphorus (P)	2024/08/12	101	80 - 120	96	80 - 120	<0.0010	mg/L	13	20	91	80 - 120
B474014	Total Organic Carbon (C)	2024/08/12	99	80 - 120	101	80 - 120	<0.20	mg/L	NC	20		
B474141	Total Inorganic Carbon (C)	2024/08/12	NC	80 - 120	109	80 - 120	<1.0	mg/L	1.9	20		
B474185	Total Inorganic Carbon (C)	2024/08/12	112	80 - 120	110	80 - 120	<1.0	mg/L	0.73	20		
B475354	Total Ammonia (N)	2024/08/13	105	80 - 120	103	80 - 120	<0.0050	mg/L	2.6	20		
B475364	Total Ammonia (N)	2024/08/13	105	80 - 120	104	80 - 120	<0.0050	mg/L	6.9	20		
B476056	Alkalinity (PP as CaCO3)	2024/08/14					<0.50	mg/L	NC	20		
B476056	Alkalinity (Total as CaCO3)	2024/08/14			97	80 - 120	<0.50	mg/L	8.1	20		
B476056	Bicarbonate (HCO3)	2024/08/14					<0.50	mg/L	8.1	20		
B476056	Carbonate (CO3)	2024/08/14					<0.50	mg/L	NC	20		
B476056	Hydroxide (OH)	2024/08/14					<0.50	mg/L	NC	20		
B476060	Conductivity	2024/08/14			103	90 - 110	<1.0	uS/cm	0.37	20		
B476061	Fluoride (F)	2024/08/14	104	80 - 120	102	80 - 120	<0.010	mg/L	NC	20		
B476063	pH	2024/08/14			101	97 - 103			1.5	N/A		
B477803	Total Aluminum (Al)	2024/08/14	111	80 - 120	107	80 - 120	<0.0030	mg/L	2.4	20		
B477803	Total Antimony (Sb)	2024/08/14	95	80 - 120	85	80 - 120	<0.00060	mg/L	NC	20		
B477803	Total Arsenic (As)	2024/08/14	93	80 - 120	91	80 - 120	<0.00020	mg/L	0.12	20		
B477803	Total Beryllium (Be)	2024/08/14	103	80 - 120	101	80 - 120	<0.0010	mg/L	NC	20		
B477803	Total Cadmium (Cd)	2024/08/14	95	80 - 120	94	80 - 120	<0.000020	mg/L				

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Bureau Veritas Job #: C460552
Report Date: 2024/08/18

QUALITY ASSURANCE REPORT(CONT'D)

Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

			Matrix Spike		Spiked Blank		Method Blank		RPD		QC Standard	
QC Batch	Parameter	Date	% Recovery	QC Limits	% Recovery	QC Limits	Value	UNITS	Value (%)	QC Limits	% Recovery	QC Limits
B477803	Total Chromium (Cr)	2024/08/14	99	80 - 120	97	80 - 120	<0.0010	mg/L	NC	20		
B477803	Total Cobalt (Co)	2024/08/14	100	80 - 120	99	80 - 120	<0.00030	mg/L	NC	20		
B477803	Total Copper (Cu)	2024/08/14	98	80 - 120	97	80 - 120	<0.0010	mg/L	2.2	20		
B477803	Total Lead (Pb)	2024/08/14	94	80 - 120	93	80 - 120	<0.00020	mg/L	NC	20		
B477803	Total Molybdenum (Mo)	2024/08/14	100	80 - 120	89	80 - 120	<0.00020	mg/L	NC	20		
B477803	Total Nickel (Ni)	2024/08/14	98	80 - 120	97	80 - 120	<0.00050	mg/L	11	20		
B477803	Total Selenium (Se)	2024/08/14	89	80 - 120	88	80 - 120	<0.00020	mg/L	NC	20		
B477803	Total Silver (Ag)	2024/08/14	98	80 - 120	97	80 - 120	<0.00010	mg/L	NC	20		
B477803	Total Thallium (Tl)	2024/08/14	97	80 - 120	96	80 - 120	<0.00020	mg/L	NC	20		
B477803	Total Tin (Sn)	2024/08/14	99	80 - 120	90	80 - 120	<0.0010	mg/L	NC	20		
B477803	Total Titanium (Ti)	2024/08/14	102	80 - 120	89	80 - 120	<0.0010	mg/L	NC	20		
B477803	Total Uranium (U)	2024/08/14	103	80 - 120	100	80 - 120	<0.00010	mg/L	NC	20		
B477803	Total Vanadium (V)	2024/08/14	100	80 - 120	97	80 - 120	<0.0010	mg/L	NC	20		
B477803	Total Zinc (Zn)	2024/08/14	86	80 - 120	87	80 - 120	<0.0030	mg/L	3.3	20		
B477811	Total Barium (Ba)	2024/08/14	102	80 - 120	97	80 - 120	<0.010	mg/L	NC	20		
B477811	Total Boron (B)	2024/08/14	97	80 - 120	96	80 - 120	<0.020	mg/L	NC	20		
B477811	Total Calcium (Ca)	2024/08/14	97	80 - 120	93	80 - 120	<0.30	mg/L	0.43	20		
B477811	Total Iron (Fe)	2024/08/14	NC	80 - 120	97	80 - 120	<0.060	mg/L	0.13	20		
B477811	Total Lithium (Li)	2024/08/14	93	80 - 120	91	80 - 120	<0.020	mg/L	NC	20		
B477811	Total Magnesium (Mg)	2024/08/14	98	80 - 120	95	80 - 120	<0.20	mg/L	0.54	20		
B477811	Total Manganese (Mn)	2024/08/14	96	80 - 120	95	80 - 120	<0.0040	mg/L	0.72	20		
B477811	Total Potassium (K)	2024/08/14	103	80 - 120	95	80 - 120	<0.30	mg/L	0.85	20		
B477811	Total Silicon (Si)	2024/08/14	315 (1)	80 - 120	97	80 - 120	<0.50	mg/L	0.43	20		
B477811	Total Sodium (Na)	2024/08/14	NC	80 - 120	92	80 - 120	<0.50	mg/L	0.13	20		
B477811	Total Strontium (Sr)	2024/08/14	92	80 - 120	94	80 - 120	<0.020	mg/L	0.12	20		
B477811	Total Sulphur (S)	2024/08/14	100	80 - 120	84	80 - 120	<0.20	mg/L	0.099	20		

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Bureau Veritas Job #: C460552
Report Date: 2024/08/18

QUALITY ASSURANCE REPORT(CONT'D)

Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

			Matrix Spike		Spiked Blank		Method Blank		RPD		QC Standard	
QC Batch	Parameter	Date	% Recovery	QC Limits	% Recovery	QC Limits	Value	UNITS	Value (%)	QC Limits	% Recovery	QC Limits
B478922	Reactive Silica	2024/08/15	102	80 - 120	107	80 - 120	<0.050	mg/L	8.0	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) Recovery or RPD for this parameter is outside control limits. The overall quality control for this analysis meets acceptability criteria.

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VALIDATION SIGNATURE PAGE

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

Sandy Yuan, M.Sc., QP, Scientific Specialist

Bureau Veritas 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 Signatures page if included, otherwise available by request. For Department specific Analyst/Supervisor validation names, please refer to the Test Summary section if included, otherwise available by request. This report is authorized by Scott Cantwell, General Manager responsible for Alberta Environmental laboratory operations.

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

BUREAU VERITAS

ADDITIONAL COOLER TEMPERATURE RECORD

CHAIN-OF-CUSTODY RECORD

CHAIN OF CUSTODY #	
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COOLER OBSERVATIONS:

BV JOB#:

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	10.1 (1)	9.1 (2)	8.6 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	8.9 (1)	8.2 (2)	6.8 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	10.4 (1)	7.4 (2)	8.4 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	7.6 (1)	7.1 (2)	6.8 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	7.9 (1)	7.9 (2)	7.7 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	9.3 (1)	8.5 (2)	8.5 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	9.8 (1)	10.2 (2)	8.8 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	4.3 (1)	6.1 (2)	4.4 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	8.4 (1)	9.6 (2)	9.6 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	4.8 (1)	4.5 (2)	6.9 (3)
INTACT		✓				
ICE PRESENT	✓					

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	4.2 (1)	7.1 (2)	6.1 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	5.1 (1)	6.6 (2)	5.8 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	5.9 (1)	6.5 (2)	6.6 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	8.1 (1)	8.9 (2)	8.3 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	4.9 (1)	7.3 (2)	5.9 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	7.8 (1)	7.9 (2)	8.4 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	4.1 (1)	5.3 (2)	5.5 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	7.0 (1)	7.6 (2)	6.9 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	5.1 (1)	6.4 (2)	6.6 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	5.7 (1)	4.3 (2)	4.9 (3)
INTACT		✓				
ICE PRESENT	✓					

RECEIVED BY (SIGN & PRINT)		DATE (YYYY/MM/DD)	TIME (HH:MM)
Shaira	Shaira Cura	2024/08/08	13 15

BUREAU VERITAS

ADDITIONAL COOLER TEMPERATURE RECORD

CHAIN-OF-CUSTODY RECORD

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COOLER OBSERVATIONS:

BV JOB#:

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	4.3	5.8	7.3
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	8.4	8.7	10.1
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	7.4	6.1	6.1
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	7.6	7.6	4.3
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	9.1	8.6	6.1
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	6.1	6.7	5.8
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	7.0	7.1	6.3
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	6.2	6.2	6.2
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						

RECEIVED BY (SIGN & PRINT)		DATE (YYYY/MM/DD)	TIME (HH:MM)
Shaira	Shaira Cura	2024/08/08	13 15

C460552
2024/08/08 13:15

Burgundy Diamond Mines
900 - 606 4 Street SW, Calgary, Alberta, Canada T2P 1T1
Tel: 867-880-4400 ext 2157
Burgundy Contact: Richard Ehlert / Jonah Kelly

BURGUNDY DIAMOND MINES

CHAIN OF CUSTODY FORM

BUREAU VERITAS 1828

COC# 101949

SO# 61048

For Lab Use	SAMPLE INFORMATION						ANALYSIS REQUESTED (Indicate Filtered (F), Preserved (P) or Filtered and Preserved (F/P) below)																	
	Sample Point	Station Type	Date	Time	Matrix	Type	Major Ions	SNP Total Nutrients	Standard Total Metals														pH Field (pH)	Water Temp (°C)
Field Blank	0008-121	EKA 2002 0008	03-Aug-2024	10:34	Water	SNP	Y	Y	Y															
	0008-Sa10	EKA 2002 0008	03-Aug-2024	12:07	Water	SNP	Y	Y	Y														7.27	15.53
	0008-Sa32	EKA 2002 0008	03-Aug-2024	10:41	Water	SNP	Y	Y	Y														7.24	15.50
	0008-Sa3	EKA 2002 0008	03-Aug-2024	10:29	Water	SNP	Y	Y	Y														7.24	15.50
	0008-Sa9b	EKA 2002 0008	03-Aug-2024	11:00	Water	SNP	Y	Y	Y														7.10	14.0

FOR LAB USE ONLY

MCAL-2024-08-636

Special Instructions (Billing details, QC reporting etc):

Frequency: On the first day of Discharge, weekly during periods of Discharge, and on the final day of Discharge.
Parameters: TSS, major ion, physical parameters, total metals and nutrients.
*** Sample :0008-Sa3, 0008-Sa9b with Profil, 0008-Sa10***
Sent results to Tania.robitaille@burgundydiamonds.com, Landon.Murphy@burgundydiamonds.com & compliance.team@burgundydiamonds.com

Relinquished by:	Date 08 Aug 2024 Time 0714	Received by: Shaina Cura	Date 2024/08/08 Time 13:15
Relinquished by:	Date Time	Received by:	Date Time

FOR LAB USE ONLY

Cooler seal intact upon receipt?	Sample temperature upon receipt:
☐ Yes ☐ No ☐ N/A	Frozen? ☐ Yes ☐ No

Send Analytical Results to: compliance.team@burgundydiamonds.com

see Page

Your P.O. #: 6404002992
Site Location: MDMER/SNP/SEEPAGE
Your C.O.C. #: 102032

Attention: COMPLIANCE TEAM

Arctic Canadian Diamond Company Ltd
900, 606 4 Street SW
Calgary, AB
CANADA T2P 1T1

Report Date: 2024/08/27
Report #: R3547618
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C462640
Received: 2024/08/15, 10:00

Sample Matrix: Water
Samples Received: 5

Analyses	Quantity	Date Extracted	Date Analyzed	Laboratory Method	Analytical Method
Acidity pH 4.5 & pH 8.3 (as CaCO3)	5	N/A	2024/08/19	AB SOP-00005	SM 24 2310 B m
Alkalinity - Low Level	4	N/A	2024/08/21	AB SOP-00005	SM 24 2320 B m
Alkalinity - Low Level	1	N/A	2024/08/26	AB SOP-00005	SM 24 2320 B m
Low level chloride/sulphate by AC	5	N/A	2024/08/16	AB SOP-00020	SM24-4500-Cl/SO4-E m
Conductance - Low Level	5	N/A	2024/08/21	AB SOP-00005	SM 24 2510 B m
Fluoride - Low Level	5	N/A	2024/08/21	AB SOP-00005	SM 24 4500-F C m
Hardness Total (calculated as CaCO3) (1)	5	N/A	2024/08/21	BBY WI-00033	Auto Calc
Mercury (Total) by CV	5	2024/08/16	2024/08/17	AB SOP-00084	BCMOE BCLM Oct2013 m
Elements by ICP - Total	5	2024/08/20	2024/08/20	AB SOP-00014 / AB SOP-00042	EPA 6010d R5 m
Elements by ICPMS - Total	5	2024/08/20	2024/08/20	AB SOP-00014 / AB SOP-00043	EPA 6020b R2 m
Ammonia-N Low Level (Preserved)	1	N/A	2024/08/16	AB SOP-00007	SM 24 4500 NH3 A G m
Ammonia-N Low Level (Preserved)	4	N/A	2024/08/18	AB SOP-00007	SM 24 4500 NH3 A G m
Nitrate + Nitrite-N (calculated) Low Lev	5	N/A	2024/08/20		Auto Calc
Nitrogen (Nitrite - Nitrate) Low Level	5	N/A	2024/08/16	AB SOP-00023	SM 24 4110 B m
pH @25°C (2)	5	N/A	2024/08/21	AB SOP-00005	SM 24 4500-H+B m
pH (Field)	4	N/A	2024/08/15	Field Test	Field Test
Orthophosphate LL by Automated Analyzer (3)	5	N/A	2024/08/16	AB SOP-00025	SM 24 4500-P A, F m
Silica (Reactive)	5	N/A	2024/08/15	AB SOP-00011	EPA 370.1 R1978 m
Sulphate (SO4) by IC	5	N/A	2024/08/17	AB SOP-00026	SM 24 4110 B m
Carbon (total) (Calc. - Org. + Inorg.)	5	N/A	2024/08/20		Auto Calc
Temperature (Field)	4	N/A	2024/08/15	Field Test	Field Test
Carbon (Inorganic)	5	N/A	2024/08/19	CAL SOP-00076	Modified AE 2411
Total Kjeldahl Nitrogen (Total)	5	N/A	2024/08/21	BBY WI-00033	Auto Calc
Nitrogen (Total)	5	2024/08/17	2024/08/20	AB SOP-00093	SM 24 4500-N C m
Carbon (Total Organic) (4)	5	N/A	2024/08/20	AB SOP-00087	MMCW 119 1996 m
Total Phosphorus Low Level Total	5	2024/08/17	2024/08/19	AB SOP-00024	SM 24 4500-P A,B,F m
Total Suspended Solids (NFR)	5	2024/08/17	2024/08/19	AB SOP-00061	SM 24 2540 D m
Turbidity	5	N/A	2024/08/15	CAL SOP-00081	SM 24 2130 B m
Ion Balance (5)	5	N/A	2024/08/21		
Total Dissolved Solids (Calculated) (5)	5	N/A	2024/08/22		

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Your P.O. #: 6404002992
Site Location: MDMER/SNP/SEEPAGE
Your C.O.C. #: 102032

Attention: COMPLIANCE TEAM

Arctic Canadian Diamond Company Ltd
900, 606 4 Street SW
Calgary, AB
CANADA T2P 1T1

Report Date: 2024/08/27
Report #: R3547618
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CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C462640
Received: 2024/08/15, 10:00

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, EPA, APHA or the Quebec Ministry of Environment.

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.
This Certificate shall not be reproduced except in full, without the written approval of the laboratory.
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) "Total Hardness" was calculated from Total Ca and Mg concentrations and may be biased high (Hardness, or Dissolved Hardness, calculated from Dissolved Ca and Mg, should be used for compliance if available).
(2) The CCME method requires pH to be analysed within 15 minutes of sampling and therefore field analysis is required for compliance. All Laboratory pH analyses in this report are reported past the CCME holding time. Bureau Veritas endeavours to analyze samples as soon as possible after receipt.
(3) Orthophosphate > Total Phosphorus Imbalance: When applicable, Orthophosphate, Total Phosphorus and dissolved Phosphorus results were reviewed and data quality meets acceptable levels unless otherwise noted.
(4) TOC present in the sample should be considered as non-purgeable TOC.
(5) Calculation was conducted as per client request using CAL PDF-00333.

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Your P.O. #: 6404002992
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900, 606 4 Street SW
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Report Date: 2024/08/27
Report #: R3547618
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CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C462640
Received: 2024/08/15, 10:00

Encryption Key

Please direct all questions regarding this Certificate of Analysis to:
Geraldlyn Gouthro, Key Account Specialist
Email: geraldlyn.gouthro@bureauveritas.com
Phone# (403) 291-3077

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Bureau Veritas 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 Signatures page if included, otherwise available by request. For Department specific Analyst/Supervisor validation names, please refer to the Test Summary section if included, otherwise available by request. This report is authorized by Scott Cantwell, General Manager responsible for Alberta Environmental laboratory operations.

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Bureau Veritas Job #: C462640
Report Date: 2024/08/27

Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

RESULTS OF CHEMICAL ANALYSES OF WATER

Bureau Veritas ID		CTI744			CTI745	CTI746		
Sampling Date		2024/08/12 13:27			2024/08/12 15:55	2024/08/12 15:45		
COC Number		102032			102032	102032		
	UNITS	**0008-494**	**RDL**	**QC Batch**	**0008-SA103**	**0008-SA10**	**RDL**	**QC Batch**
Calculated Parameters								
Total Hardness (CaCO3)	mg/L	<0.50	0.50	B478857	155	157	0.50	B478857
Calculated Ion Balance (% Difference)	%	NC		B479338	1.5	1.6		B479338
Nitrate plus Nitrite (N)	mg/L	<0.0022	0.0022	B478892	17	17	0.010	B478892
Calculated Total Dissolved Solids	mg/L	<0.98	0.98	B479339	290	290	3.1	B479339
Total Total Kjeldahl Nitrogen (Calc)	mg/L	<0.20	0.20	B478554	<0.20	<0.20	0.20	B478554
Field Parameters								
Field pH	pH				7.81	7.81	N/A	ONSITE
Field Temperature (Fd)	deg. C				16.7	16.7	N/A	ONSITE
Misc. Inorganics								
Fluoride (F)	mg/L	0.014	0.010	B485632	0.199	0.198	0.010	B485632
pH	pH	4.83	N/A	B485628	6.31	6.41	N/A	B485628
Reactive Silica	mg/L	<0.25 (1)	0.25	B479696	0.39	0.39	0.050	B479696
Acidity (pH 4.5)	mg/L	<1.0	1.0	B483488	<1.0	<1.0	1.0	B483488
Alkalinity (Total as CaCO3)	mg/L	<0.50	0.50	B485624	23.5	24.0	0.50	B485624
Total Organic Carbon (C)	mg/L	<0.20	0.20	B483498	1.7	2.0	0.20	B483498
Acidity (pH 8.3)	mg/L	<1.0	1.0	B483488	<1.0	<1.0	1.0	B483488
Alkalinity (PP as CaCO3)	mg/L	<0.50	0.50	B485624	<0.50	<0.50	0.50	B485624
Bicarbonate (HCO3)	mg/L	<0.50	0.50	B485624	28.6	29.2	0.50	B485624
Carbonate (CO3)	mg/L	<0.50	0.50	B485624	<0.50	<0.50	0.50	B485624
Hydroxide (OH)	mg/L	<0.50	0.50	B485624	<0.50	<0.50	0.50	B485624
Total Suspended Solids	mg/L	<1.0	1.0	B481832	<1.0	<1.0	1.0	B481832
Anions								
Orthophosphate (P)	mg/L	<0.0010	0.0010	B480573	0.0033	<0.0010	0.0010	B480573
Chloride (Cl)	mg/L	<0.50	0.50	B480285	9.1	9.1	0.50	B480285
Dissolved-Low Level Sulphate (SO4)	mg/L	<0.30	0.30	B481931	110	110	3.0	B481931
Nutrients								
Total Carbon (C)	mg/L	<0.50	0.50	B479333	5.9	7.4	0.50	B479333
Total Inorganic Carbon (C)	mg/L	<1.0	1.0	B483383	4.2	5.4	1.0	B483383
Total Phosphorus (P)	mg/L	<0.0020	0.0020	B481955	<0.0020 (2)	<0.0020	0.0020	B481955

RDL = Reportable Detection Limit
N/A = Not Applicable
(1) Detection limits raised due to matrix interference.
(2) Phosphorus < Orthophosphate: Both values fall within the method uncertainty for duplicates and are likely equivalent.

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Bureau Veritas Job #: C462640
Report Date: 2024/08/27

Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

RESULTS OF CHEMICAL ANALYSES OF WATER

Bureau Veritas ID		CTI744			CTI745	CTI746		
Sampling Date		2024/08/12 13:27			2024/08/12 15:55	2024/08/12 15:45		
COC Number		102032			102032	102032		
	UNITS	**0008-494**	**RDL**	**QC Batch**	**0008-SA103**	**0008-SA10**	**RDL**	**QC Batch**
Total Ammonia (N)	mg/L	<0.0050	0.0050	B480397	0.013	0.014	0.0050	B482360
Nitrite (N)	mg/L	<0.0010	0.0010	B480413	0.052	0.057	0.0010	B480413
Nitrate (N)	mg/L	<0.0020	0.0020	B480413	17	17	0.010	B480413
Total Nitrogen (N)	mg/L	<0.20 (1)	0.20	B481849	16 (2)	16 (2)	0.20	B481849
Physical Properties								
Conductivity	uS/cm	<1.0	1.0	B485631	463	460	1.0	B485631
Physical Properties								
Turbidity - NTU	NTU	<0.10	0.10	B479376	0.13	<0.10	0.10	B479376

RDL = Reportable Detection Limit

(1) Due to the sample matrix, sample required dilution. Detection limit was adjusted accordingly.

(2) Due to the sample matrix, sample required dilution. Detection limit was adjusted accordingly. Nitrogen < Nitrate: Both values fall within the method uncertainty for duplicates and are likely equivalent.

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Bureau Veritas Job #: C462640
Report Date: 2024/08/27

Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

RESULTS OF CHEMICAL ANALYSES OF WATER

Bureau Veritas ID		CTI747		CTI748		
Sampling Date		2024/08/12 14:32		2024/08/12 13:30		
COC Number		102032		102032		
	UNITS	**0008-SA3**	**QC Batch**	**0008-SA9B**	**RDL**	**QC Batch**
Calculated Parameters						
Total Hardness (CaCO3)	mg/L	67.3	B478857	11.5	0.50	B478857
Calculated Ion Balance (% Difference)	%	2.8	B479338	13		B479338
Nitrate plus Nitrite (N)	mg/L	0.85	B478892	<0.0022	0.0022	B478892
Calculated Total Dissolved Solids	mg/L	100	B479339	16	0.95	B479339
Total Total Kjeldahl Nitrogen (Calc)	mg/L	0.235	B478554	0.343	0.020	B478554
Field Parameters						
Field pH	pH	7.37	ONSITE	7.13	N/A	ONSITE
Field Temperature (Fd)	deg. C	17.8	ONSITE	17.3	N/A	ONSITE
Misc. Inorganics						
Fluoride (F)	mg/L	0.223	B485632	0.044	0.010	B485632
pH	pH	6.42	B485628	6.09	N/A	B485628
Reactive Silica	mg/L	0.32	B478948	0.19	0.050	B478948
Acidity (pH 4.5)	mg/L	<1.0	B483488	<1.0	1.0	B483488
Alkalinity (Total as CaCO3)	mg/L	38.6	B485624	8.90	0.50	B490982
Total Organic Carbon (C)	mg/L	3.0	B483498	4.3	0.20	B483498
Acidity (pH 8.3)	mg/L	<1.0	B483488	<1.0	1.0	B483488
Alkalinity (PP as CaCO3)	mg/L	<0.50	B485624	<0.50	0.50	B490982
Bicarbonate (HCO3)	mg/L	47.1	B485624	10.9	0.50	B490982
Carbonate (CO3)	mg/L	<0.50	B485624	<0.50	0.50	B490982
Hydroxide (OH)	mg/L	<0.50	B485624	<0.50	0.50	B490982
Total Suspended Solids	mg/L	4.3	B481832	2.4	1.0	B481832
Anions						
Orthophosphate (P)	mg/L	<0.0010	B480573	<0.0010	0.0010	B480573
Chloride (Cl)	mg/L	3.5	B480285	<0.50	0.50	B480285
Dissolved-Low Level Sulphate (SO4)	mg/L	36	B481931	3.9	0.30	B481931
Nutrients						
Total Carbon (C)	mg/L	11	B479333	5.8	0.50	B479333
Total Inorganic Carbon (C)	mg/L	8.2	B483383	1.5	1.0	B483383
Total Phosphorus (P)	mg/L	0.0073	B481955	0.0046	0.0020	B481955
Total Ammonia (N)	mg/L	0.048	B482360	0.010	0.0050	B482360
Nitrite (N)	mg/L	0.0056	B480413	<0.0010	0.0010	B480413

RDL = Reportable Detection Limit
N/A = Not Applicable

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Bureau Veritas Job #: C462640
Report Date: 2024/08/27

Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

RESULTS OF CHEMICAL ANALYSES OF WATER

Bureau Veritas ID		CTI747		CTI748		
Sampling Date		2024/08/12 14:32		2024/08/12 13:30		
COC Number		102032		102032		
	UNITS	**0008-SA3**	**QC Batch**	**0008-SA9B**	**RDL**	**QC Batch**
Nitrate (N)	mg/L	0.84	B480413	<0.0020	0.0020	B480413
Total Nitrogen (N)	mg/L	1.1	B481849	0.34	0.020	B481849
Physical Properties						
Conductivity	uS/cm	180	B485631	33.2	1.0	B485631
Physical Properties						
Turbidity - NTU	NTU	2.3	B479376	1.2	0.10	B479376
RDL = Reportable Detection Limit						

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Bureau Veritas Job #: C462640
Report Date: 2024/08/27

Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

MERCURY BY COLD VAPOR (WATER)

Bureau Veritas ID		CTI744	CTI745	CTI746	CTI747	CTI748		
Sampling Date		2024/08/12 13:27	2024/08/12 15:55	2024/08/12 15:45	2024/08/12 14:32	2024/08/12 13:30		
COC Number		102032	102032	102032	102032	102032		
	UNITS	**0008-494**	**0008-SA103**	**0008-SA10**	**0008-SA3**	**0008-SA9B**	**RDL**	**QC Batch**
Elements								
Total Mercury (Hg)	mg/L	<0.0000019	<0.0000019	<0.0000019	<0.0000019	<0.0000019	0.0000019	B480493
RDL = Reportable Detection Limit								

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Bureau Veritas Job #: C462640
Report Date: 2024/08/27

Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

ELEMENTS BY ATOMIC SPECTROSCOPY (WATER)

Bureau Veritas ID		CTI744	CTI745	CTI746	CTI747	CTI748		
Sampling Date		2024/08/12 13:27	2024/08/12 15:55	2024/08/12 15:45	2024/08/12 14:32	2024/08/12 13:30		
COC Number		102032	102032	102032	102032	102032		
	UNITS	**0008-494**	**0008-SA103**	**0008-SA10**	**0008-SA3**	**0008-SA9B**	**RDL**	**QC Batch**
Elements								
Total Aluminum (Al)	mg/L	<0.0030	0.030	0.025	0.11	0.011	0.0030	B484920
Total Antimony (Sb)	mg/L	<0.00060	<0.00060	<0.00060	<0.00060	<0.00060	0.00060	B484920
Total Arsenic (As)	mg/L	<0.00020	0.00040	0.00033	0.00048	0.00033	0.00020	B484920
Total Barium (Ba)	mg/L	<0.010	0.087	0.086	0.022	<0.010	0.010	B484927
Total Beryllium (Be)	mg/L	<0.0010	<0.0010	<0.0010	<0.0010	<0.0010	0.0010	B484920
Total Boron (B)	mg/L	<0.020	<0.020	<0.020	<0.020	<0.020	0.020	B484927
Total Cadmium (Cd)	mg/L	<0.000020	0.000025	0.000024	<0.000020	<0.000020	0.000020	B484920
Total Calcium (Ca)	mg/L	<0.30	25	25	12	1.9	0.30	B484927
Total Chromium (Cr)	mg/L	<0.0010	<0.0010	<0.0010	<0.0010	<0.0010	0.0010	B484920
Total Cobalt (Co)	mg/L	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030	0.00030	B484920
Total Copper (Cu)	mg/L	<0.0010	<0.0010	<0.0010	<0.0010	<0.0010	0.0010	B484920
Total Iron (Fe)	mg/L	<0.060	<0.060	<0.060	0.23	0.21	0.060	B484927
Total Lead (Pb)	mg/L	0.00025	<0.00020	<0.00020	<0.00020	0.00054	0.00020	B484920
Total Lithium (Li)	mg/L	<0.020	<0.020	0.021	<0.020	<0.020	0.020	B484927
Total Magnesium (Mg)	mg/L	<0.20	23	23	9.3	1.7	0.20	B484927
Total Manganese (Mn)	mg/L	<0.0040	<0.0040	0.0041	0.023	0.016	0.0040	B484927
Total Molybdenum (Mo)	mg/L	<0.00020	0.042	0.039	0.0025	<0.00020	0.00020	B484920
Total Nickel (Ni)	mg/L	<0.00050	0.027	0.025	0.0038	0.00062	0.00050	B484920
Total Potassium (K)	mg/L	<0.30	19	19	6.4	1.2	0.30	B484927
Total Selenium (Se)	mg/L	<0.00020	0.00036	0.00036	<0.00020	<0.00020	0.00020	B484920
Total Silicon (Si)	mg/L	<0.50	<0.50	<0.50	0.52	<0.50	0.50	B484927
Total Silver (Ag)	mg/L	<0.00010	<0.00010	<0.00010	<0.00010	<0.00010	0.00010	B484920
Total Sodium (Na)	mg/L	<0.50	16	16	6.3	1.6	0.50	B484927
Total Strontium (Sr)	mg/L	<0.020	0.29	0.29	0.090	<0.020	0.020	B484927
Total Sulphur (S)	mg/L	<0.20	37	37	12	1.5	0.20	B484927
Total Thallium (Tl)	mg/L	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020	0.00020	B484920
Total Tin (Sn)	mg/L	<0.0010	<0.0010	<0.0010	<0.0010	<0.0010	0.0010	B484920
Total Titanium (Ti)	mg/L	<0.0010	0.0010	0.0011	0.0049	<0.0010	0.0010	B484920
Total Uranium (U)	mg/L	<0.00010	0.0033	0.0031	0.0023	<0.00010	0.00010	B484920
Total Vanadium (V)	mg/L	<0.0010	<0.0010	<0.0010	<0.0010	<0.0010	0.0010	B484920
Total Zinc (Zn)	mg/L	<0.0030	<0.0030	<0.0030	<0.0030	<0.0030	0.0030	B484920
RDL = Reportable Detection Limit								

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GENERAL COMMENTS

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

Package 1	7.0°C
Package 2	6.8°C
Package 3	7.8°C
Package 4	7.7°C

Sample CTI744 [0008-494] : Nitrogen (Nitrite - Nitrate) Low Level completed within five days of sampling. Data is satisfactory for compliance purposes.

Sample CTI745 [0008-SA103] : Nitrogen (Nitrite - Nitrate) Low Level completed within five days of sampling. Data is satisfactory for compliance purposes.

Sample CTI746 [0008-SA10] : Nitrogen (Nitrite - Nitrate) Low Level completed within five days of sampling. Data is satisfactory for compliance purposes.

Sample CTI747 [0008-SA3] : Nitrogen (Nitrite - Nitrate) Low Level completed within five days of sampling. Data is satisfactory for compliance purposes.

Sample CTI748 [0008-SA9B] : Nitrogen (Nitrite - Nitrate) Low Level completed within five days of sampling. Data is satisfactory for compliance purposes.

Results relate only to the items tested.

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Bureau Veritas Job #: C462640
Report Date: 2024/08/27

QUALITY ASSURANCE REPORT

Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

			Matrix Spike		Spiked Blank		Method Blank		RPD		QC Standard	
QC Batch	Parameter	Date	% Recovery	QC Limits	% Recovery	QC Limits	Value	UNITS	Value (%)	QC Limits	% Recovery	QC Limits
B478948	Reactive Silica	2024/08/15	114	80 - 120	103	80 - 120	<0.050	mg/L	5.8	20		
B479376	Turbidity - NTU	2024/08/15			100	80 - 120	<0.10	NTU	NC	20		
B479696	Reactive Silica	2024/08/15	96	80 - 120	106	80 - 120	<0.050	mg/L	20	20		
B480285	Chloride (Cl)	2024/08/16	100	80 - 120	100	80 - 120	<0.50	mg/L	1.9	20		
B480397	Total Ammonia (N)	2024/08/16	80	80 - 120	104	80 - 120	<0.0050	mg/L	1.4	20		
B480413	Nitrate (N)	2024/08/16	101	80 - 120	98	80 - 120	<0.0020	mg/L	0.017	20		
B480413	Nitrite (N)	2024/08/16	97	80 - 120	92	80 - 120	<0.0010	mg/L	0.92	20		
B480493	Total Mercury (Hg)	2024/08/17	97	80 - 120	96	80 - 120	<0.0000019	mg/L	NC	20		
B480573	Orthophosphate (P)	2024/08/16	90	80 - 120	99	80 - 120	<0.0010	mg/L	NC	20		
B481832	Total Suspended Solids	2024/08/19	99	80 - 120	93	80 - 120	<0.99	mg/L	19	20		
B481849	Total Nitrogen (N)	2024/08/21	114	80 - 120	95	80 - 120	<0.020	mg/L	NC	20	94	80 - 120
B481931	Dissolved-Low Level Sulphate (SO4)	2024/08/17	NC	80 - 120	100	80 - 120	<0.050	mg/L	0.10	20		
B481955	Total Phosphorus (P)	2024/08/19	97	80 - 120	98	80 - 120	<0.0010	mg/L	NC	20	93	80 - 120
B482360	Total Ammonia (N)	2024/08/18	114	80 - 120	102	80 - 120	<0.0050	mg/L	NC	20		
B483383	Total Inorganic Carbon (C)	2024/08/19	126 (1)	80 - 120	109	80 - 120	<1.0	mg/L				
B483488	Acidity (pH 4.5)	2024/08/19					<1.0	mg/L	NC	20		
B483488	Acidity (pH 8.3)	2024/08/19			101	80 - 120	<1.0	mg/L	NC	20		
B483498	Total Organic Carbon (C)	2024/08/20	98	75 - 125	102	80 - 120	<0.20	mg/L	NC	20		
B484920	Total Aluminum (Al)	2024/08/20	109	80 - 120	105	80 - 120	<0.0030	mg/L	NC	20		
B484920	Total Antimony (Sb)	2024/08/20	105	80 - 120	102	80 - 120	<0.00060	mg/L	NC	20		
B484920	Total Arsenic (As)	2024/08/20	103	80 - 120	103	80 - 120	<0.00020	mg/L	NC	20		
B484920	Total Beryllium (Be)	2024/08/20	100	80 - 120	97	80 - 120	<0.0010	mg/L	NC	20		
B484920	Total Cadmium (Cd)	2024/08/20	106	80 - 120	104	80 - 120	<0.000020	mg/L				
B484920	Total Chromium (Cr)	2024/08/20	100	80 - 120	100	80 - 120	<0.0010	mg/L	NC	20		
B484920	Total Cobalt (Co)	2024/08/20	103	80 - 120	104	80 - 120	<0.00030	mg/L	NC	20		
B484920	Total Copper (Cu)	2024/08/20	101	80 - 120	103	80 - 120	<0.0010	mg/L	NC	20		
B484920	Total Lead (Pb)	2024/08/20	102	80 - 120	103	80 - 120	<0.00020	mg/L	NC	20		
B484920	Total Molybdenum (Mo)	2024/08/20	105	80 - 120	102	80 - 120	<0.00020	mg/L	NC	20		
B484920	Total Nickel (Ni)	2024/08/20	101	80 - 120	102	80 - 120	<0.00050	mg/L	NC	20		
B484920	Total Selenium (Se)	2024/08/20	104	80 - 120	107	80 - 120	<0.00020	mg/L	NC	20		
B484920	Total Silver (Ag)	2024/08/20	102	80 - 120	101	80 - 120	<0.00010	mg/L	NC	20		
B484920	Total Thallium (Tl)	2024/08/20	106	80 - 120	105	80 - 120	<0.00020	mg/L	NC	20		
B484920	Total Tin (Sn)	2024/08/20	106	80 - 120	102	80 - 120	<0.0010	mg/L	NC	20		

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Bureau Veritas Job #: C462640
Report Date: 2024/08/27

QUALITY ASSURANCE REPORT(CONT'D)

Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

			Matrix Spike		Spiked Blank		Method Blank		RPD		QC Standard	
QC Batch	Parameter	Date	% Recovery	QC Limits	% Recovery	QC Limits	Value	UNITS	Value (%)	QC Limits	% Recovery	QC Limits
B484920	Total Titanium (Ti)	2024/08/20	101	80 - 120	99	80 - 120	<0.0010	mg/L	NC	20		
B484920	Total Uranium (U)	2024/08/20	104	80 - 120	101	80 - 120	<0.00010	mg/L	NC	20		
B484920	Total Vanadium (V)	2024/08/20	103	80 - 120	101	80 - 120	<0.0010	mg/L	NC	20		
B484920	Total Zinc (Zn)	2024/08/20	100	80 - 120	101	80 - 120	<0.0030	mg/L	NC	20		
B484927	Total Barium (Ba)	2024/08/20	97	80 - 120	95	80 - 120	<0.010	mg/L	NC	20		
B484927	Total Boron (B)	2024/08/20	98	80 - 120	96	80 - 120	<0.020	mg/L	NC	20		
B484927	Total Calcium (Ca)	2024/08/20	NC	80 - 120	96	80 - 120	<0.30	mg/L	NC	20		
B484927	Total Iron (Fe)	2024/08/20	102	80 - 120	101	80 - 120	<0.060	mg/L	NC	20		
B484927	Total Lithium (Li)	2024/08/20	90	80 - 120	89	80 - 120	<0.020	mg/L	NC	20		
B484927	Total Magnesium (Mg)	2024/08/20	99	80 - 120	97	80 - 120	<0.20	mg/L	NC	20		
B484927	Total Manganese (Mn)	2024/08/20	99	80 - 120	99	80 - 120	<0.0040	mg/L	NC	20		
B484927	Total Potassium (K)	2024/08/20	98	80 - 120	96	80 - 120	<0.30	mg/L	NC	20		
B484927	Total Silicon (Si)	2024/08/20	97	80 - 120	96	80 - 120	<0.50	mg/L	NC	20		
B484927	Total Sodium (Na)	2024/08/20	99	80 - 120	97	80 - 120	<0.50	mg/L	NC	20		
B484927	Total Strontium (Sr)	2024/08/20	94	80 - 120	91	80 - 120	<0.020	mg/L	NC	20		
B484927	Total Sulphur (S)	2024/08/20	96	80 - 120	94	80 - 120	<0.20	mg/L	NC	20		
B485624	Alkalinity (PP as CaCO3)	2024/08/21					<0.50	mg/L	NC	20		
B485624	Alkalinity (Total as CaCO3)	2024/08/21			101	80 - 120	<0.50	mg/L	5.1	20		
B485624	Bicarbonate (HCO3)	2024/08/21					<0.50	mg/L	5.1	20		
B485624	Carbonate (CO3)	2024/08/21					<0.50	mg/L	NC	20		
B485624	Hydroxide (OH)	2024/08/21					<0.50	mg/L	NC	20		
B485628	pH	2024/08/21			99	97 - 103			3.0	N/A		
B485631	Conductivity	2024/08/21			103	90 - 110	<1.0	uS/cm	0.47	20		
B485632	Fluoride (F)	2024/08/21	108	80 - 120	107	80 - 120	<0.010	mg/L	9.3	20		
B490982	Alkalinity (PP as CaCO3)	2024/08/26					<0.50	mg/L	NC	20		
B490982	Alkalinity (Total as CaCO3)	2024/08/26			104	80 - 120	<0.50	mg/L	12	20		
B490982	Bicarbonate (HCO3)	2024/08/26					<0.50	mg/L	12	20		
B490982	Carbonate (CO3)	2024/08/26					<0.50	mg/L	NC	20		

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Bureau Veritas Job #: C462640
Report Date: 2024/08/27

QUALITY ASSURANCE REPORT(CONT'D)

Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

			Matrix Spike		Spiked Blank		Method Blank		RPD		QC Standard	
QC Batch	Parameter	Date	% Recovery	QC Limits	% Recovery	QC Limits	Value	UNITS	Value (%)	QC Limits	% Recovery	QC Limits
B490982	Hydroxide (OH)	2024/08/26					<0.50	mg/L	NC	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) Recovery or RPD for this parameter is outside control limits. The overall quality control for this analysis meets acceptability criteria.

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Bureau Veritas Job #: C462640
Report Date: 2024/08/27

Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

VALIDATION SIGNATURE PAGE

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

Ghayasuddin Khan, M.Sc., P.Chem., QP, Scientific Specialist, Inorganics

Sandy Yuan, M.Sc., QP, Scientific Specialist

Bureau Veritas 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 Signatures page if included, otherwise available by request. For Department specific Analyst/Supervisor validation names, please refer to the Test Summary section if included, otherwise available by request. This report is authorized by Scott Cantwell, General Manager responsible for Alberta Environmental laboratory operations.

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

C462640
2024/08/15 10:00

BUREAU VERITAS

ADDITIONAL COOLER TEMPERATURE RECORD

CHAIN-OF-CUSTODY RECORD

CHAIN OF CUSTODY #	
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COOLER OBSERVATIONS:

BV JOB#:

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	7.1	6.9	7.0
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	6.8	6.1	7.5
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	7.8	7.6	8.1
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	8.1	8.2	6.9
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						

RECEIVED BY (SIGN & PRINT)		DATE (YYYY/MM/DD)	TIME (HH:MM)
[signature]	SEAN ENZ	2024/08/15	1000

C462640
2024/08/15 10:00

CHAIN OF CUSTODY FORM

COC# 102032

SO#

BUREAU VERITAS

Burgundy Diamond Mines
900 - 606 4 Street SW, Calgary, Alberta, Canada T2P 1T1
Tel: 867-880-4400 ext 2157
Burgundy Contact: Richard Ehlert / Jonah Kelly

BURGUNDY DIAMOND MINES

ANALYSIS REQUESTED
Indicate Filtered (F), Preserved (P) or Filtered and Preserved (F/P) below

For Lab Use	SAMPLE INFORMATION						Major Ions	SNP Total Nutrients	Standard Total Metals															pH Field (pH)	Water Temp (°C)
	Sample Point	Station Type	Date	Time	Matrix	Type																			
	0008-494	EKA 2002 0008	12-Aug-2024	13:27	Water	SNP	Y	Y	Y																
	0008-Sa103	EKA 2002 0008	12-Aug-2024	15:55	Water	SNP	Y	Y	Y															7.81	16.7
	0008-Sa10	EKA 2002 0008	12-Aug-2024	15:45	Water	SNP	Y	Y	Y															7.81	16.7
	0008-Sa3	EKA 2002 0008	12-Aug-2024	14:32	Water	SNP	Y	Y	Y															7.37	17.8
	0008-Sa9b	EKA 2002 0008	12-Aug-2024	13:30	Water	SNP	Y	Y	Y															7.13	17.3

FOR LAB USE ONLY

MCAL-2024-08-1547

Special Instructions (Billing details, QC reporting etc):
Frequency: On the first day of Discharge, weekly during periods of Discharge, and on the final day of Discharge.
Parameters: TSS, major ion, physical parameters, total metals and nutrients.
*** Sample :0008-Sa3, 0008-Sa9b with Profil, 0008-Sa10***
Sent results to Tania.robitaille@burgundydiamonds.com, Landon.Murphy@burgundydiamonds.com & compliance.team@burgundydiamonds.com

Relinquished by:	Date / Time	Received by:	Date / Time
[signature]	Date 14-Aug-2024	[signature] SEAN ENL	Date 2024/08/15
	Time		Time 10:00
Relinquished by:	Date / Time	Received by:	Date / Time

FOR LAB USE ONLY

Cooler seal intact upon receipt?	Sample temperature upon receipt:
☐ Yes ☐ No ☐ N/A	Frozen? ☐ Yes ☐ No

ACTR

Send Analytical Results to: compliance.team@burgundydiamonds.com

Your P.O. #: 6404002992
Your Project #: 61052
Site Location: MDMER/SNP/SEEPAGE
Your C.O.C. #: 102057

Attention: COMPLIANCE TEAM

Arctic Canadian Diamond Company Ltd
900, 606 4 Street SW
Calgary, AB
CANADA T2P 1T1

Report Date: 2024/09/06
Report #: R3552428
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C464875
Received: 2024/08/22, 09:30

Sample Matrix: Water
Samples Received: 3

Analyses	Quantity	Date Extracted	Date Analyzed	Laboratory Method	Analytical Method
Acidity pH 4.5 & pH 8.3 (as CaCO3)	3	N/A	2024/08/23	AB SOP-00005	SM 24 2310 B m
Alkalinity - Low Level	1	N/A	2024/08/26	AB SOP-00005	SM 24 2320 B m
Alkalinity - Low Level	2	N/A	2024/08/30	AB SOP-00005	SM 24 2320 B m
Low level chloride/sulphate by AC	3	N/A	2024/08/23	AB SOP-00020	SM24-4500-Cl/SO4-E m
Conductance - Low Level	1	N/A	2024/08/26	AB SOP-00005	SM 24 2510 B m
Conductance - Low Level	2	N/A	2024/08/30	AB SOP-00005	SM 24 2510 B m
Fluoride - Low Level	1	N/A	2024/08/26	AB SOP-00005	SM 24 4500-F C m
Fluoride - Low Level	2	N/A	2024/08/30	AB SOP-00005	SM 24 4500-F C m
Hardness Total (calculated as CaCO3) (1)	3	N/A	2024/09/04	BBY WI-00033	Auto Calc
Mercury (Total) by CV	3	2024/08/28	2024/08/29	AB SOP-00084	BCMOE BCLM Oct2013 m
Elements by ICP - Total	3	2024/09/03	2024/09/03	AB SOP-00014 / AB SOP-00042	EPA 6010d R5 m
Elements by ICPMS - Total	3	2024/09/03	2024/09/03	AB SOP-00014 / AB SOP-00043	EPA 6020b R2 m
Ammonia-N Low Level (Preserved)	3	N/A	2024/08/23	AB SOP-00007	SM 24 4500 NH3 A G m
Nitrate + Nitrite-N (calculated) Low Lev	3	N/A	2024/08/27		Auto Calc
Nitrogen (Nitrite - Nitrate) Low Level	3	N/A	2024/08/23	AB SOP-00023	SM 24 4110 B m
pH @25°C (2)	1	N/A	2024/08/26	AB SOP-00005	SM 24 4500-H+B m
pH @25°C (2)	2	N/A	2024/08/30	AB SOP-00005	SM 24 4500-H+B m
pH (Field)	3	N/A	2024/08/22	Field Test	Field Test
Orthophosphate LL by Automated Analyzer (3)	3	N/A	2024/08/23	AB SOP-00025	SM 24 4500-P A, F m
Silica (Reactive)	3	N/A	2024/08/26	AB SOP-00011	EPA 370.1 R1978 m
Sulphate (SO4) by IC	3	N/A	2024/08/23	AB SOP-00026	SM 24 4110 B m
Carbon (total) (Calc. - Org. + Inorg.)	1	N/A	2024/09/03		Auto Calc
Carbon (total) (Calc. - Org. + Inorg.)	2	N/A	2024/09/06		Auto Calc
Temperature (Field)	3	N/A	2024/08/22	Field Test	Field Test
Carbon (Inorganic)	2	N/A	2024/08/26	CAL SOP-00076	Modified AE 2411
Carbon (Inorganic)	1	N/A	2024/09/03	CAL SOP-00076	Modified AE 2411
Total Kjeldahl Nitrogen (Total)	3	N/A	2024/08/30	BBY WI-00033	Auto Calc
Nitrogen (Total)	3	2024/08/30	2024/08/30	AB SOP-00093	SM 24 4500-N C m
Carbon (Total Organic) (4)	1	N/A	2024/09/03	AB SOP-00087	MMCW 119 1996 m
Carbon (Total Organic) (4)	2	N/A	2024/09/05	AB SOP-00087	MMCW 119 1996 m

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Your P.O. #: 6404002992
Your Project #: 61052
Site Location: MDMER/SNP/SEEPAGE
Your C.O.C. #: 102057

Attention: COMPLIANCE TEAM

Arctic Canadian Diamond Company Ltd
900, 606 4 Street SW
Calgary, AB
CANADA T2P 1T1

Report Date: 2024/09/06
Report #: R3552428
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C464875
Received: 2024/08/22, 09:30

Sample Matrix: Water
Samples Received: 3

Analyses	Quantity	Date Extracted	Date Analyzed	Laboratory Method	Analytical Method
Total Phosphorus Low Level Total	3	2024/08/30	2024/08/30	AB SOP-00024	SM 24 4500-P A,B,F m
Total Suspended Solids (NFR)	3	2024/08/25	2024/08/27	AB SOP-00061	SM 24 2540 D m
Turbidity	3	N/A	2024/08/22	CAL SOP-00081	SM 24 2130 B m
Ion Balance (5)	3	N/A	2024/09/04		
Total Dissolved Solids (Calculated) (5)	3	N/A	2024/09/04		

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, EPA, APHA or the Quebec Ministry of Environment.

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.
This Certificate shall not be reproduced except in full, without the written approval of the laboratory.
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) "Total Hardness" was calculated from Total Ca and Mg concentrations and may be biased high (Hardness, or Dissolved Hardness, calculated from Dissolved Ca and Mg, should be used for compliance if available).
(2) The CCME method requires pH to be analysed within 15 minutes of sampling and therefore field analysis is required for compliance. All Laboratory pH analyses in this report are reported past the CCME holding time. Bureau Veritas endeavours to analyze samples as soon as possible after receipt.
(3) Orthophosphate > Total Phosphorus Imbalance: When applicable, Orthophosphate, Total Phosphorus and dissolved Phosphorus results were reviewed and data quality meets acceptable levels unless otherwise noted.
(4) TOC present in the sample should be considered as non-purgeable TOC.
(5) Calculation was conducted as per client request using CAL PDF-00333.

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Your P.O. #: 6404002992
Your Project #: 61052
Site Location: MDMER/SNP/SEEPAGE
Your C.O.C. #: 102057

Attention: COMPLIANCE TEAM

Arctic Canadian Diamond Company Ltd
900, 606 4 Street SW
Calgary, AB
CANADA T2P 1T1

Report Date: 2024/09/06
Report #: R3552428
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C464875
Received: 2024/08/22, 09:30

Encryption Key

Please direct all questions regarding this Certificate of Analysis to:
Geraldlyn Gouthro, Key Account Specialist
Email: geraldlyn.gouthro@bureauveritas.com
Phone# (403) 291-3077
==========
This report has been generated and distributed using a secure automated process.
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Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Bureau Veritas Job #: C464875
Report Date: 2024/09/06

Arctic Canadian Diamond Company Ltd
Client Project #: 61052
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

RESULTS OF CHEMICAL ANALYSES OF WATER

Bureau Veritas ID		CTV129			CTV130			CTV131		
Sampling Date		2024/08/19 15:30			2024/08/19 15:19			2024/08/19 14:23		
COC Number		102057			102057			102057		
	UNITS	**0008-SA10**	**RDL**	**QC Batch**	**0008-SA3**	**RDL**	**QC Batch**	**0008-SA9B**	**RDL**	**QC Batch**
Calculated Parameters										
Total Hardness (CaCO3)	mg/L	145	0.50	B488379	63.5	0.50	B488379	13.7	0.50	B488379
Calculated Ion Balance (% Difference)	%	2.3		B488293	6.5		B488293	3.8		B488293
Nitrate plus Nitrite (N)	mg/L	17	0.011	B488259	1.1	0.0022	B488259	0.0040	0.0022	B488259
Calculated Total Dissolved Solids	mg/L	280	1.8	B488296	110	0.95	B488296	21	0.95	B488296
Total Total Kjeldahl Nitrogen (Calc)	mg/L	<0.20	0.20	B487630	0.36	0.020	B488384	0.42	0.020	B488384
Field Parameters										
Field pH	pH	8.11	N/A	ONSITE	7.27	N/A	ONSITE	7.50	N/A	ONSITE
Field Temperature (Fd)	deg. C	16.2	N/A	ONSITE	15.3	N/A	ONSITE	14.0	N/A	ONSITE
Misc. Inorganics										
Fluoride (F)	mg/L	0.170	0.010	B498600	0.212	0.010	B490987	0.059	0.010	B498600
pH	pH	6.81	N/A	B498595	6.48	N/A	B490985	6.60	N/A	B498595
Reactive Silica	mg/L	0.57	0.050	B491853	0.37	0.050	B491853	0.29	0.050	B491853
Acidity (pH 4.5)	mg/L	<1.0	1.0	B488934	<1.0	1.0	B488934	<1.0	1.0	B488934
Alkalinity (Total as CaCO3)	mg/L	23.4	0.50	B498587	46.8	0.50	B490982	11.4	0.50	B498587
Total Organic Carbon (C)	mg/L	2.0	0.20	B503694	3.0	0.20	B501048	4.9	0.20	B503694
Acidity (pH 8.3)	mg/L	1.4	1.0	B488934	1.5	1.0	B488934	1.5	1.0	B488934
Alkalinity (PP as CaCO3)	mg/L	<0.50	0.50	B498587	<0.50	0.50	B490982	<0.50	0.50	B498587
Bicarbonate (HCO3)	mg/L	28.5	0.50	B498587	57.1	0.50	B490982	13.9	0.50	B498587
Carbonate (CO3)	mg/L	<0.50	0.50	B498587	<0.50	0.50	B490982	<0.50	0.50	B498587
Hydroxide (OH)	mg/L	<0.50	0.50	B498587	<0.50	0.50	B490982	<0.50	0.50	B498587
Total Suspended Solids	mg/L	<1.0	1.0	B491133	<0.99	0.99	B491133	2.4	1.0	B491133
Anions										
Orthophosphate (P)	mg/L	<0.0010	0.0010	B489676	<0.0010	0.0010	B489676	<0.0010	0.0010	B489676
Chloride (Cl)	mg/L	9.0	0.50	B490106	3.9	0.50	B490106	<0.50	0.50	B490106
Dissolved-Low Level Sulphate (SO4)	mg/L	110	1.5	B489369	38	0.30	B489369	6.6	0.30	B489369
Nutrients										
Total Carbon (C)	mg/L	7.0	0.50	B488288	11	0.50	B488288	7.3	0.50	B488288
Total Inorganic Carbon (C)	mg/L	5.0	1.0	B492012	8.3	1.0	B498271	2.3	1.0	B492012
Total Phosphorus (P)	mg/L	<0.0020	0.0020	B497906	0.0032	0.0020	B497906	0.0056	0.0020	B497906
Total Ammonia (N)	mg/L	0.0097	0.0050	B489310	0.018	0.0050	B489310	<0.0050	0.0050	B489310
Nitrite (N)	mg/L	0.054	0.0050	B488847	0.0056	0.0010	B488847	<0.0010	0.0010	B488847

RDL = Reportable Detection Limit
N/A = Not Applicable

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Bureau Veritas Job #: C464875
Report Date: 2024/09/06

Arctic Canadian Diamond Company Ltd
Client Project #: 61052
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

RESULTS OF CHEMICAL ANALYSES OF WATER

Bureau Veritas ID		CTV129			CTV130			CTV131		
Sampling Date		2024/08/19 15:30			2024/08/19 15:19			2024/08/19 14:23		
COC Number		102057			102057			102057		
	UNITS	**0008-SA10**	**RDL**	**QC Batch**	**0008-SA3**	**RDL**	**QC Batch**	**0008-SA9B**	**RDL**	**QC Batch**
Nitrate (N)	mg/L	17	0.010	B488847	1.1	0.0020	B488847	0.0040	0.0020	B488847
Total Nitrogen (N)	mg/L	17 (1)	0.20	B497639	1.5	0.020	B497639	0.43	0.020	B497639
Physical Properties										
Conductivity	uS/cm	461	1.0	B498597	181	1.0	B490986	44.3	1.0	B498597
Physical Properties										
Turbidity - NTU	NTU	0.11	0.10	B488627	<0.10	0.10	B488627	1.4	0.10	B488627

RDL = Reportable Detection Limit

(1) Due to the sample matrix, sample required dilution. Detection limit was adjusted accordingly. Nitrogen < Nitrate: Both values fall within the method uncertainty for duplicates and are likely equivalent.

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Bureau Veritas Job #: C464875
Report Date: 2024/09/06

Arctic Canadian Diamond Company Ltd
Client Project #: 61052
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

MERCURY BY COLD VAPOR (WATER)

Bureau Veritas ID		CTV129	CTV130	CTV131		
Sampling Date		2024/08/19 15:30	2024/08/19 15:19	2024/08/19 14:23		
COC Number		102057	102057	102057		
	UNITS	**0008-SA10**	**0008-SA3**	**0008-SA9B**	**RDL**	**QC Batch**
Elements						
Total Mercury (Hg)	mg/L	<0.0000019	<0.0000019	<0.0000019	0.0000019	B494951
RDL = Reportable Detection Limit						

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Bureau Veritas Job #: C464875
Report Date: 2024/09/06

Arctic Canadian Diamond Company Ltd
Client Project #: 61052
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

ELEMENTS BY ATOMIC SPECTROSCOPY (WATER)

Bureau Veritas ID		CTV129		CTV130		CTV131		
Sampling Date		2024/08/19 15:30		2024/08/19 15:19		2024/08/19 14:23		
COC Number		102057		102057		102057		
	UNITS	**0008-SA10**	**RDL**	**0008-SA3**	**RDL**	**0008-SA9B**	**RDL**	**QC Batch**
Elements								
Total Aluminum (Al)	mg/L	0.027	0.0030	0.038	0.0060	0.0091	0.0030	B500486
Total Antimony (Sb)	mg/L	<0.00060	0.00060	<0.00060	0.00060	<0.00060	0.00060	B500486
Total Arsenic (As)	mg/L	0.00036	0.00020	0.00050	0.00020	0.00029	0.00020	B500486
Total Barium (Ba)	mg/L	0.083	0.010	0.020	0.010	<0.010	0.010	B500492
Total Beryllium (Be)	mg/L	<0.0010	0.0010	<0.0010	0.0010	<0.0010	0.0010	B500486
Total Boron (B)	mg/L	<0.020	0.020	<0.020	0.020	<0.020	0.020	B500492
Total Cadmium (Cd)	mg/L	<0.000020	0.000020	<0.000020	0.000020	<0.000020	0.000020	B500486
Total Calcium (Ca)	mg/L	23	0.30	11	0.30	2.2	0.30	B500492
Total Chromium (Cr)	mg/L	<0.0010	0.0010	<0.0010	0.0010	<0.0010	0.0010	B500486
Total Cobalt (Co)	mg/L	<0.00030	0.00030	<0.00030	0.00030	<0.00030	0.00030	B500486
Total Copper (Cu)	mg/L	<0.0010	0.0010	<0.0010	0.0010	<0.0010	0.0010	B500486
Total Iron (Fe)	mg/L	<0.060	0.060	0.10	0.060	0.14	0.060	B500492
Total Lead (Pb)	mg/L	<0.00020	0.00020	<0.00020	0.00020	<0.00020	0.00020	B500486
Total Lithium (Li)	mg/L	<0.020	0.020	<0.020	0.020	<0.020	0.020	B500492
Total Magnesium (Mg)	mg/L	21	0.20	9.0	0.20	2.0	0.20	B500492
Total Manganese (Mn)	mg/L	<0.0040	0.0040	0.016	0.0040	0.014	0.0040	B500492
Total Molybdenum (Mo)	mg/L	0.042	0.00020	0.0034	0.00020	0.00021	0.00020	B500486
Total Nickel (Ni)	mg/L	0.025	0.00050	0.0034	0.00050	0.00082	0.00050	B500486
Total Potassium (K)	mg/L	18	0.30	6.1	0.30	1.4	0.30	B500492
Total Selenium (Se)	mg/L	0.00031	0.00020	<0.00020	0.00020	<0.00020	0.00020	B500486
Total Silicon (Si)	mg/L	<0.50	0.50	<0.50	0.50	<0.50	0.50	B500492
Total Silver (Ag)	mg/L	<0.00010	0.00010	<0.00010	0.00010	<0.00010	0.00010	B500486
Total Sodium (Na)	mg/L	14	0.50	5.9	0.50	1.9	0.50	B500492
Total Strontium (Sr)	mg/L	0.29	0.020	0.092	0.020	<0.020	0.020	B500492
Total Sulphur (S)	mg/L	33	0.20	11	0.20	2.0	0.20	B500492
Total Thallium (Tl)	mg/L	<0.00020	0.00020	<0.00020	0.00020	<0.00020	0.00020	B500486
Total Tin (Sn)	mg/L	<0.0010	0.0010	<0.0010	0.0010	<0.0010	0.0010	B500486
Total Titanium (Ti)	mg/L	<0.0010	0.0010	0.0011	0.0010	<0.0010	0.0010	B500486
Total Uranium (U)	mg/L	0.0037	0.00010	0.0024	0.00010	<0.00010	0.00010	B500486
Total Vanadium (V)	mg/L	<0.0010	0.0010	<0.0010	0.0010	<0.0010	0.0010	B500486
Total Zinc (Zn)	mg/L	<0.0030	0.0030	<0.0030	0.0030	<0.0030	0.0030	B500486

RDL = Reportable Detection Limit

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GENERAL COMMENTS

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

Package 1	11.4°C
Package 2	9.3°C
Package 3	8.6°C
Package 4	9.5°C
Package 5	8.2°C
Package 6	6.7°C
Package 7	7.6°C
Package 8	8.6°C
Package 9	6.7°C
Package 10	4.8°C
Package 11	7.6°C
Package 12	7.1°C
Package 13	7.7°C
Package 14	10.0°C
Package 15	9.3°C
Package 16	4.7°C
Package 17	8.7°C
Package 18	7.3°C
Package 19	7.4°C
Package 20	7.2°C
Package 21	8.4°C
Package 22	8.7°C
Package 23	7.2°C
Package 24	5.5°C
Package 25	6.8°C

Sample CTV129 [0008-SA10] : Nitrogen (Nitrite - Nitrate) Low Level completed within five days of sampling. Data is satisfactory for compliance purposes.

Sample CTV130 [0008-SA3] : Nitrogen (Nitrite - Nitrate) Low Level completed within five days of sampling. Data is satisfactory for compliance purposes. Sample was analyzed past method specified hold time for Carbon (Inorganic). Exceedance of hold time increases the uncertainty of test results but does not necessarily imply that results are compromised.

Sample CTV131 [0008-SA9B] : Nitrogen (Nitrite - Nitrate) Low Level completed within five days of sampling. Data is satisfactory for compliance purposes.

Results relate only to the items tested.

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Bureau Veritas Job #: C464875
Report Date: 2024/09/06

QUALITY ASSURANCE REPORT

Arctic Canadian Diamond Company Ltd
Client Project #: 61052
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

			Matrix Spike		Spiked Blank		Method Blank		RPD		QC Standard	
QC Batch	Parameter	Date	% Recovery	QC Limits	% Recovery	QC Limits	Value	UNITS	Value (%)	QC Limits	% Recovery	QC Limits
B488627	Turbidity - NTU	2024/08/22			100	80 - 120	<0.10	NTU	0.47	20		
B488847	Nitrate (N)	2024/08/22	105	80 - 120	101	80 - 120	<0.0020	mg/L	1.4	20		
B488847	Nitrite (N)	2024/08/22	103	80 - 120	96	80 - 120	<0.0010	mg/L	NC	20		
B488934	Acidity (pH 4.5)	2024/08/23					<1.0	mg/L	NC	20		
B488934	Acidity (pH 8.3)	2024/08/23			101	80 - 120	<1.0	mg/L	NC	20		
B489310	Total Ammonia (N)	2024/08/23	88	80 - 120	110	80 - 120	<0.0050	mg/L	1.9	20		
B489369	Dissolved-Low Level Sulphate (SO4)	2024/08/23	101	80 - 120	100	80 - 120	<0.050	mg/L	0.69	20		
B489676	Orthophosphate (P)	2024/08/23	96	80 - 120	103	80 - 120	0.0015, RDL=0.0010 (1)	mg/L	NC	20		
B490106	Chloride (Cl)	2024/08/23	107	80 - 120	102	80 - 120	<0.50	mg/L	4.5	20		
B490982	Alkalinity (PP as CaCO3)	2024/08/26					<0.50	mg/L	NC	20		
B490982	Alkalinity (Total as CaCO3)	2024/08/26			104	80 - 120	<0.50	mg/L	12	20		
B490982	Bicarbonate (HCO3)	2024/08/26					<0.50	mg/L	12	20		
B490982	Carbonate (CO3)	2024/08/26					<0.50	mg/L	NC	20		
B490982	Hydroxide (OH)	2024/08/26					<0.50	mg/L	NC	20		
B490985	pH	2024/08/26			100	97 - 103			1.2	N/A		
B490986	Conductivity	2024/08/26			99	90 - 110	<1.0	uS/cm	0.77	20		
B490987	Fluoride (F)	2024/08/26	96	80 - 120	94	80 - 120	<0.010	mg/L	0.28	20		
B491133	Total Suspended Solids	2024/08/27	114	80 - 120	92	80 - 120	<1.0	mg/L	NC	20		
B491853	Reactive Silica	2024/08/26	69 (2)	80 - 120	106	80 - 120	<0.050	mg/L	0.73	20		
B492012	Total Inorganic Carbon (C)	2024/08/26	NC	80 - 120	102	80 - 120	<1.0	mg/L	0.97	20		
B494951	Total Mercury (Hg)	2024/08/29	97	80 - 120	97	80 - 120	<0.0000019	mg/L	NC	20		
B497639	Total Nitrogen (N)	2024/08/30	NC	80 - 120	106	80 - 120	<0.020	mg/L	1.8	20	108	80 - 120
B497906	Total Phosphorus (P)	2024/09/03	97	80 - 120	97	80 - 120	<0.0010	mg/L	14	20	89	80 - 120
B498271	Total Inorganic Carbon (C)	2024/09/03	NC	80 - 120	110	80 - 120	<1.0	mg/L	0.71	20		
B498587	Alkalinity (PP as CaCO3)	2024/08/30					<0.50	mg/L	NC	20		
B498587	Alkalinity (Total as CaCO3)	2024/08/30			100	80 - 120	0.78, RDL=0.50 (1)	mg/L	7.4	20		
B498587	Bicarbonate (HCO3)	2024/08/30					0.95, RDL=0.50	mg/L	7.4	20		
B498587	Carbonate (CO3)	2024/08/30					<0.50	mg/L	NC	20		
B498587	Hydroxide (OH)	2024/08/30					<0.50	mg/L	NC	20		

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Bureau Veritas Job #: C464875
Report Date: 2024/09/06

QUALITY ASSURANCE REPORT(CONT'D)

Arctic Canadian Diamond Company Ltd
Client Project #: 61052
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

			Matrix Spike		Spiked Blank		Method Blank		RPD		QC Standard	
QC Batch	Parameter	Date	% Recovery	QC Limits	% Recovery	QC Limits	Value	UNITS	Value (%)	QC Limits	% Recovery	QC Limits
B498595	pH	2024/08/30			100	97 - 103			1.5	N/A		
B498597	Conductivity	2024/08/30			102	90 - 110	<1.0	uS/cm	0	20		
B498600	Fluoride (F)	2024/09/03	86	80 - 120	89	80 - 120	<0.010	mg/L	15	20		
B500486	Total Aluminum (Al)	2024/09/03	159 (2)	80 - 120	115	80 - 120	<0.0030	mg/L	4.6	20		
B500486	Total Antimony (Sb)	2024/09/03	100	80 - 120	98	80 - 120	<0.00060	mg/L	NC	20		
B500486	Total Arsenic (As)	2024/09/03	93	80 - 120	98	80 - 120	<0.00020	mg/L	12	20		
B500486	Total Beryllium (Be)	2024/09/03	97	80 - 120	103	80 - 120	<0.0010	mg/L	NC	20		
B500486	Total Cadmium (Cd)	2024/09/03	98	80 - 120	100	80 - 120	<0.000020	mg/L	NC	20		
B500486	Total Chromium (Cr)	2024/09/03	100	80 - 120	107	80 - 120	<0.0010	mg/L	NC	20		
B500486	Total Cobalt (Co)	2024/09/03	100	80 - 120	108	80 - 120	<0.00030	mg/L	NC	20		
B500486	Total Copper (Cu)	2024/09/03	96	80 - 120	106	80 - 120	<0.0010	mg/L	NC	20		
B500486	Total Lead (Pb)	2024/09/03	96	80 - 120	103	80 - 120	<0.00020	mg/L	NC	20		
B500486	Total Molybdenum (Mo)	2024/09/03	111	80 - 120	101	80 - 120	<0.00020	mg/L	2.9	20		
B500486	Total Nickel (Ni)	2024/09/03	99	80 - 120	107	80 - 120	<0.00050	mg/L	1.5	20		
B500486	Total Selenium (Se)	2024/09/03	90	80 - 120	96	80 - 120	<0.00020	mg/L	NC	20		
B500486	Total Silver (Ag)	2024/09/03	99	80 - 120	103	80 - 120	<0.00010	mg/L	NC	20		
B500486	Total Thallium (Tl)	2024/09/03	100	80 - 120	106	80 - 120	<0.00020	mg/L	NC	20		
B500486	Total Tin (Sn)	2024/09/03	108	80 - 120	101	80 - 120	<0.0010	mg/L	NC	20		
B500486	Total Titanium (Ti)	2024/09/03	109	80 - 120	104	80 - 120	<0.0010	mg/L	NC	20		
B500486	Total Uranium (U)	2024/09/03	102	80 - 120	107	80 - 120	<0.00010	mg/L	2.9	20		
B500486	Total Vanadium (V)	2024/09/03	101	80 - 120	106	80 - 120	<0.0010	mg/L	NC	20		
B500486	Total Zinc (Zn)	2024/09/03	91	80 - 120	97	80 - 120	<0.0030	mg/L	NC	20		
B500492	Total Barium (Ba)	2024/09/03	101	80 - 120	100	80 - 120	<0.010	mg/L	3.6	20		
B500492	Total Boron (B)	2024/09/03	97	80 - 120	96	80 - 120	<0.020	mg/L	NC	20		
B500492	Total Calcium (Ca)	2024/09/03	NC	80 - 120	95	80 - 120	<0.30	mg/L	3.6	20		
B500492	Total Iron (Fe)	2024/09/03	98	80 - 120	99	80 - 120	<0.060	mg/L	4.3	20		
B500492	Total Lithium (Li)	2024/09/03	102	80 - 120	101	80 - 120	<0.020	mg/L	NC	20		
B500492	Total Magnesium (Mg)	2024/09/03	96	80 - 120	98	80 - 120	<0.20	mg/L	3.6	20		
B500492	Total Manganese (Mn)	2024/09/03	96	80 - 120	94	80 - 120	<0.0040	mg/L	3.1	20		
B500492	Total Potassium (K)	2024/09/03	98	80 - 120	98	80 - 120	<0.30	mg/L	4.1	20		
B500492	Total Silicon (Si)	2024/09/03	88	80 - 120	92	80 - 120	<0.50	mg/L	NC	20		
B500492	Total Sodium (Na)	2024/09/03	95	80 - 120	94	80 - 120	<0.50	mg/L	3.6	20		

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Bureau Veritas Job #: C464875
Report Date: 2024/09/06

QUALITY ASSURANCE REPORT(CONT'D)

Arctic Canadian Diamond Company Ltd
Client Project #: 61052
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

			Matrix Spike		Spiked Blank		Method Blank		RPD		QC Standard	
QC Batch	Parameter	Date	% Recovery	QC Limits	% Recovery	QC Limits	Value	UNITS	Value (%)	QC Limits	% Recovery	QC Limits
B500492	Total Strontium (Sr)	2024/09/03	97	80 - 120	98	80 - 120	<0.020	mg/L	3.2	20		
B500492	Total Sulphur (S)	2024/09/03	94	80 - 120	92	80 - 120	<0.20	mg/L	4.3	20		
B501048	Total Organic Carbon (C)	2024/09/03	99	75 - 125	97	80 - 120	<0.20	mg/L	13	20		
B503694	Total Organic Carbon (C)	2024/09/05	107	75 - 125	110	80 - 120	<0.20	mg/L	1.8	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) Method blank exceeds acceptance limits, 2x RDL acceptable for low level analysis

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

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Bureau Veritas Job #: C464875
Report Date: 2024/09/06

Arctic Canadian Diamond Company Ltd
Client Project #: 61052
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

VALIDATION SIGNATURE PAGE

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

Sandy Yuan, M.Sc., QP, Scientific Specialist

Suwan (Sze Yeung) Fock, B.Sc., Scientific Specialist

Bureau Veritas 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 Signatures page if included, otherwise available by request. For Department specific Analyst/Supervisor validation names, please refer to the Test Summary section if included, otherwise available by request. This report is authorized by Scott Cantwell, General Manager responsible for Alberta Environmental laboratory operations.

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

C464875
2024/08/22 09:30

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BUREAU VERITAS

ADDITIONAL COOLER TEMPERATURE RECORD

CHAIN-OF-CUSTODY RECORD

CHAIN OF CUSTODY #	
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COOLER OBSERVATIONS:

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	12.4	11.2	10.6
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	7.9	10.4	9.6
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	9.1	8.6	8.1
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	8.5	9.5	10.4
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	8.1	8.8	7.6
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	7.4	7.9	4.8
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	6.6	8.3	7.8
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	7.0	9.8	9.1
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	6.4	6.4	7.4
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	4.3	4.8	5.2
INTACT		✓		1	2	3
ICE PRESENT	✓	✓				

BV JOB#:

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	7.9	7.8	8.0
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	7.2	7.2	7.4
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	7.4	7.5	8.3
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	10.6	9.4	10.1
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	9.3	9.4	9.3
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	4.5	5.8	3.9
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	8.4	8.0	9.8
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	6.2	7.6	8.2
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	5.1	8.6	8.5
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	6.1	7.4	8.7
INTACT		✓		1	2	3
ICE PRESENT	✓					

2024/08/22

RECEIVED BY (SIGN & PRINT)		DATE (YYYY/MM/DD)	TIME (HH:MM)
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BUREAU VERITAS

ADDITIONAL COOLER TEMPERATURE RECORD

CHAIN-OF-CUSTODY RECORD

CHAIN OF CUSTODY #	
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COOLER OBSERVATIONS:

BV JOB#:

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	8.5	8.5	8.3
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	9.0	8.6	8.5
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	7.0	7.4	7.3
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	6.1	6.6	3.9
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	6.6	7.2	6.5
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						

RECEIVED BY (SIGN & PRINT)		DATE (YYYY/MM/DD)	TIME (HH:MM)
[illegible]	Jeff Lomon	2024/08/22	09 30

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2024/08/22 09:30

MCAL-2024-08-2433

Burgundy Diamond Mines
900 - 606 4 Street SW, Calgary, Alberta, Canada T2P 1T1
Tel: 867-880-4400 ext 2157
Burgundy Contact: Richard Ehlert / Jonah Kelly

BURGUNDY DIAMOND MINES

CHAIN OF CUSTODY FORM

BUREAU VERITAS

COC# 102057

SO# 61052

For Lab Use	SAMPLE INFORMATION						ANALYSIS REQUESTED (Indicate Filtered (F), Preserved (P) or Filtered and Preserved (F/P) below)																		
	Sample Point	Station Type	Date	Time	Matrix	Type	Major Ions	SNP Total Nutrients	Standard Total Metals															pH Field (pH)	Water Temp (°C)
	0008-Sa10	EKA 2002 0008	19-Aug-2024	15:30	Water	SNP	Y	Y	Y															8.11	16.2
	0008-Sa3	EKA 2002 0008	19-Aug-2024	15:19	Water	SNP	Y	Y	Y															7.27	15.3
	0008-Sa9b	EKA 2002 0008	19-Aug-2024	14:23	Water	SNP	Y	Y	Y															7.50	14.0

FOR LAB USE ONLY

Special Instructions (Billing details, QC reporting etc):
Frequency: On the first day of Discharge, weekly during periods of Discharge, and on the final day of Discharge.
Parameters: TSS, major ion, physical parameters, total metals and nutrients.
*** Sample :0008-Sa3, 0008-Sa9b with Profil, 0008-Sa10***
Sent results to Tania.robitaille@burgundydiamonds.com, Landon.Murphy@burgundydiamonds.com & compliance.team@burgundydiamonds.com

Relinquished by:	Date 21-Aug-24 Time 7:00	Received by: Jeff Lomon	Date 2024/08/22 Time 09:30
Relinquished by:	Date Time	Received by:	Date Time

FOR LAB USE ONLY

Cooler seal intact upon receipt?	Sample temperature upon receipt:
☐ Yes ☑ No ☐ N/A	Frozen? ☐ Yes ☑ No

Send Analytical Results to: compliance.team@burgundydiamonds.com

See ACTR

Your P.O. #: 6404002992
Your Project #: 62836
Site Location: MDMER/SNP/SEEPAGE
Your C.O.C. #: 102117

Attention: COMPLIANCE TEAM

Arctic Canadian Diamond Company Ltd
900, 606 4 Street SW
Calgary, AB
CANADA T2P 1T1

Report Date: 2024/09/20
Report #: R3559574
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C469899
Received: 2024/09/06, 12:50

Sample Matrix: Water
Samples Received: 3

Analyses	Quantity	Date Extracted	Date Analyzed	Laboratory Method	Analytical Method
Acidity pH 4.5 & pH 8.3 (as CaCO3)	3	N/A	2024/09/10	AB SOP-00005	SM 24 2310 B m
Alkalinity - Low Level	2	N/A	2024/09/11	AB SOP-00005	SM 24 2320 B m
Alkalinity - Low Level	1	N/A	2024/09/07	AB SOP-00005	SM 24 2320 B m
Low level chloride/sulphate by AC	3	N/A	2024/09/09	AB SOP-00020	SM24-4500-Cl/SO4-E m
Conductance - Low Level	2	N/A	2024/09/11	AB SOP-00005	SM 24 2510 B m
Conductance - Low Level	1	N/A	2024/09/09	AB SOP-00005	SM 24 2510 B m
Fluoride - Low Level	2	N/A	2024/09/11	AB SOP-00005	SM 24 4500-F C m
Fluoride - Low Level	1	N/A	2024/09/09	AB SOP-00005	SM 24 4500-F C m
Hardness Total (calculated as CaCO3) (1)	3	N/A	2024/09/18	BBY WI-00033	Auto Calc
Mercury (Total) by CV	3	2024/09/11	2024/09/13	AB SOP-00084	BCMOE BCLM Oct2013 m
Elements by ICP - Total	3	2024/09/17	2024/09/17	AB SOP-00014 / AB SOP-00042	EPA 6010d R5 m
Elements by ICPMS - Total	3	2024/09/17	2024/09/17	AB SOP-00014 / AB SOP-00043	EPA 6020b R2 m
Ammonia-N Low Level (Preserved)	3	N/A	2024/09/09	AB SOP-00007	SM 24 4500 NH3 A G m
Nitrate + Nitrite-N (calculated) Low Lev	3	N/A	2024/09/09		Auto Calc
Nitrogen (Nitrite - Nitrate) Low Level	3	N/A	2024/09/06	AB SOP-00023	SM 24 4110 B m
pH @25°C (2)	2	N/A	2024/09/11	AB SOP-00005	SM 24 4500-H+B m
pH @25°C (2)	1	N/A	2024/09/09	AB SOP-00005	SM 24 4500-H+B m
pH (Field)	3	N/A	2024/09/06	Field Test	Field Test
Orthophosphate LL by Automated Analyzer (3)	3	N/A	2024/09/09	AB SOP-00025	SM 24 4500-P A, F m
Silica (Reactive)	3	N/A	2024/09/12	AB SOP-00011	EPA 370.1 R1978 m
Sulphate (SO4) by IC	1	N/A	2024/09/12	AB SOP-00026	SM 24 4110 B m
Sulphate (SO4) by IC	2	N/A	2024/09/09	AB SOP-00026	SM 24 4110 B m
Carbon (total) (Calc. - Org. + Inorg.)	1	N/A	2024/09/10		Auto Calc
Carbon (total) (Calc. - Org. + Inorg.)	2	N/A	2024/09/17		Auto Calc
Temperature (Field)	3	N/A	2024/09/06	Field Test	Field Test
Carbon (Inorganic)	3	N/A	2024/09/10	CAL SOP-00076	Modified AE 2411
Total Kjeldahl Nitrogen (Total)	3	N/A	2024/09/09	BBY WI-00033	Auto Calc
Nitrogen (Total)	3	2024/09/09	2024/09/09	AB SOP-00093	SM 24 4500-N C m
Carbon (Total Organic) (4)	2	N/A	2024/09/17	AB SOP-00087	MMCW 119 1996 m
Carbon (Total Organic) (4)	1	N/A	2024/09/09	AB SOP-00087	MMCW 119 1996 m

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Your P.O. #: 6404002992
Your Project #: 62836
Site Location: MDMER/SNP/SEEPAGE
Your C.O.C. #: 102117

Attention: COMPLIANCE TEAM

Arctic Canadian Diamond Company Ltd
900, 606 4 Street SW
Calgary, AB
CANADA T2P 1T1

Report Date: 2024/09/20
Report #: R3559574
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C469899
Received: 2024/09/06, 12:50

Sample Matrix: Water
Samples Received: 3

Analyses	Quantity	Date Extracted	Date Analyzed	Laboratory Method	Analytical Method
Total Phosphorus Low Level Total	3	2024/09/09	2024/09/10	AB SOP-00024	SM 24 4500-P A,B,F m
Total Suspended Solids (NFR)	3	2024/09/06	2024/09/10	AB SOP-00061	SM 24 2540 D m
Turbidity	3	N/A	2024/09/06	CAL SOP-00081	SM 24 2130 B m
Ion Balance (5)	3	N/A	2024/09/18		
Total Dissolved Solids (Calculated) (5)	3	N/A	2024/09/18		

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, EPA, APHA or the Quebec Ministry of Environment.

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.
This Certificate shall not be reproduced except in full, without the written approval of the laboratory.
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) "Total Hardness" was calculated from Total Ca and Mg concentrations and may be biased high (Hardness, or Dissolved Hardness, calculated from Dissolved Ca and Mg, should be used for compliance if available).
(2) The CCME method requires pH to be analysed within 15 minutes of sampling and therefore field analysis is required for compliance. All Laboratory pH analyses in this report are reported past the CCME holding time. Bureau Veritas endeavours to analyze samples as soon as possible after receipt.
(3) Orthophosphate > Total Phosphorus Imbalance: When applicable, Orthophosphate, Total Phosphorus and dissolved Phosphorus results were reviewed and data quality meets acceptable levels unless otherwise noted.
(4) TOC present in the sample should be considered as non-purgeable TOC.
(5) Calculation was conducted as per client request using CAL PDF-00333.

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Your P.O. #: 6404002992
Your Project #: 62836
Site Location: MDMER/SNP/SEEPAGE
Your C.O.C. #: 102117

Attention: COMPLIANCE TEAM

Arctic Canadian Diamond Company Ltd
900, 606 4 Street SW
Calgary, AB
CANADA T2P 1T1

Report Date: 2024/09/20
Report #: R3559574
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C469899
Received: 2024/09/06, 12:50

Encryption Key

Please direct all questions regarding this Certificate of Analysis to:
Geraldlyn Gouthro, Key Account Specialist
Email: geraldlyn.gouthro@bureauveritas.com
Phone# (403) 291-3077
==========
This report has been generated and distributed using a secure automated process.
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Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Bureau Veritas Job #: C469899
Report Date: 2024/09/20

Arctic Canadian Diamond Company Ltd
Client Project #: 62836
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

RESULTS OF CHEMICAL ANALYSES OF WATER

Bureau Veritas ID		CUW081			CUW082		CUW083		
Sampling Date		2024/08/26 13:20			2024/08/26 13:05		2024/08/26 11:41		
COC Number		102117			102117		102117		
	UNITS	**0008-SA10**	**RDL**	**QC Batch**	**0008-SA3**	**QC Batch**	**0008-SA9B**	**RDL**	**QC Batch**
Calculated Parameters									
Total Hardness (CaCO3)	mg/L	150	0.50	B505910	66.5	B505910	17.4	0.50	B505910
Calculated Ion Balance (% Difference)	%	5.5		B506410	2.0	B506410	1.5		B506410
Nitrate plus Nitrite (N)	mg/L	17	0.010	B506354	1.4	B506354	0.046	0.0022	B506354
Calculated Total Dissolved Solids	mg/L	300	1.8	B506412	110	B506412	29	0.95	B506412
Total Total Kjeldahl Nitrogen (Calc)	mg/L	<0.20	0.20	B505387	0.31	B505387	0.40	0.020	B505387
Field Parameters									
Field pH	pH	7.73	N/A	ONSITE	7.62	ONSITE	6.72	N/A	ONSITE
Field Temperature (Fd)	deg. C	14.7	N/A	ONSITE	13.5	ONSITE	12.3	N/A	ONSITE
Misc. Inorganics									
Fluoride (F)	mg/L	0.183	0.010	B509131	0.205	B507384	0.083	0.010	B509131
pH	pH	6.21	N/A	B509129	6.85	B507382	6.09	N/A	B509129
Reactive Silica	mg/L	0.57	0.050	B513580	0.41	B513580	0.29	0.050	B513580
Acidity (pH 4.5)	mg/L	<1.0	1.0	B509151	<1.0	B509151	<1.0	1.0	B509151
Alkalinity (Total as CaCO3)	mg/L	27.3	0.50	B509125	40.4	B507380	13.4	0.50	B509125
Total Organic Carbon (C)	mg/L	2.4	0.20	B519938	3.3	B508764	4.9	0.20	B519938
Acidity (pH 8.3)	mg/L	<1.0	1.0	B509151	<1.0	B509151	<1.0	1.0	B509151
Alkalinity (PP as CaCO3)	mg/L	<0.50	0.50	B509125	<0.50	B507380	<0.50	0.50	B509125
Bicarbonate (HCO3)	mg/L	33.3	0.50	B509125	49.3	B507380	16.3	0.50	B509125
Carbonate (CO3)	mg/L	<0.50	0.50	B509125	<0.50	B507380	<0.50	0.50	B509125
Hydroxide (OH)	mg/L	<0.50	0.50	B509125	<0.50	B507380	<0.50	0.50	B509125
Total Suspended Solids	mg/L	<1.0	1.0	B506489	<1.0	B506489	1.3	1.0	B506489
Anions									
Orthophosphate (P)	mg/L	<0.0010	0.0010	B508202	<0.0010	B508202	<0.0010	0.0010	B508202
Chloride (Cl)	mg/L	9.6	0.50	B508533	3.8	B508543	1.2	0.50	B508533
Dissolved-Low Level Sulphate (SO4)	mg/L	120	1.5	B508673	39	B508673	9.7	0.30	B508673
Nutrients									
Total Carbon (C)	mg/L	8.1	0.50	B506400	11	B506400	7.5	0.50	B506400
Total Inorganic Carbon (C)	mg/L	5.7	1.0	B510426	7.3	B510426	2.6	1.0	B510426
Total Phosphorus (P)	mg/L	<0.0020	0.0020	B508669	0.0042	B508669	0.0048	0.0020	B508669
Total Ammonia (N)	mg/L	0.035	0.0050	B508174	0.041	B508174	0.030	0.0050	B508174
Nitrite (N)	mg/L	0.059	0.0010	B506873	0.0052	B506873	<0.0010	0.0010	B506873

RDL = Reportable Detection Limit
N/A = Not Applicable

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Bureau Veritas Job #: C469899
Report Date: 2024/09/20

Arctic Canadian Diamond Company Ltd
Client Project #: 62836
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

RESULTS OF CHEMICAL ANALYSES OF WATER

Bureau Veritas ID		CUW081			CUW082		CUW083		
Sampling Date		2024/08/26 13:20			2024/08/26 13:05		2024/08/26 11:41		
COC Number		102117			102117		102117		
	UNITS	**0008-SA10**	**RDL**	**QC Batch**	**0008-SA3**	**QC Batch**	**0008-SA9B**	**RDL**	**QC Batch**
Nitrate (N)	mg/L	17	0.010	B506873	1.4	B506873	0.046	0.0020	B506873
Total Nitrogen (N)	mg/L	17 (1)	0.20	B507929	1.7	B507929	0.44	0.020	B507929
Physical Properties									
Conductivity	uS/cm	448	1.0	B509130	192	B507383	55.1	1.0	B509130
Physical Properties									
Turbidity - NTU	NTU	0.17	0.10	B506484	1.5	B506484	2.0	0.10	B506484

RDL = Reportable Detection Limit

(1) Due to the sample matrix, sample required dilution. Detection limit was adjusted accordingly. Nitrogen < Nitrate: Both values fall within the method uncertainty for duplicates and are likely equivalent.

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Arctic Canadian Diamond Company Ltd
Client Project #: 62836
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

MERCURY BY COLD VAPOR (WATER)

Bureau Veritas ID		CUW081	CUW082	CUW083		
Sampling Date		2024/08/26 13:20	2024/08/26 13:05	2024/08/26 11:41		
COC Number		102117	102117	102117		
	UNITS	**0008-SA10**	**0008-SA3**	**0008-SA9B**	**RDL**	**QC Batch**
Elements						
Total Mercury (Hg)	mg/L	<0.0000019	<0.0000019	<0.0000019	0.0000019	B512261
RDL = Reportable Detection Limit						

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Bureau Veritas Job #: C469899
Report Date: 2024/09/20

Arctic Canadian Diamond Company Ltd
Client Project #: 62836
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

ELEMENTS BY ATOMIC SPECTROSCOPY (WATER)

Bureau Veritas ID		CUW081	CUW082	CUW083		
Sampling Date		2024/08/26 13:20	2024/08/26 13:05	2024/08/26 11:41		
COC Number		102117	102117	102117		
	UNITS	**0008-SA10**	**0008-SA3**	**0008-SA9B**	**RDL**	**QC Batch**
Elements						
Total Aluminum (Al)	mg/L	0.027	0.012	0.0081	0.0030	B519874
Total Antimony (Sb)	mg/L	<0.00060	<0.00060	<0.00060	0.00060	B519874
Total Arsenic (As)	mg/L	0.00038	0.00049	0.00027	0.00020	B519874
Total Barium (Ba)	mg/L	0.089	0.022	<0.010	0.010	B519879
Total Beryllium (Be)	mg/L	<0.0010	<0.0010	<0.0010	0.0010	B519874
Total Boron (B)	mg/L	0.045	0.066	0.045	0.020	B519879
Total Cadmium (Cd)	mg/L	<0.000020	<0.000020	<0.000020	0.000020	B519874
Total Calcium (Ca)	mg/L	24	11	2.7	0.30	B519879
Total Chromium (Cr)	mg/L	<0.0010	<0.0010	<0.0010	0.0010	B519874
Total Cobalt (Co)	mg/L	<0.00030	<0.00030	<0.00030	0.00030	B519874
Total Copper (Cu)	mg/L	<0.0010	<0.0010	<0.0010	0.0010	B519874
Total Iron (Fe)	mg/L	<0.060	0.081	0.11	0.060	B519879
Total Lead (Pb)	mg/L	<0.00020	<0.00020	<0.00020	0.00020	B519874
Total Lithium (Li)	mg/L	<0.020	<0.020	<0.020	0.020	B519879
Total Magnesium (Mg)	mg/L	22	9.4	2.6	0.20	B519879
Total Manganese (Mn)	mg/L	<0.0040	0.018	0.012	0.0040	B519879
Total Molybdenum (Mo)	mg/L	0.037	0.0037	0.00036	0.00020	B519874
Total Nickel (Ni)	mg/L	0.023	0.0027	0.00081	0.00050	B519874
Total Potassium (K)	mg/L	18	6.3	1.8	0.30	B519879
Total Selenium (Se)	mg/L	0.00032	<0.00020	<0.00020	0.00020	B519874
Total Silicon (Si)	mg/L	<0.50	<0.50	<0.50	0.50	B519879
Total Silver (Ag)	mg/L	<0.00010	<0.00010	<0.00010	0.00010	B519874
Total Sodium (Na)	mg/L	14	6.1	2.2	0.50	B519879
Total Strontium (Sr)	mg/L	0.30	0.097	0.021	0.020	B519879
Total Sulphur (S)	mg/L	36	12	3.0	0.20	B519879
Total Thallium (Tl)	mg/L	<0.00020	<0.00020	<0.00020	0.00020	B519874
Total Tin (Sn)	mg/L	<0.0010	<0.0010	<0.0010	0.0010	B519874
Total Titanium (Ti)	mg/L	<0.0010	<0.0010	<0.0010	0.0010	B519874
Total Uranium (U)	mg/L	0.0030	0.0018	<0.00010	0.00010	B519874
Total Vanadium (V)	mg/L	<0.0010	<0.0010	<0.0010	0.0010	B519874
Total Zinc (Zn)	mg/L	<0.0030	<0.0030	<0.0030	0.0030	B519874
RDL = Reportable Detection Limit						

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GENERAL COMMENTS

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

Package 1	8.5°C
Package 2	8.1°C
Package 3	6.7°C
Package 4	5.2°C
Package 5	2.4°C
Package 6	5.2°C
Package 7	3.5°C
Package 8	3.8°C
Package 9	4.3°C
Package 10	2.3°C
Package 11	4.3°C

Sample CUW081 [0008-SA10] : Sample was analyzed past method specified hold time for Turbidity. Exceedance of hold time increases the uncertainty of test results but does not necessarily imply that results are compromised. Sample was analyzed past method specified hold time for Total Suspended Solids (NFR). Sample was analyzed past method specified hold time for Orthophosphate LL by Automated Analyzer. Sample was analyzed past method specified hold time for Nitrogen (Nitrite - Nitrate) Low Level. Sample was analyzed past method specified hold time for Carbon (Inorganic). Sample was analyzed past method specified hold time for Acidity pH 4.5 & pH 8.3 (as CaCO3). Sample was analyzed past method specified hold time for Alkalinity - Low Level.

Sample CUW082 [0008-SA3] : Sample was analyzed past method specified hold time for Turbidity. Exceedance of hold time increases the uncertainty of test results but does not necessarily imply that results are compromised. Sample was analyzed past method specified hold time for Total Suspended Solids (NFR). Sample was analyzed past method specified hold time for Orthophosphate LL by Automated Analyzer. Sample was analyzed past method specified hold time for Nitrogen (Nitrite - Nitrate) Low Level. Sample was analyzed past method specified hold time for Carbon (Inorganic). Sample was analyzed past method specified hold time for Acidity pH 4.5 & pH 8.3 (as CaCO3).

Sample CUW083 [0008-SA9B] : Sample was analyzed past method specified hold time for Turbidity. Exceedance of hold time increases the uncertainty of test results but does not necessarily imply that results are compromised. Sample was analyzed past method specified hold time for Total Suspended Solids (NFR). Sample was analyzed past method specified hold time for Orthophosphate LL by Automated Analyzer. Sample was analyzed past method specified hold time for Nitrogen (Nitrite - Nitrate) Low Level. Sample was analyzed past method specified hold time for Carbon (Inorganic). Sample was analyzed past method specified hold time for Acidity pH 4.5 & pH 8.3 (as CaCO3). Sample was analyzed past method specified hold time for Alkalinity - Low Level.

Results relate only to the items tested.

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Bureau Veritas Job #: C469899
Report Date: 2024/09/20

QUALITY ASSURANCE REPORT

Arctic Canadian Diamond Company Ltd
Client Project #: 62836
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

			Matrix Spike		Spiked Blank		Method Blank		RPD		QC Standard	
QC Batch	Parameter	Date	% Recovery	QC Limits	% Recovery	QC Limits	Value	UNITS	Value (%)	QC Limits	% Recovery	QC Limits
B506484	Turbidity - NTU	2024/09/06			100	80 - 120	<0.10	NTU	9.5	20		
B506489	Total Suspended Solids	2024/09/10	108	80 - 120	103	80 - 120	<0.99	mg/L	NC	20		
B506873	Nitrate (N)	2024/09/06	105	80 - 120	103	80 - 120	<0.0020	mg/L	13	20		
B506873	Nitrite (N)	2024/09/06	104	80 - 120	101	80 - 120	<0.0010	mg/L	NC	20		
B507380	Alkalinity (PP as CaCO3)	2024/09/07					<0.50	mg/L	NC	20		
B507380	Alkalinity (Total as CaCO3)	2024/09/07			98	80 - 120	<0.50	mg/L	2.0	20		
B507380	Bicarbonate (HCO3)	2024/09/07					<0.50	mg/L	2.0	20		
B507380	Carbonate (CO3)	2024/09/07					<0.50	mg/L	NC	20		
B507380	Hydroxide (OH)	2024/09/07					<0.50	mg/L	NC	20		
B507382	pH	2024/09/09			100	97 - 103			1.5	N/A		
B507383	Conductivity	2024/09/09			100	90 - 110	<1.0	uS/cm	1.7	20		
B507384	Fluoride (F)	2024/09/09	94	80 - 120	94	80 - 120	<0.010	mg/L	NC	20		
B507929	Total Nitrogen (N)	2024/09/09	101	80 - 120	100	80 - 120	<0.020	mg/L	1.3	20	101	80 - 120
B508174	Total Ammonia (N)	2024/09/09	105	80 - 120	104	80 - 120	<0.0050	mg/L	0.48	20		
B508202	Orthophosphate (P)	2024/09/09	102	80 - 120	101	80 - 120	<0.0010	mg/L	NC	20		
B508533	Chloride (Cl)	2024/09/09	NC	80 - 120	104	80 - 120	<0.50	mg/L				
B508543	Chloride (Cl)	2024/09/09	108	80 - 120	104	80 - 120	<0.50	mg/L	NC	20		
B508669	Total Phosphorus (P)	2024/09/10	100	80 - 120	99	80 - 120	<0.0010	mg/L	NC	20	86	80 - 120
B508673	Dissolved-Low Level Sulphate (SO4)	2024/09/12	NC	80 - 120	99	80 - 120	<0.050	mg/L	0.53	20		
B508764	Total Organic Carbon (C)	2024/09/09	103	75 - 125	104	80 - 120	<0.20	mg/L	1.0	20		
B509125	Alkalinity (PP as CaCO3)	2024/09/11					<0.50	mg/L	NC	20		
B509125	Alkalinity (Total as CaCO3)	2024/09/11			98	80 - 120	<0.50	mg/L	2.9	20		
B509125	Bicarbonate (HCO3)	2024/09/11					<0.50	mg/L	2.9	20		
B509125	Carbonate (CO3)	2024/09/11					<0.50	mg/L	NC	20		
B509125	Hydroxide (OH)	2024/09/11					<0.50	mg/L	NC	20		
B509129	pH	2024/09/11			100	97 - 103			1.4	N/A		
B509130	Conductivity	2024/09/11			101	90 - 110	<1.0	uS/cm	0.48	20		
B509131	Fluoride (F)	2024/09/11	100	80 - 120	105	80 - 120	0.010, RDL=0.010 (1)	mg/L	11	20		
B509151	Acidity (pH 4.5)	2024/09/10					<1.0	mg/L	NC	20		
B509151	Acidity (pH 8.3)	2024/09/10			98	80 - 120	<1.0	mg/L	NC	20		
B510426	Total Inorganic Carbon (C)	2024/09/10	95	80 - 120	105	80 - 120	<1.0	mg/L	NC	20		

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QUALITY ASSURANCE REPORT(CONT'D)

Arctic Canadian Diamond Company Ltd
Client Project #: 62836
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

			Matrix Spike		Spiked Blank		Method Blank		RPD		QC Standard	
QC Batch	Parameter	Date	% Recovery	QC Limits	% Recovery	QC Limits	Value	UNITS	Value (%)	QC Limits	% Recovery	QC Limits
B512261	Total Mercury (Hg)	2024/09/13	102	80 - 120	102	80 - 120	<0.0000019	mg/L	NC	20		
B513580	Reactive Silica	2024/09/12	108	80 - 120	106	80 - 120	<0.050	mg/L	NC	20		
B519874	Total Aluminum (Al)	2024/09/17	196 (2)	80 - 120	109	80 - 120	<0.0030	mg/L	10	20		
B519874	Total Antimony (Sb)	2024/09/17	105	80 - 120	102	80 - 120	<0.00060	mg/L	NC	20		
B519874	Total Arsenic (As)	2024/09/17	109	80 - 120	107	80 - 120	<0.00020	mg/L	NC	20		
B519874	Total Beryllium (Be)	2024/09/17	106	80 - 120	99	80 - 120	<0.0010	mg/L	NC	20		
B519874	Total Cadmium (Cd)	2024/09/17	108	80 - 120	104	80 - 120	<0.000020	mg/L	NC	20		
B519874	Total Chromium (Cr)	2024/09/17	106	80 - 120	106	80 - 120	<0.0010	mg/L	NC	20		
B519874	Total Cobalt (Co)	2024/09/17	105	80 - 120	106	80 - 120	<0.00030	mg/L	NC	20		
B519874	Total Copper (Cu)	2024/09/17	104	80 - 120	106	80 - 120	<0.0010	mg/L	NC	20		
B519874	Total Lead (Pb)	2024/09/17	106	80 - 120	104	80 - 120	<0.00020	mg/L	NC	20		
B519874	Total Molybdenum (Mo)	2024/09/17	111	80 - 120	105	80 - 120	<0.00020	mg/L	NC	20		
B519874	Total Nickel (Ni)	2024/09/17	103	80 - 120	106	80 - 120	<0.00050	mg/L	NC	20		
B519874	Total Selenium (Se)	2024/09/17	105	80 - 120	105	80 - 120	<0.00020	mg/L	NC	20		
B519874	Total Silver (Ag)	2024/09/17	107	80 - 120	103	80 - 120	<0.00010	mg/L	NC	20		
B519874	Total Thallium (Tl)	2024/09/17	103	80 - 120	101	80 - 120	<0.00020	mg/L	NC	20		
B519874	Total Tin (Sn)	2024/09/17	109	80 - 120	103	80 - 120	<0.0010	mg/L	NC	20		
B519874	Total Titanium (Ti)	2024/09/17	107	80 - 120	106	80 - 120	<0.0010	mg/L	NC	20		
B519874	Total Uranium (U)	2024/09/17	108	80 - 120	107	80 - 120	<0.00010	mg/L	NC	20		
B519874	Total Vanadium (V)	2024/09/17	109	80 - 120	107	80 - 120	<0.0010	mg/L	NC	20		
B519874	Total Zinc (Zn)	2024/09/17	105	80 - 120	105	80 - 120	<0.0030	mg/L	NC	20		
B519879	Total Barium (Ba)	2024/09/17	103	80 - 120	105	80 - 120	<0.010	mg/L	0.40	20		
B519879	Total Boron (B)	2024/09/17	100	80 - 120	101	80 - 120	<0.020	mg/L	NC	20		
B519879	Total Calcium (Ca)	2024/09/17	NC	80 - 120	96	80 - 120	<0.30	mg/L	1.3	20		
B519879	Total Iron (Fe)	2024/09/17	NC	80 - 120	104	80 - 120	<0.060	mg/L	NC	20		
B519879	Total Lithium (Li)	2024/09/17	99	80 - 120	97	80 - 120	<0.020	mg/L	NC	20		
B519879	Total Magnesium (Mg)	2024/09/17	NC	80 - 120	99	80 - 120	<0.20	mg/L	1.5	20		
B519879	Total Manganese (Mn)	2024/09/17	104	80 - 120	101	80 - 120	<0.0040	mg/L	0.17	20		
B519879	Total Potassium (K)	2024/09/17	97	80 - 120	97	80 - 120	<0.30	mg/L	1.4	20		
B519879	Total Silicon (Si)	2024/09/17	98	80 - 120	97	80 - 120	<0.50	mg/L	0.0036	20		
B519879	Total Sodium (Na)	2024/09/17	NC	80 - 120	95	80 - 120	<0.50	mg/L	2.3	20		
B519879	Total Strontium (Sr)	2024/09/17	NC	80 - 120	100	80 - 120	<0.020	mg/L	NC	20		

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QUALITY ASSURANCE REPORT(CONT'D)

Arctic Canadian Diamond Company Ltd
Client Project #: 62836
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

			Matrix Spike		Spiked Blank		Method Blank		RPD		QC Standard	
QC Batch	Parameter	Date	% Recovery	QC Limits	% Recovery	QC Limits	Value	UNITS	Value (%)	QC Limits	% Recovery	QC Limits
B519879	Total Sulphur (S)	2024/09/17	NC	80 - 120	98	80 - 120	<0.20	mg/L	NC	20		
B519938	Total Organic Carbon (C)	2024/09/17	104	75 - 125	106	80 - 120	<0.20	mg/L	1.0	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) Method blank exceeds acceptance limits, 2x RDL acceptable for low level analysis

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

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Arctic Canadian Diamond Company Ltd
Client Project #: 62836
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

VALIDATION SIGNATURE PAGE

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

Sandy Yuan, M.Sc., QP, Scientific Specialist

Suwan (Sze Yeung) Fock, B.Sc., Scientific Specialist

Bureau Veritas 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 Signatures page if included, otherwise available by request. For Department specific Analyst/Supervisor validation names, please refer to the Test Summary section if included, otherwise available by request. This report is authorized by Scott Cantwell, General Manager responsible for Alberta Environmental laboratory operations.

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BUREAU VERITAS

ADDITIONAL COOLER TEMPERATURE RECORD

CHAIN-OF-CUSTODY RECORD

CHAIN OF CUSTODY #	
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COOLER OBSERVATIONS:

BV JOB#:

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	8.4 (1)	8.1 (2)	9.0 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	8.0 (1)	8.4 (2)	8.0 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	7.0 (1)	7.1 (2)	6.0 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	5.4 (1)	3.9 (2)	6.4 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	0.3 (1)	0.9 (2)	5.9 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	4.6 (1)	5.1 (2)	5.9 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	3.3 (1)	3.4 (2)	3.7 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	3.8 (1)	3.8 (2)	3.9 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	4.1 (1)	4.3 (2)	4.4 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	2.1 (1)	2.3 (2)	2.4 (3)
INTACT		✓				
ICE PRESENT	✓					

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	4.4 (1)	4.1 (2)	4.2 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP	1	2	3
INTACT						
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP	1	2	3
INTACT						
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP	1	2	3
INTACT						
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP	1	2	3
INTACT						
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP	1	2	3
INTACT						
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP	1	2	3
INTACT						
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP	1	2	3
INTACT						
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP	1	2	3
INTACT						
ICE PRESENT						

RECEIVED BY (SIGN & PRINT)		DATE (YYYY/MM/DD)	TIME (HH:MM)
[signature]	Shaira Cura	2024/09/06	12:50

C469899
2024/09/06 12:50

Burgundy Diamond Mines
900 - 606 4 Street SW, Calgary, Alberta, Canada T2P 1T1
Tel: 867-880-4400 ext 2157
Burgundy Contact: Richard Ehlert / Jonah Kelly

BURGUNDY DIAMOND MINES

CHAIN OF CUSTODY FORM

BUREAU VERITAS 1828

COC# 102117

SO# 62836

For Lab Use	SAMPLE INFORMATION						ANALYSIS REQUESTED (Indicate Filtered (F), Preserved (P) or Filtered and Preserved (F/P) below)				
	Sample Point	Station Type	Date	Time	Matrix	Type	Major Ions	SNP Total Nutrients	Standard Total Metals	pH Field (pH)	Water Temp (°C)
✓	0008-Sa10	EKA 2002 0008	26-Aug-2024	13:20	Water	SNP	Y	Y	Y	7.73	14.7
✓	0008-Sa3	EKA 2002 0008	26-Aug-2024	13:05	Water	SNP	Y	Y	Y	7.62	13.5
✓	0008-Sa9b	EKA 2002 0008	26-Aug-2024	11:41	Water	SNP	Y	Y	Y	6.72	12.3

FOR LAB USE ONLY

MCAL-2024-09-429

Special Instructions (Billing details, QC reporting etc):
Frequency: On the first day of Discharge, weekly during periods of Discharge, and on the final day of Discharge.
Parameters: TSS, major ion, physical parameters, total metals and nutrients.
*** Sample :0008-Sa3, 0008-Sa9b with Profil, 0008-Sa10***
Sent results to Tania.robitaille@burgundydiamonds.com, Landon.Murphy@burgundydiamonds.com & compliance.team@burgundydiamonds.com

Relinquished by:	Date 05-Sep-24 Time 8:00	Received by: Shaira Cura	Date 2024/09/06 Time 12:50
Relinquished by:	Date Time	Received by:	Date Time

FOR LAB USE ONLY

Cooler seal intact upon receipt?	Sample temperature upon receipt:
☐ Yes ☐ No ☐ N/A	Frozen? ☐ Yes ☐ No

Send Analytical Results to: compliance.team@burgundydiamonds.com

See ACTR

Your P.O. #: 6404002992
Site Location: MDMER/SNP/SEEPAGE
Your C.O.C. #: 102187

Attention: COMPLIANCE TEAM

Arctic Canadian Diamond Company Ltd
900, 606 4 Street SW
Calgary, AB
CANADA T2P 1T1

Report Date: 2024/09/20
Report #: R3559155
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C469930
Received: 2024/09/06, 12:50

Sample Matrix: Water
Samples Received: 3

Analyses	Quantity	Date Extracted	Date Analyzed	Laboratory Method	Analytical Method
Acidity pH 4.5 & pH 8.3 (as CaCO3)	3	N/A	2024/09/10	AB SOP-00005	SM 24 2310 B m
Alkalinity - Low Level	3	N/A	2024/09/11	AB SOP-00005	SM 24 2320 B m
Low level chloride/sulphate by AC	3	N/A	2024/09/09	AB SOP-00020	SM24-4500-Cl/SO4-E m
Conductance - Low Level	3	N/A	2024/09/11	AB SOP-00005	SM 24 2510 B m
Fluoride - Low Level	3	N/A	2024/09/11	AB SOP-00005	SM 24 4500-F C m
Hardness Total (calculated as CaCO3) (1)	3	N/A	2024/09/18	BBY WI-00033	Auto Calc
Mercury (Total) by CV	3	2024/09/13	2024/09/14	AB SOP-00084	BCMOE BCLM Oct2013 m
Elements by ICP - Total	3	2024/09/17	2024/09/18	AB SOP-00014 / AB SOP-00042	EPA 6010d R5 m
Elements by ICPMS - Total	3	2024/09/17	2024/09/18	AB SOP-00014 / AB SOP-00043	EPA 6020b R2 m
Ammonia-N Low Level (Preserved)	3	N/A	2024/09/09	AB SOP-00007	SM 24 4500 NH3 A G m
Nitrate + Nitrite-N (calculated) Low Lev	3	N/A	2024/09/12		Auto Calc
Nitrogen (Nitrite - Nitrate) Low Level	3	N/A	2024/09/11	AB SOP-00023	SM 24 4110 B m
pH @25°C (2)	3	N/A	2024/09/11	AB SOP-00005	SM 24 4500-H+B m
pH (Field)	3	N/A	2024/09/06	Field Test	Field Test
Orthophosphate LL by Automated Analyzer (3)	3	N/A	2024/09/08	AB SOP-00025	SM 24 4500-P A, F m
Silica (Reactive)	3	N/A	2024/09/12	AB SOP-00011	EPA 370.1 R1978 m
Sulphate (SO4) by IC	1	N/A	2024/09/12	AB SOP-00026	SM 24 4110 B m
Sulphate (SO4) by IC	2	N/A	2024/09/09	AB SOP-00026	SM 24 4110 B m
Carbon (total) (Calc. - Org. + Inorg.)	3	N/A	2024/09/10		Auto Calc
Temperature (Field)	3	N/A	2024/09/06	Field Test	Field Test
Carbon (Inorganic)	3	N/A	2024/09/10	CAL SOP-00076	Modified AE 2411
Total Kjeldahl Nitrogen (Total)	3	N/A	2024/09/12	BBY WI-00033	Auto Calc
Nitrogen (Total)	3	2024/09/09	2024/09/09	AB SOP-00093	SM 24 4500-N C m
Carbon (Total Organic) (4)	3	N/A	2024/09/09	AB SOP-00087	MMCW 119 1996 m
Total Phosphorus Low Level Total	3	2024/09/09	2024/09/10	AB SOP-00024	SM 24 4500-P A,B,F m
Total Suspended Solids (NFR)	3	2024/09/10	2024/09/10	AB SOP-00061	SM 24 2540 D m
Turbidity	3	N/A	2024/09/07	CAL SOP-00081	SM 24 2130 B m
Ion Balance (5)	3	N/A	2024/09/18		
Total Dissolved Solids (Calculated) (5)	3	N/A	2024/09/18		

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Your P.O. #: 6404002992
Site Location: MDMER/SNP/SEEPAGE
Your C.O.C. #: 102187

Attention: COMPLIANCE TEAM

Arctic Canadian Diamond Company Ltd
900, 606 4 Street SW
Calgary, AB
CANADA T2P 1T1

Report Date: 2024/09/20
Report #: R3559155
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C469930
Received: 2024/09/06, 12:50
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, EPA, APHA or the Quebec Ministry of Environment.

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.
This Certificate shall not be reproduced except in full, without the written approval of the laboratory.

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) "Total Hardness" was calculated from Total Ca and Mg concentrations and may be biased high (Hardness, or Dissolved Hardness, calculated from Dissolved Ca and Mg, should be used for compliance if available).
(2) The CCME method requires pH to be analysed within 15 minutes of sampling and therefore field analysis is required for compliance. All Laboratory pH analyses in this report are reported past the CCME holding time. Bureau Veritas endeavours to analyze samples as soon as possible after receipt.
(3) Orthophosphate > Total Phosphorus Imbalance: When applicable, Orthophosphate, Total Phosphorus and dissolved Phosphorus results were reviewed and data quality meets acceptable levels unless otherwise noted.
(4) TOC present in the sample should be considered as non-purgeable TOC.
(5) Calculation was conducted as per client request using CAL PDF-00333.

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Your P.O. #: 6404002992
Site Location: MDMER/SNP/SEEPAGE
Your C.O.C. #: 102187

Attention: COMPLIANCE TEAM

Arctic Canadian Diamond Company Ltd
900, 606 4 Street SW
Calgary, AB
CANADA T2P 1T1

Report Date: 2024/09/20
Report #: R3559155
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C469930
Received: 2024/09/06, 12:50

Encryption Key

Please direct all questions regarding this Certificate of Analysis to:
Geraldlyn Gouthro, Key Account Specialist
Email: geraldlyn.gouthro@bureauveritas.com
Phone# (403) 291-3077

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This report has been generated and distributed using a secure automated process.
Bureau Veritas 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 Signatures page if included, otherwise available by request. For Department specific Analyst/Supervisor validation names, please refer to the Test Summary section if included, otherwise available by request. This report is authorized by Scott Cantwell, General Manager responsible for Alberta Environmental laboratory operations.

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Bureau Veritas Job #: C469930
Report Date: 2024/09/20

Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

RESULTS OF CHEMICAL ANALYSES OF WATER

Bureau Veritas ID		CUW396			CUW397			CUW398		
Sampling Date		2024/09/04 12:22			2024/09/04 11:55			2024/09/04 10:48		
COC Number		102187			102187			102187		
	UNITS	**008-SA10**	**RDL**	**QC Batch**	**008-SA3**	**RDL**	**QC Batch**	**008-SA9B**	**RDL**	**QC Batch**
Calculated Parameters										
Total Hardness (CaCO3)	mg/L	169	0.50	B505910	75.5	0.50	B505910	21.9	0.50	B505910
Calculated Ion Balance (% Difference)	%	2.1		B506410	2.6		B506410	8.4		B506410
Nitrate plus Nitrite (N)	mg/L	16	0.011	B506354	1.9	0.0022	B506354	0.12	0.0022	B506354
Calculated Total Dissolved Solids	mg/L	310	1.8	B506412	120	0.95	B506412	40	0.95	B506412
Total Total Kjeldahl Nitrogen (Calc)	mg/L	0.43	0.20	B505387	0.25	0.040	B505387	0.36	0.020	B505387
Field Parameters										
Field pH	pH	7.60	N/A	ONSITE	7.53	N/A	ONSITE	7.51	N/A	ONSITE
Field Temperature (Fd)	deg. C	10.9	N/A	ONSITE	9.7	N/A	ONSITE	8.6	N/A	ONSITE
Misc. Inorganics										
Fluoride (F)	mg/L	0.190	0.010	B509143	0.231	0.010	B509143	0.075	0.010	B509143
pH	pH	6.23	N/A	B509139	6.43	N/A	B509139	6.15	N/A	B509139
Reactive Silica	mg/L	0.72	0.050	B512918	0.49	0.050	B512918	0.30	0.050	B512918
Acidity (pH 4.5)	mg/L	<1.0	1.0	B509151	<1.0	1.0	B509151	<1.0	1.0	B509151
Alkalinity (Total as CaCO3)	mg/L	26.4	0.50	B509137	38.5	0.50	B509137	23.0	0.50	B509137
Total Organic Carbon (C)	mg/L	2.5	0.20	B508764	2.7	0.20	B508764	4.1	0.20	B508764
Acidity (pH 8.3)	mg/L	1.4	1.0	B509151	<1.0	1.0	B509151	<1.0	1.0	B509151
Alkalinity (PP as CaCO3)	mg/L	<0.50	0.50	B509137	<0.50	0.50	B509137	<0.50	0.50	B509137
Bicarbonate (HCO3)	mg/L	32.2	0.50	B509137	47.0	0.50	B509137	28.0	0.50	B509137
Carbonate (CO3)	mg/L	<0.50	0.50	B509137	<0.50	0.50	B509137	<0.50	0.50	B509137
Hydroxide (OH)	mg/L	<0.50	0.50	B509137	<0.50	0.50	B509137	<0.50	0.50	B509137
Total Suspended Solids	mg/L	<1.0	1.0	B509475	<1.0	1.0	B509475	<1.0	1.0	B509475
Anions										
Orthophosphate (P)	mg/L	<0.0010	0.0010	B507675	<0.0010	0.0010	B507675	<0.0010	0.0010	B507675
Chloride (Cl)	mg/L	9.2	0.50	B508543	4.0	0.50	B508543	0.91	0.50	B508543
Dissolved-Low Level Sulphate (SO4)	mg/L	120	1.5	B508538	42	0.30	B508538	12	0.30	B508673
Nutrients										
Total Carbon (C)	mg/L	8.2	0.50	B506400	10	0.50	B506400	7.4	0.50	B506400
Total Inorganic Carbon (C)	mg/L	5.7	1.0	B510426	7.7	1.0	B510426	3.5	1.0	B510426
Total Phosphorus (P)	mg/L	0.0057	0.0020	B508669	0.0024	0.0020	B508669	0.0043	0.0020	B508669
Total Ammonia (N)	mg/L	0.048	0.0050	B508156	0.033	0.0050	B508166	0.013	0.0050	B508166
Nitrite (N)	mg/L	0.066	0.0050	B508007	0.0061	0.0010	B508007	0.0012	0.0010	B508007

RDL = Reportable Detection Limit
N/A = Not Applicable

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Bureau Veritas Job #: C469930
Report Date: 2024/09/20

Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

RESULTS OF CHEMICAL ANALYSES OF WATER

Bureau Veritas ID		CUW396			CUW397			CUW398		
Sampling Date		2024/09/04 12:22			2024/09/04 11:55			2024/09/04 10:48		
COC Number		102187			102187			102187		
	UNITS	**008-SA10**	**RDL**	**QC Batch**	**008-SA3**	**RDL**	**QC Batch**	**008-SA9B**	**RDL**	**QC Batch**
Nitrate (N)	mg/L	16	0.010	B508007	1.9	0.0020	B508007	0.12	0.0020	B508007
Total Nitrogen (N)	mg/L	17	0.20	B507929	2.2	0.040	B507929	0.48	0.020	B507929
Physical Properties										
Conductivity	uS/cm	452	1.0	B509142	197	1.0	B509142	66.5	1.0	B509142
Physical Properties										
Turbidity - NTU	NTU	0.99	0.10	B507219	0.12	0.10	B507219	0.12	0.10	B507219
RDL = Reportable Detection Limit										

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Bureau Veritas Job #: C469930
Report Date: 2024/09/20

Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

MERCURY BY COLD VAPOR (WATER)

Bureau Veritas ID		CUW396	CUW397	CUW398		
Sampling Date		2024/09/04 12:22	2024/09/04 11:55	2024/09/04 10:48		
COC Number		102187	102187	102187		
	UNITS	**008-SA10**	**008-SA3**	**008-SA9B**	**RDL**	**QC Batch**
Elements						
Total Mercury (Hg)	mg/L	<0.0000019	<0.0000019	<0.0000019	0.0000019	B515966
RDL = Reportable Detection Limit						

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Bureau Veritas Job #: C469930
Report Date: 2024/09/20

Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

ELEMENTS BY ATOMIC SPECTROSCOPY (WATER)

Bureau Veritas ID		CUW396	CUW397	CUW398		
Sampling Date		2024/09/04 12:22	2024/09/04 11:55	2024/09/04 10:48		
COC Number		102187	102187	102187		
	UNITS	**008-SA10**	**008-SA3**	**008-SA9B**	**RDL**	**QC Batch**
Elements						
Total Aluminum (Al)	mg/L	0.032	0.010	0.0077	0.0030	B524566
Total Antimony (Sb)	mg/L	<0.00060	<0.00060	<0.00060	0.00060	B524566
Total Arsenic (As)	mg/L	0.00027	0.00043	0.00026	0.00020	B524566
Total Barium (Ba)	mg/L	0.094	0.026	<0.010	0.010	B524570
Total Beryllium (Be)	mg/L	<0.0010	<0.0010	<0.0010	0.0010	B524566
Total Boron (B)	mg/L	0.022	<0.020	0.18	0.020	B524570
Total Cadmium (Cd)	mg/L	<0.000020	<0.000020	<0.000020	0.000020	B524566
Total Calcium (Ca)	mg/L	27	13	3.4	0.30	B524570
Total Chromium (Cr)	mg/L	<0.0010	<0.0010	<0.0010	0.0010	B524566
Total Cobalt (Co)	mg/L	<0.00030	<0.00030	<0.00030	0.00030	B524566
Total Copper (Cu)	mg/L	<0.0010	<0.0010	<0.0010	0.0010	B524566
Total Iron (Fe)	mg/L	<0.070	0.073	0.11	0.070	B524570
Total Lead (Pb)	mg/L	<0.00020	<0.00020	0.00025	0.00020	B524566
Total Lithium (Li)	mg/L	<0.020	<0.020	<0.020	0.020	B524570
Total Magnesium (Mg)	mg/L	25	11	3.3	0.20	B524570
Total Manganese (Mn)	mg/L	0.0067	0.026	0.011	0.0040	B524570
Total Molybdenum (Mo)	mg/L	0.042	0.0050	0.00039	0.00020	B524566
Total Nickel (Ni)	mg/L	0.024	0.0027	0.0012	0.00050	B524566
Total Potassium (K)	mg/L	21	7.2	2.2	0.30	B524570
Total Selenium (Se)	mg/L	0.00035	<0.00020	<0.00020	0.00020	B524566
Total Silicon (Si)	mg/L	<0.50	<0.50	<0.50	0.50	B524570
Total Silver (Ag)	mg/L	<0.00010	<0.00010	<0.00010	0.00010	B524566
Total Sodium (Na)	mg/L	18	7.3	3.2	0.50	B524570
Total Strontium (Sr)	mg/L	0.31	0.11	0.026	0.020	B524570
Total Sulphur (S)	mg/L	38	14	4.3	0.20	B524570
Total Thallium (Tl)	mg/L	<0.00020	<0.00020	<0.00020	0.00020	B524566
Total Tin (Sn)	mg/L	<0.0010	<0.0010	<0.0010	0.0010	B524566
Total Titanium (Ti)	mg/L	<0.0010	<0.0010	<0.0010	0.0010	B524566
Total Uranium (U)	mg/L	0.0037	0.0019	<0.00010	0.00010	B524566
Total Vanadium (V)	mg/L	<0.0010	<0.0010	<0.0010	0.0010	B524566
Total Zinc (Zn)	mg/L	<0.0030	<0.0030	<0.0030	0.0030	B524566
RDL = Reportable Detection Limit						

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

GENERAL COMMENTS

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

Package 1	8.5°C
Package 2	8.1°C
Package 3	6.7°C
Package 4	5.2°C
Package 5	2.4°C
Package 6	5.2°C
Package 7	3.5°C
Package 8	3.8°C
Package 9	4.3°C
Package 10	2.3°C
Package 11	4.3°C

Sample CUW396 [008-SA10] : Nitrogen (Nitrite - Nitrate) Low Level completed within five days of sampling. Data is satisfactory for compliance purposes. Sample was analyzed past method specified hold time for Nitrogen (Nitrite - Nitrate) Low Level. Exceedance of hold time increases the uncertainty of test results but does not necessarily imply that results are compromised.

Sample CUW397 [008-SA3] : Nitrogen (Nitrite - Nitrate) Low Level completed within five days of sampling. Data is satisfactory for compliance purposes. Sample was analyzed past method specified hold time for Nitrogen (Nitrite - Nitrate) Low Level. Exceedance of hold time increases the uncertainty of test results but does not necessarily imply that results are compromised.

Sample CUW398 [008-SA9B] : Nitrogen (Nitrite - Nitrate) Low Level completed within five days of sampling. Data is satisfactory for compliance purposes. Sample was analyzed past method specified hold time for Nitrogen (Nitrite - Nitrate) Low Level. Exceedance of hold time increases the uncertainty of test results but does not necessarily imply that results are compromised. Sample was analyzed past method specified hold time for Carbon (Inorganic).

Results relate only to the items tested.

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Bureau Veritas Job #: C469930
Report Date: 2024/09/20

QUALITY ASSURANCE REPORT

Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

			Matrix Spike		Spiked Blank		Method Blank		RPD		QC Standard	
QC Batch	Parameter	Date	% Recovery	QC Limits	% Recovery	QC Limits	Value	UNITS	Value (%)	QC Limits	% Recovery	QC Limits
B507219	Turbidity - NTU	2024/09/07			101	80 - 120	<0.10	NTU	2.0	20		
B507675	Orthophosphate (P)	2024/09/08	90	80 - 120	100	80 - 120	<0.0010	mg/L	5.8	20		
B507929	Total Nitrogen (N)	2024/09/09	101	80 - 120	100	80 - 120	<0.020	mg/L	1.3	20	101	80 - 120
B508007	Nitrate (N)	2024/09/11	105	80 - 120	98	80 - 120	<0.0020	mg/L	NC	20		
B508007	Nitrite (N)	2024/09/11	105	80 - 120	97	80 - 120	<0.0010	mg/L	NC	20		
B508156	Total Ammonia (N)	2024/09/09	105	80 - 120	103	80 - 120	<0.0050	mg/L	NC	20		
B508166	Total Ammonia (N)	2024/09/09	105	80 - 120	103	80 - 120	<0.0050	mg/L	2.7	20		
B508538	Dissolved-Low Level Sulphate (SO4)	2024/09/12	NC	80 - 120	98	80 - 120	<0.050	mg/L	0.026	20		
B508543	Chloride (Cl)	2024/09/09	108	80 - 120	104	80 - 120	<0.50	mg/L	NC	20		
B508669	Total Phosphorus (P)	2024/09/10	100	80 - 120	99	80 - 120	<0.0010	mg/L	NC	20	86	80 - 120
B508673	Dissolved-Low Level Sulphate (SO4)	2024/09/12	NC	80 - 120	99	80 - 120	<0.050	mg/L	0.53	20		
B508764	Total Organic Carbon (C)	2024/09/09	103	75 - 125	104	80 - 120	<0.20	mg/L	1.0	20		
B509137	Alkalinity (PP as CaCO3)	2024/09/11					<0.50	mg/L				
B509137	Alkalinity (Total as CaCO3)	2024/09/11			97	80 - 120	<0.50	mg/L				
B509137	Bicarbonate (HCO3)	2024/09/11					<0.50	mg/L				
B509137	Carbonate (CO3)	2024/09/11					<0.50	mg/L				
B509137	Hydroxide (OH)	2024/09/11					<0.50	mg/L				
B509139	pH	2024/09/11			100	97 - 103						
B509142	Conductivity	2024/09/11			101	90 - 110	<1.0	uS/cm	0.56	20		
B509143	Fluoride (F)	2024/09/11	105	80 - 120	104	80 - 120	<0.010	mg/L	NC	20		
B509151	Acidity (pH 4.5)	2024/09/10					<1.0	mg/L	NC	20		
B509151	Acidity (pH 8.3)	2024/09/10			98	80 - 120	<1.0	mg/L	NC	20		
B509475	Total Suspended Solids	2024/09/10	NC	80 - 120	87	80 - 120	<1.0	mg/L	8.2	20		
B510426	Total Inorganic Carbon (C)	2024/09/10	95	80 - 120	105	80 - 120	<1.0	mg/L	NC	20		
B512918	Reactive Silica	2024/09/12	103	80 - 120	106	80 - 120	<0.050	mg/L	5.0	20		
B515966	Total Mercury (Hg)	2024/09/14	107	80 - 120	106	80 - 120	<0.0000019	mg/L	NC	20		
B524566	Total Aluminum (Al)	2024/09/18	107	80 - 120	108	80 - 120	<0.0030	mg/L	19	20		
B524566	Total Antimony (Sb)	2024/09/18	103	80 - 120	104	80 - 120	<0.00060	mg/L	NC	20		
B524566	Total Arsenic (As)	2024/09/18	108	80 - 120	109	80 - 120	<0.00020	mg/L	NC	20		
B524566	Total Beryllium (Be)	2024/09/18	102	80 - 120	100	80 - 120	<0.0010	mg/L	NC	20		
B524566	Total Cadmium (Cd)	2024/09/18	107	80 - 120	107	80 - 120	<0.000020	mg/L				
B524566	Total Chromium (Cr)	2024/09/18	105	80 - 120	107	80 - 120	<0.0010	mg/L	NC	20		
B524566	Total Cobalt (Co)	2024/09/18	105	80 - 120	108	80 - 120	<0.00030	mg/L	NC	20		

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Bureau Veritas Job #: C469930
Report Date: 2024/09/20

QUALITY ASSURANCE REPORT(CONT'D)

Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

			Matrix Spike		Spiked Blank		Method Blank		RPD		QC Standard	
QC Batch	Parameter	Date	% Recovery	QC Limits	% Recovery	QC Limits	Value	UNITS	Value (%)	QC Limits	% Recovery	QC Limits
B524566	Total Copper (Cu)	2024/09/18	107	80 - 120	108	80 - 120	<0.0010	mg/L	NC	20		
B524566	Total Lead (Pb)	2024/09/18	103	80 - 120	106	80 - 120	<0.00020	mg/L	NC	20		
B524566	Total Molybdenum (Mo)	2024/09/18	108	80 - 120	107	80 - 120	<0.00020	mg/L	NC	20		
B524566	Total Nickel (Ni)	2024/09/18	105	80 - 120	106	80 - 120	<0.00050	mg/L	NC	20		
B524566	Total Selenium (Se)	2024/09/18	107	80 - 120	107	80 - 120	<0.00020	mg/L	NC	20		
B524566	Total Silver (Ag)	2024/09/18	106	80 - 120	107	80 - 120	<0.00010	mg/L	NC	20		
B524566	Total Thallium (Tl)	2024/09/18	101	80 - 120	103	80 - 120	<0.00020	mg/L	NC	20		
B524566	Total Tin (Sn)	2024/09/18	104	80 - 120	105	80 - 120	<0.0010	mg/L	NC	20		
B524566	Total Titanium (Ti)	2024/09/18	104	80 - 120	106	80 - 120	<0.0010	mg/L	NC	20		
B524566	Total Uranium (U)	2024/09/18	106	80 - 120	108	80 - 120	<0.00010	mg/L	20	20		
B524566	Total Vanadium (V)	2024/09/18	108	80 - 120	109	80 - 120	<0.0010	mg/L	NC	20		
B524566	Total Zinc (Zn)	2024/09/18	106	80 - 120	107	80 - 120	<0.0030	mg/L	NC	20		
B524570	Total Barium (Ba)	2024/09/18	97	80 - 120	107	80 - 120	<0.010	mg/L	1.1	20		
B524570	Total Boron (B)	2024/09/18	NC	80 - 120	105	80 - 120	<0.020	mg/L	NC	20		
B524570	Total Calcium (Ca)	2024/09/18	NC	80 - 120	106	80 - 120	<0.30	mg/L	1.2	20		
B524570	Total Iron (Fe)	2024/09/18	NC	80 - 120	112	80 - 120	<0.070	mg/L	18	20		
B524570	Total Lithium (Li)	2024/09/18	102	80 - 120	106	80 - 120	<0.020	mg/L	NC	20		
B524570	Total Magnesium (Mg)	2024/09/18	NC	80 - 120	109	80 - 120	<0.20	mg/L	1.8	20		
B524570	Total Manganese (Mn)	2024/09/18	NC	80 - 120	108	80 - 120	<0.0040	mg/L	NC	20		
B524570	Total Potassium (K)	2024/09/18	NC	80 - 120	107	80 - 120	<0.30	mg/L	8.0	20		
B524570	Total Silicon (Si)	2024/09/18	105	80 - 120	101	80 - 120	<0.50	mg/L	0.16	20		
B524570	Total Sodium (Na)	2024/09/18	NC	80 - 120	109	80 - 120	<0.50	mg/L	6.3	20		
B524570	Total Strontium (Sr)	2024/09/18	NC	80 - 120	102	80 - 120	<0.020	mg/L	0.34	20		
B524570	Total Sulphur (S)	2024/09/18	110	80 - 120	102	80 - 120	<0.20	mg/L	0.29	20		

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).

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Bureau Veritas Job #: C469930
Report Date: 2024/09/20

Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

VALIDATION SIGNATURE PAGE

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

Ghayasuddin Khan, M.Sc., P.Chem., QP, Scientific Specialist, Inorganics

Sandy Yuan, M.Sc., QP, Scientific Specialist

Bureau Veritas 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 Signatures page if included, otherwise available by request. For Department specific Analyst/Supervisor validation names, please refer to the Test Summary section if included, otherwise available by request. This report is authorized by Scott Cantwell, General Manager responsible for Alberta Environmental laboratory operations.

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

C469930
2024/09/06 12:50

BUREAU VERITAS

ADDITIONAL COOLER TEMPERATURE RECORD

CHAIN-OF-CUSTODY RECORD

CHAIN OF CUSTODY #	
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COOLER OBSERVATIONS:

BV JOB#:

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	8.4 (1)	8.1 (2)	9.0 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	8.0 (1)	8.4 (2)	8.0 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	7.0 (1)	7.1 (2)	6.0 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	5.4 (1)	3.9 (2)	6.4 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	0.3 (1)	0.4 (2)	5.9 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	4.6 (1)	5.1 (2)	5.9 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	3.3 (1)	3.4 (2)	3.7 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	3.8 (1)	3.8 (2)	3.9 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	4.1 (1)	4.3 (2)	4.4 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	2.1 (1)	2.3 (2)	2.4 (3)
INTACT		✓				
ICE PRESENT	✓					

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	4.4 (1)	4.1 (2)	4.2 (3)
INTACT		✓				
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP	1	2	3
INTACT						
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP	1	2	3
INTACT						
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP	1	2	3
INTACT						
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP	1	2	3
INTACT						
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP	1	2	3
INTACT						
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP	1	2	3
INTACT						
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP	1	2	3
INTACT						
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP	1	2	3
INTACT						
ICE PRESENT						

RECEIVED BY (SIGN & PRINT)		DATE (YYYY/MM/DD)	TIME (HH:MM)
[signature]	Snaira Cura	2024/09/06	12:50

C469930
2024/09/06 12:50

CHAIN OF CUSTODY FORM

COC# 102187

SO# 62836

BUREAU VERITAS

Burgundy Diamond Mines
900 - 606 4 Street SW, Calgary, Alberta, Canada T2P 1T1
Tel: 867-880-4400 ext 2157
Burgundy Contact: Richard Ehlert / Jonah Kelly

BURGUNDY DIAMOND MINES

ANALYSIS REQUESTED
Indicate Filtered (F), Preserved (P) or Filtered and Preserved (F/P) below

For Lab Use	SAMPLE INFORMATION						Major Ions	SNP Total Nutrients	Standard Total Metals	pH Field (pH)	Water Temp (°C)
	Sample Point	Station Type	Date	Time	Matrix	Type					
✓	0008-Sa10	EKA 2002 0008	04-Sep-2024	12:22	Water	SNP	Y	Y	Y	7.60	10.9
✓	0008-Sa3	EKA 2002 0008	04-Sep-2024	11:55	Water	SNP	Y	Y	Y	7.53	9.7
✓	0008-Sa9b	EKA 2002 0008	04-Sep-2024	10:48	Water	SNP	Y	Y	Y	7.51	8.6

FOR LAB USE ONLY

MCAL-2024-09-436

Special Instructions (Billing details, QC reporting etc):
Frequency: On the first day of Discharge, weekly during periods of Discharge, and on the final day of Discharge.
Parameters: TSS, major ion, physical parameters, total metals and nutrients.
*** Sample :0008-Sa3, 0008-Sa9b with Profil, 0008-Sa10***
Sent results to Tania.robitaille@burgundydiamonds.com, Landon.Murphy@burgundydiamonds.com & compliance.team@burgundydiamonds.com

Relinquished by:	Date 05-Sep-24 Time 8:00	Received by: Sindira Cura	Date 2024/09/06 Time 12:50
Relinquished by:	Date Time	Received by:	Date Time

FOR LAB USE ONLY

Cooler seal intact upon receipt?	Sample temperature upon receipt:
☐ Yes ☐ No ☐ N/A	Frozen? ☐ Yes ☐ No

Send Analytical Results to: compliance.team@burgundydiamonds.com

see ACR

Your P.O. #: 6404002992
Your Project #: 61984
Site Location: MDMER/SNP/SEEPAGE
Your C.O.C. #: 102228

Attention: COMPLIANCE TEAM

Arctic Canadian Diamond Company Ltd
900, 606 4 Street SW
Calgary, AB
CANADA T2P 1T1

Report Date: 2024/09/19
Report #: R3558852
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C471599
Received: 2024/09/12, 09:30

Sample Matrix: Water
Samples Received: 3

Analyses	Quantity	Date Extracted	Date Analyzed	Laboratory Method	Analytical Method
Acidity pH 4.5 & pH 8.3 (as CaCO3)	3	N/A	2024/09/13	AB SOP-00005	SM 24 2310 B m
Alkalinity - Low Level	3	N/A	2024/09/17	AB SOP-00005	SM 24 2320 B m
Low level chloride/sulphate by AC	3	N/A	2024/09/12	AB SOP-00020	SM24-4500-Cl/SO4-E m
Conductance - Low Level	3	N/A	2024/09/17	AB SOP-00005	SM 24 2510 B m
Fluoride - Low Level	3	N/A	2024/09/17	AB SOP-00005	SM 24 4500-F C m
Hardness Total (calculated as CaCO3) (1)	3	N/A	2024/09/18	BBY WI-00033	Auto Calc
Mercury (Total) by CV	2	2024/09/17	2024/09/17	AB SOP-00084	BCMOE BCLM Oct2013 m
Mercury (Total) by CV	1	2024/09/18	2024/09/18	AB SOP-00084	BCMOE BCLM Oct2013 m
Elements by ICP - Total	3	2024/09/18	2024/09/18	AB SOP-00014 / AB SOP-00042	EPA 6010d R5 m
Elements by ICPMS - Total	3	2024/09/18	2024/09/18	AB SOP-00014 / AB SOP-00043	EPA 6020b R2 m
Ammonia-N Low Level (Preserved)	3	N/A	2024/09/16	AB SOP-00007	SM 24 4500 NH3 A G m
Nitrate + Nitrite-N (calculated) Low Lev	2	N/A	2024/09/18		Auto Calc
Nitrate + Nitrite-N (calculated) Low Lev	1	N/A	2024/09/19		Auto Calc
Nitrogen (Nitrite - Nitrate) Low Level	3	N/A	2024/09/12	AB SOP-00023	SM 24 4110 B m
pH @25°C (2)	3	N/A	2024/09/17	AB SOP-00005	SM 24 4500-H+B m
pH (Field)	3	N/A	2024/09/12	Field Test	Field Test
Orthophosphate LL by Automated Analyzer (3)	3	N/A	2024/09/12	AB SOP-00025	SM 24 4500-P A, F m
Silica (Reactive)	3	N/A	2024/09/12	AB SOP-00011	EPA 370.1 R1978 m
Sulphate (SO4) by IC	3	N/A	2024/09/13	AB SOP-00026	SM 24 4110 B m
Carbon (total) (Calc. - Org. + Inorg.)	3	N/A	2024/09/17		Auto Calc
Temperature (Field)	3	N/A	2024/09/12	Field Test	Field Test
Carbon (Inorganic)	2	N/A	2024/09/16	CAL SOP-00076	Modified AE 2411
Carbon (Inorganic)	1	N/A	2024/09/19	CAL SOP-00076	Modified AE 2411
Total Kjeldahl Nitrogen (Total)	2	N/A	2024/09/18	BBY WI-00033	Auto Calc
Total Kjeldahl Nitrogen (Total)	1	N/A	2024/09/19	BBY WI-00033	Auto Calc
Nitrogen (Total)	3	2024/09/14	2024/09/16	AB SOP-00093	SM 24 4500-N C m
Carbon (Total Organic) (4)	3	N/A	2024/09/17	AB SOP-00087	MMCW 119 1996 m
Total Phosphorus Low Level Total	3	2024/09/14	2024/09/16	AB SOP-00024	SM 24 4500-P A,B,F m
Total Suspended Solids (NFR)	3	2024/09/14	2024/09/15	AB SOP-00061	SM 24 2540 D m
Turbidity	3	N/A	2024/09/12	CAL SOP-00081	SM 24 2130 B m

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Your P.O. #: 6404002992
Your Project #: 61984
Site Location: MDMER/SNP/SEEPAGE
Your C.O.C. #: 102228

Attention: COMPLIANCE TEAM

Arctic Canadian Diamond Company Ltd
900, 606 4 Street SW
Calgary, AB
CANADA T2P 1T1

Report Date: 2024/09/19
Report #: R3558852
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C471599
Received: 2024/09/12, 09:30

Sample Matrix: Water
Samples Received: 3

Analyses	Quantity	Date Extracted	Date Analyzed	Laboratory Method	Analytical Method
Ion Balance (5)	3	N/A	2024/09/18		
Total Dissolved Solids (Calculated) (5)	3	N/A	2024/09/18		

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, EPA, APHA or the Quebec Ministry of Environment.

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.
This Certificate shall not be reproduced except in full, without the written approval of the laboratory.
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) "Total Hardness" was calculated from Total Ca and Mg concentrations and may be biased high (Hardness, or Dissolved Hardness, calculated from Dissolved Ca and Mg, should be used for compliance if available).
(2) The CCME method requires pH to be analysed within 15 minutes of sampling and therefore field analysis is required for compliance. All Laboratory pH analyses in this report are reported past the CCME holding time. Bureau Veritas endeavours to analyze samples as soon as possible after receipt.
(3) Orthophosphate > Total Phosphorus Imbalance: When applicable, Orthophosphate, Total Phosphorus and dissolved Phosphorus results were reviewed and data quality meets acceptable levels unless otherwise noted.
(4) TOC present in the sample should be considered as non-purgeable TOC.
(5) Calculation was conducted as per client request using CAL PDF-00333.

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Your P.O. #: 6404002992
Your Project #: 61984
Site Location: MDMER/SNP/SEEPAGE
Your C.O.C. #: 102228

Attention: COMPLIANCE TEAM

Arctic Canadian Diamond Company Ltd
900, 606 4 Street SW
Calgary, AB
CANADA T2P 1T1

Report Date: 2024/09/19
Report #: R3558852
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C471599
Received: 2024/09/12, 09:30

Encryption Key

Please direct all questions regarding this Certificate of Analysis to:
Geraldlyn Gouthro, Key Account Specialist
Email: geraldlyn.gouthro@bureauveritas.com
Phone# (403) 291-3077

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Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Bureau Veritas Job #: C471599
Report Date: 2024/09/19

Arctic Canadian Diamond Company Ltd
Client Project #: 61984
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

RESULTS OF CHEMICAL ANALYSES OF WATER

Bureau Veritas ID		CVF864			CVF865			CVF866		
Sampling Date		2024/09/09 17:07			2024/09/09 17:01			2024/09/09 16:08		
COC Number		102228			102228			102228		
	UNITS	**0008-SA10**	**RDL**	**QC Batch**	**0008-SA3**	**RDL**	**QC Batch**	**0008-SA9B**	**RDL**	**QC Batch**
Calculated Parameters										
Total Hardness (CaCO3)	mg/L	150	0.50	B513367	80.6	0.50	B513367	21.9	0.50	B513367
Calculated Ion Balance (% Difference)	%	7.4		B513876	3.4		B513876	12		B513876
Nitrate plus Nitrite (N)	mg/L	16	0.010	B513868	2.3	0.0022	B513868	0.12	0.0022	B513868
Calculated Total Dissolved Solids	mg/L	320	3.1	B513877	140	0.95	B513877	42	0.95	B513877
Total Total Kjeldahl Nitrogen (Calc)	mg/L	0.69	0.20	B513312	0.41	0.10	B513312	0.42	0.020	B513312
Field Parameters										
Field pH	pH	7.45	N/A	ONSITE	7.34	N/A	ONSITE	6.96	N/A	ONSITE
Field Temperature (Fd)	deg. C	10.1	N/A	ONSITE	10.0	N/A	ONSITE	9.9	N/A	ONSITE
Misc. Inorganics										
Fluoride (F)	mg/L	0.192	0.010	B516193	0.225	0.010	B516193	0.079	0.010	B516193
pH	pH	6.64	N/A	B516188	6.72	N/A	B516188	6.49	N/A	B516188
Reactive Silica	mg/L	0.84	0.050	B514075	0.55	0.050	B514075	0.25	0.050	B514075
Acidity (pH 4.5)	mg/L	<1.0	1.0	B515652	<1.0	1.0	B515652	<1.0	1.0	B515652
Alkalinity (Total as CaCO3)	mg/L	29.6	0.50	B516181	47.3	0.50	B516181	22.7	0.50	B516181
Total Organic Carbon (C)	mg/L	2.3	0.20	B519938	2.8	0.20	B519938	3.8	0.20	B519938
Acidity (pH 8.3)	mg/L	<1.0	1.0	B515652	<1.0	1.0	B515652	<1.0	1.0	B515652
Alkalinity (PP as CaCO3)	mg/L	<0.50	0.50	B516181	<0.50	0.50	B516181	<0.50	0.50	B516181
Bicarbonate (HCO3)	mg/L	36.1	0.50	B516181	57.7	0.50	B516181	27.7	0.50	B516181
Carbonate (CO3)	mg/L	<0.50	0.50	B516181	<0.50	0.50	B516181	<0.50	0.50	B516181
Hydroxide (OH)	mg/L	<0.50	0.50	B516181	<0.50	0.50	B516181	<0.50	0.50	B516181
Total Suspended Solids	mg/L	<1.0	1.0	B516876	1.8	1.0	B516876	1.4	0.97	B516876
Anions										
Orthophosphate (P)	mg/L	<0.0010	0.0010	B513665	<0.0010	0.0010	B513665	<0.0010	0.0010	B513665
Chloride (Cl)	mg/L	9.7	0.50	B513521	3.9	0.50	B513521	1.4	0.50	B513521
Dissolved-Low Level Sulphate (SO4)	mg/L	140	3.0	B515243	52	0.30	B515243	15	0.30	B515243
Nutrients										
Total Carbon (C)	mg/L	8.7	0.50	B513875	11	0.50	B513875	8.3	0.50	B513875
Total Inorganic Carbon (C)	mg/L	6.4	1.0	B518120	8.5	1.0	B528445	4.4	1.0	B518120
Total Phosphorus (P)	mg/L	<0.0020	0.0020	B517228	0.0091	0.0020	B517228	0.0048	0.0020	B517228
Total Ammonia (N)	mg/L	0.070	0.0050	B517912	0.033	0.0050	B517913	0.30	0.0050	B517912
Nitrite (N)	mg/L	0.085	0.0010	B514432	0.0071	0.0010	B514432	0.0010	0.0010	B514432

RDL = Reportable Detection Limit
N/A = Not Applicable

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Bureau Veritas Job #: C471599
Report Date: 2024/09/19

Arctic Canadian Diamond Company Ltd
Client Project #: 61984
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

RESULTS OF CHEMICAL ANALYSES OF WATER

Bureau Veritas ID		CVF864			CVF865			CVF866		
Sampling Date		2024/09/09 17:07			2024/09/09 17:01			2024/09/09 16:08		
COC Number		102228			102228			102228		
	UNITS	**0008-SA10**	**RDL**	**QC Batch**	**0008-SA3**	**RDL**	**QC Batch**	**0008-SA9B**	**RDL**	**QC Batch**
Nitrate (N)	mg/L	16	0.010	B514432	2.3	0.0020	B514432	0.12	0.0020	B514432
Total Nitrogen (N)	mg/L	17 (1)	0.20	B516905	2.7	0.10	B516905	0.54	0.020	B516905
Physical Properties										
Conductivity	uS/cm	510	1.0	B516189	226	1.0	B516189	76.4	1.0	B516189
Physical Properties										
Turbidity - NTU	NTU	0.12	0.10	B514066	1.6	0.10	B514066	1.2	0.10	B514066

RDL = Reportable Detection Limit
(1) Due to the sample matrix, sample required dilution. Detection limit was adjusted accordingly.

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MERCURY BY COLD VAPOR (WATER)

Bureau Veritas ID		CVF864	CVF865		CVF866		
Sampling Date		2024/09/09 17:07	2024/09/09 17:01		2024/09/09 16:08		
COC Number		102228	102228		102228		
	UNITS	**0008-SA10**	**0008-SA3**	**QC Batch**	**0008-SA9B**	**RDL**	**QC Batch**
Elements							
Total Mercury (Hg)	mg/L	<0.0000019	<0.0000019	B524044	<0.0000019	0.0000019	B526163
RDL = Reportable Detection Limit							

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Bureau Veritas Job #: C471599
Report Date: 2024/09/19

Arctic Canadian Diamond Company Ltd
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Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

ELEMENTS BY ATOMIC SPECTROSCOPY (WATER)

Bureau Veritas ID		CVF864		CVF865		CVF866		
Sampling Date		2024/09/09 17:07		2024/09/09 17:01		2024/09/09 16:08		
COC Number		102228		102228		102228		
	UNITS	**0008-SA10**	**QC Batch**	**0008-SA3**	**QC Batch**	**0008-SA9B**	**RDL**	**QC Batch**
Elements								
Total Aluminum (Al)	mg/L	0.029	B526013	0.15	B525705	0.013	0.0030	B526013
Total Antimony (Sb)	mg/L	<0.00060	B526013	<0.00060	B525705	<0.00060	0.00060	B526013
Total Arsenic (As)	mg/L	0.00034	B526013	0.00039	B525705	0.00038	0.00020	B526013
Total Barium (Ba)	mg/L	0.086	B526018	0.032	B525714	<0.010	0.010	B526018
Total Beryllium (Be)	mg/L	<0.0010	B526013	<0.0010	B525705	<0.0010	0.0010	B526013
Total Boron (B)	mg/L	<0.020	B526018	0.025	B525714	<0.020	0.020	B526018
Total Cadmium (Cd)	mg/L	<0.000020	B526013	<0.000020	B525705	<0.000020	0.000020	B526013
Total Calcium (Ca)	mg/L	23	B526018	13	B525714	3.4	0.30	B526018
Total Chromium (Cr)	mg/L	<0.0010	B526013	<0.0010	B525705	<0.0010	0.0010	B526013
Total Cobalt (Co)	mg/L	<0.00030	B526013	<0.00030	B525705	<0.00030	0.00030	B526013
Total Copper (Cu)	mg/L	<0.0010	B526013	<0.0010	B525705	<0.0010	0.0010	B526013
Total Iron (Fe)	mg/L	<0.060	B526018	0.33	B525714	0.088	0.060	B526018
Total Lead (Pb)	mg/L	<0.00020	B526013	0.00031	B525705	0.00022	0.00020	B526013
Total Lithium (Li)	mg/L	<0.020	B526018	<0.020	B525714	<0.020	0.020	B526018
Total Magnesium (Mg)	mg/L	22	B526018	12	B525714	3.3	0.20	B526018
Total Manganese (Mn)	mg/L	0.0062	B526018	0.024	B525714	0.0090	0.0040	B526018
Total Molybdenum (Mo)	mg/L	0.046	B526013	0.0052	B525705	0.00063	0.00020	B526013
Total Nickel (Ni)	mg/L	0.023	B526013	0.0038	B525705	0.00080	0.00050	B526013
Total Potassium (K)	mg/L	20	B526018	7.8	B525714	2.2	0.30	B526018
Total Selenium (Se)	mg/L	0.00033	B526013	<0.00020	B525705	<0.00020	0.00020	B526013
Total Silicon (Si)	mg/L	<0.50	B526018	0.79	B525714	<0.50	0.50	B526018
Total Silver (Ag)	mg/L	<0.00010	B526013	<0.00010	B525705	<0.00010	0.00010	B526013
Total Sodium (Na)	mg/L	18	B526018	7.6	B525714	2.6	0.50	B526018
Total Strontium (Sr)	mg/L	0.30	B526018	0.12	B525714	0.026	0.020	B526018
Total Sulphur (S)	mg/L	36	B526018	16	B525714	4.2	0.20	B526018
Total Thallium (Tl)	mg/L	<0.00020	B526013	<0.00020	B525705	<0.00020	0.00020	B526013
Total Tin (Sn)	mg/L	<0.0010	B526013	<0.0010	B525705	<0.0010	0.0010	B526013
Total Titanium (Ti)	mg/L	0.0015	B526013	0.013	B525705	<0.0010	0.0010	B526013
Total Uranium (U)	mg/L	0.0041	B526013	0.0017	B525705	<0.00010	0.00010	B526013
Total Vanadium (V)	mg/L	<0.0010	B526013	<0.0010	B525705	<0.0010	0.0010	B526013
Total Zinc (Zn)	mg/L	<0.0030	B526013	<0.0030	B525705	<0.0030	0.0030	B526013
RDL = Reportable Detection Limit								

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Client Project #: 61984
Site Location: MDMER/SNP/SEEPAGE
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GENERAL COMMENTS

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

Package 1	8.2°C
Package 2	8.8°C
Package 3	4.8°C
Package 4	5.5°C
Package 5	8.0°C
Package 6	5.1°C
Package 7	5.7°C
Package 8	5.5°C
Package 9	6.0°C

Results relate only to the items tested.

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Bureau Veritas Job #: C471599
Report Date: 2024/09/19

QUALITY ASSURANCE REPORT

Arctic Canadian Diamond Company Ltd
Client Project #: 61984
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

			Matrix Spike		Spiked Blank		Method Blank		RPD		QC Standard	
QC Batch	Parameter	Date	% Recovery	QC Limits	% Recovery	QC Limits	Value	UNITS	Value (%)	QC Limits	% Recovery	QC Limits
B513521	Chloride (Cl)	2024/09/12	101	80 - 120	100	80 - 120	<0.50	mg/L				
B513665	Orthophosphate (P)	2024/09/12	99	80 - 120	100	80 - 120	0.0010, RDL=0.0010 (1)	mg/L	NC	20		
B514066	Turbidity - NTU	2024/09/12			100	80 - 120	<0.10	NTU	2.5	20		
B514075	Reactive Silica	2024/09/12	NC	80 - 120	105	80 - 120	<0.050	mg/L	0.91	20		
B514432	Nitrate (N)	2024/09/12	100	80 - 120	98	80 - 120	<0.0020	mg/L	9.9	20		
B514432	Nitrite (N)	2024/09/12	100	80 - 120	97	80 - 120	<0.0010	mg/L	NC	20		
B515243	Dissolved-Low Level Sulphate (SO4)	2024/09/13	111	80 - 120	105	80 - 120	<0.050	mg/L	2.2	20		
B515652	Acidity (pH 4.5)	2024/09/13					<1.0	mg/L	NC	20		
B515652	Acidity (pH 8.3)	2024/09/13			97	80 - 120	<1.0	mg/L	NC	20		
B516181	Alkalinity (PP as CaCO3)	2024/09/16					<0.50	mg/L	NC	20		
B516181	Alkalinity (Total as CaCO3)	2024/09/16			95	80 - 120	0.67, RDL=0.50 (1)	mg/L	0.24	20		
B516181	Bicarbonate (HCO3)	2024/09/16					0.82, RDL=0.50	mg/L	0.24	20		
B516181	Carbonate (CO3)	2024/09/16					<0.50	mg/L	NC	20		
B516181	Hydroxide (OH)	2024/09/16					<0.50	mg/L	NC	20		
B516188	pH	2024/09/16			100	97 - 103			0.23	N/A		
B516189	Conductivity	2024/09/16			101	90 - 110	<1.0	uS/cm	0.60	20		
B516193	Fluoride (F)	2024/09/16	101	80 - 120	97	80 - 120	<0.010	mg/L	0.48	20		
B516876	Total Suspended Solids	2024/09/15	106	80 - 120	88	80 - 120	<0.99	mg/L	NC	20		
B516905	Total Nitrogen (N)	2024/09/16	102	80 - 120	108	80 - 120	<0.020	mg/L	2.7	20	115	80 - 120
B517228	Total Phosphorus (P)	2024/09/16	102	80 - 120	98	80 - 120	<0.0010	mg/L	5.5	20	90	80 - 120
B517912	Total Ammonia (N)	2024/09/16	106	80 - 120	103	80 - 120	<0.0050	mg/L	9.6	20		
B517913	Total Ammonia (N)	2024/09/16	107	80 - 120	105	80 - 120	<0.0050	mg/L	NC	20		
B518120	Total Inorganic Carbon (C)	2024/09/16	102	80 - 120	103	80 - 120	<1.0	mg/L				
B519938	Total Organic Carbon (C)	2024/09/17	104	75 - 125	106	80 - 120	<0.20	mg/L	1.0	20		
B524044	Total Mercury (Hg)	2024/09/17	98	80 - 120	98	80 - 120	<0.0000019	mg/L	NC	20		
B525705	Total Aluminum (Al)	2024/09/18	117	80 - 120	108	80 - 120	<0.0030	mg/L	1.8	20		
B525705	Total Antimony (Sb)	2024/09/18	99	80 - 120	103	80 - 120	<0.00060	mg/L	NC	20		
B525705	Total Arsenic (As)	2024/09/18	105	80 - 120	104	80 - 120	<0.00020	mg/L	0.063	20		
B525705	Total Beryllium (Be)	2024/09/18	100	80 - 120	99	80 - 120	<0.0010	mg/L	NC	20		

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QUALITY ASSURANCE REPORT(CONT'D)

Arctic Canadian Diamond Company Ltd
Client Project #: 61984
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

			Matrix Spike		Spiked Blank		Method Blank		RPD		QC Standard	
QC Batch	Parameter	Date	% Recovery	QC Limits	% Recovery	QC Limits	Value	UNITS	Value (%)	QC Limits	% Recovery	QC Limits
B525705	Total Cadmium (Cd)	2024/09/18	104	80 - 120	102	80 - 120	<0.000020	mg/L	9.2	20		
B525705	Total Chromium (Cr)	2024/09/18	102	80 - 120	103	80 - 120	<0.0010	mg/L	3.0	20		
B525705	Total Cobalt (Co)	2024/09/18	101	80 - 120	103	80 - 120	<0.00030	mg/L	2.3	20		
B525705	Total Copper (Cu)	2024/09/18	101	80 - 120	103	80 - 120	<0.0010	mg/L	6.5	20		
B525705	Total Lead (Pb)	2024/09/18	100	80 - 120	103	80 - 120	<0.00020	mg/L	NC	20		
B525705	Total Molybdenum (Mo)	2024/09/18	104	80 - 120	103	80 - 120	<0.00020	mg/L	2.4	20		
B525705	Total Nickel (Ni)	2024/09/18	100	80 - 120	102	80 - 120	<0.00050	mg/L	5.5	20		
B525705	Total Selenium (Se)	2024/09/18	105	80 - 120	107	80 - 120	<0.00020	mg/L	NC	20		
B525705	Total Silver (Ag)	2024/09/18	102	80 - 120	100	80 - 120	<0.00010	mg/L	NC	20		
B525705	Total Thallium (Tl)	2024/09/18	98	80 - 120	100	80 - 120	<0.00020	mg/L	NC	20		
B525705	Total Tin (Sn)	2024/09/18	102	80 - 120	101	80 - 120	<0.0010	mg/L	NC	20		
B525705	Total Titanium (Ti)	2024/09/18	103	80 - 120	103	80 - 120	<0.0010	mg/L	2.2	20		
B525705	Total Uranium (U)	2024/09/18	103	80 - 120	103	80 - 120	<0.00010	mg/L	2.6	20		
B525705	Total Vanadium (V)	2024/09/18	103	80 - 120	105	80 - 120	<0.0010	mg/L	2.7	20		
B525705	Total Zinc (Zn)	2024/09/18	102	80 - 120	104	80 - 120	<0.0030	mg/L	17	20		
B525714	Total Barium (Ba)	2024/09/18	105	80 - 120	109	80 - 120	<0.010	mg/L	3.4	20		
B525714	Total Boron (B)	2024/09/18	104	80 - 120	107	80 - 120	<0.020	mg/L	4.3	20		
B525714	Total Calcium (Ca)	2024/09/18	NC	80 - 120	105	80 - 120	<0.30	mg/L	3.0	20		
B525714	Total Iron (Fe)	2024/09/18	NC	80 - 120	114	80 - 120	<0.060	mg/L	1.9	20		
B525714	Total Lithium (Li)	2024/09/18	104	80 - 120	104	80 - 120	<0.020	mg/L	NC	20		
B525714	Total Magnesium (Mg)	2024/09/18	NC	80 - 120	108	80 - 120	<0.20	mg/L	3.4	20		
B525714	Total Manganese (Mn)	2024/09/18	110	80 - 120	111	80 - 120	<0.0040	mg/L	2.7	20		
B525714	Total Potassium (K)	2024/09/18	105	80 - 120	106	80 - 120	<0.30	mg/L	3.3	20		
B525714	Total Silicon (Si)	2024/09/18	NC	80 - 120	105	80 - 120	<0.50	mg/L	2.7	20		
B525714	Total Sodium (Na)	2024/09/18	NC	80 - 120	108	80 - 120	<0.50	mg/L	3.5	20		
B525714	Total Strontium (Sr)	2024/09/18	99	80 - 120	103	80 - 120	<0.020	mg/L	3.7	20		
B525714	Total Sulphur (S)	2024/09/18	NC	80 - 120	105	80 - 120	<0.20	mg/L	4.9	20		
B526013	Total Aluminum (Al)	2024/09/18	NC	80 - 120	118	80 - 120	<0.0030	mg/L	1.6	20		
B526013	Total Antimony (Sb)	2024/09/18	100	80 - 120	109	80 - 120	<0.00060	mg/L	NC	20		
B526013	Total Arsenic (As)	2024/09/18	103	80 - 120	115	80 - 120	<0.00020	mg/L	NC	20		
B526013	Total Beryllium (Be)	2024/09/18	101	80 - 120	103	80 - 120	<0.0010	mg/L	NC	20		
B526013	Total Cadmium (Cd)	2024/09/18	104	80 - 120	111	80 - 120	<0.000020	mg/L				

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QUALITY ASSURANCE REPORT(CONT'D)

Arctic Canadian Diamond Company Ltd
Client Project #: 61984
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

			Matrix Spike		Spiked Blank		Method Blank		RPD		QC Standard	
QC Batch	Parameter	Date	% Recovery	QC Limits	% Recovery	QC Limits	Value	UNITS	Value (%)	QC Limits	% Recovery	QC Limits
B526013	Total Chromium (Cr)	2024/09/18	100	80 - 120	112	80 - 120	<0.0010	mg/L	7.7	20		
B526013	Total Cobalt (Co)	2024/09/18	98	80 - 120	112	80 - 120	<0.00030	mg/L	NC	20		
B526013	Total Copper (Cu)	2024/09/18	98	80 - 120	113	80 - 120	<0.0010	mg/L	NC	20		
B526013	Total Lead (Pb)	2024/09/18	100	80 - 120	112	80 - 120	<0.00020	mg/L	NC	20		
B526013	Total Molybdenum (Mo)	2024/09/18	107	80 - 120	112	80 - 120	<0.00020	mg/L	NC	20		
B526013	Total Nickel (Ni)	2024/09/18	98	80 - 120	111	80 - 120	<0.00050	mg/L	11	20		
B526013	Total Selenium (Se)	2024/09/18	100	80 - 120	109	80 - 120	<0.00020	mg/L	NC	20		
B526013	Total Silver (Ag)	2024/09/18	102	80 - 120	110	80 - 120	<0.00010	mg/L	3.2	20		
B526013	Total Thallium (Tl)	2024/09/18	98	80 - 120	109	80 - 120	<0.00020	mg/L	NC	20		
B526013	Total Tin (Sn)	2024/09/18	106	80 - 120	111	80 - 120	<0.0010	mg/L	2.7	20		
B526013	Total Titanium (Ti)	2024/09/18	96	80 - 120	116	80 - 120	<0.0010	mg/L	NC	20		
B526013	Total Uranium (U)	2024/09/18	102	80 - 120	115	80 - 120	<0.00010	mg/L	NC	20		
B526013	Total Vanadium (V)	2024/09/18	103	80 - 120	114	80 - 120	<0.0010	mg/L	NC	20		
B526013	Total Zinc (Zn)	2024/09/18	99	80 - 120	112	80 - 120	<0.0030	mg/L	17	20		
B526018	Total Barium (Ba)	2024/09/18	105	80 - 120	104	80 - 120	<0.010	mg/L	NC	20		
B526018	Total Boron (B)	2024/09/18	105	80 - 120	102	80 - 120	<0.020	mg/L	NC	20		
B526018	Total Calcium (Ca)	2024/09/18	NC	80 - 120	95	80 - 120	<0.30	mg/L	1.8	20		
B526018	Total Iron (Fe)	2024/09/18	NC	80 - 120	106	80 - 120	<0.060	mg/L	4.0	20		
B526018	Total Lithium (Li)	2024/09/18	94	80 - 120	91	80 - 120	<0.020	mg/L	NC	20		
B526018	Total Magnesium (Mg)	2024/09/18	NC	80 - 120	99	80 - 120	<0.20	mg/L	NC	20		
B526018	Total Manganese (Mn)	2024/09/18	107	80 - 120	103	80 - 120	<0.0040	mg/L	2.9	20		
B526018	Total Potassium (K)	2024/09/18	93	80 - 120	95	80 - 120	<0.30	mg/L	NC	20		
B526018	Total Silicon (Si)	2024/09/18	NC	80 - 120	94	80 - 120	<0.50	mg/L	NC	20		
B526018	Total Sodium (Na)	2024/09/18	96	80 - 120	95	80 - 120	<0.50	mg/L	NC	20		
B526018	Total Strontium (Sr)	2024/09/18	103	80 - 120	98	80 - 120	<0.020	mg/L	NC	20		
B526018	Total Sulphur (S)	2024/09/18	NC	80 - 120	95	80 - 120	<0.20	mg/L	1.6	20		
B526163	Total Mercury (Hg)	2024/09/18	101	80 - 120	98	80 - 120	<0.0000019	mg/L	NC	20		

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Bureau Veritas Job #: C471599
Report Date: 2024/09/19

QUALITY ASSURANCE REPORT(CONT'D)

Arctic Canadian Diamond Company Ltd
Client Project #: 61984
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

			Matrix Spike		Spiked Blank		Method Blank		RPD		QC Standard	
QC Batch	Parameter	Date	% Recovery	QC Limits	% Recovery	QC Limits	Value	UNITS	Value (%)	QC Limits	% Recovery	QC Limits
B528445	Total Inorganic Carbon (C)	2024/09/19	105	80 - 120	110	80 - 120	<1.0	mg/L	3.5	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) Method blank exceeds acceptance limits, 2x RDL acceptable for low level analysis

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Bureau Veritas Job #: C471599
Report Date: 2024/09/19

Arctic Canadian Diamond Company Ltd
Client Project #: 61984
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

VALIDATION SIGNATURE PAGE

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

Ghayasuddin Khan, M.Sc., P.Chem., QP, Scientific Specialist, Inorganics

Sandy Yuan, M.Sc., QP, Scientific Specialist

Bureau Veritas 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 Signatures page if included, otherwise available by request. For Department specific Analyst/Supervisor validation names, please refer to the Test Summary section if included, otherwise available by request. This report is authorized by Scott Cantwell, General Manager responsible for Alberta Environmental laboratory operations.

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CHAIN OF CUSTODY FORM

COC# 102228

SO# 61984

BUREAU VERITAS

Burgundy Diamond Mines
900 - 606 4 Street SW, Calgary, Alberta, Canada T2P 1T1
Tel: 867-880-4400 ext 2157
Burgundy Contact: Richard Ehlert / Jonah Kelly

BURGUNDY DIAMOND MINES

ANALYSIS REQUESTED
Indicate Filtered (F), Preserved (P) or Filtered and Preserved (F/P) below

For Lab Use	SAMPLE INFORMATION						Major Ions	SNP Total Nutrients	Standard Total Metals	pH Field (pH)	Water Temp (°C)
	Sample Point	Station Type	Date	Time	Matrix	Type					
	0008-Sa10	EKA 2002 0008	09-Sep-2024	17:07	Water	SNP	Y	Y	Y	7.45	10.1
	0008-Sa3	EKA 2002 0008	09-Sep-2024	17:01	Water	SNP	Y	Y	Y	7.34	10.0
	0008-Sa9b	EKA 2002 0008	09-Sep-2024	16:08	Water	SNP	Y	Y	Y	6.96	9.9

FOR LAB USE ONLY

MCAL-2024-09-924

Special Instructions (Billing details, QC reporting etc):
Frequency: On the first day of Discharge, weekly during periods of Discharge, and on the final day of Discharge.
Parameters: TSS, major ion, physical parameters, total metals and nutrients.
*** Sample :0008-Sa3, 0008-Sa9b with Profil, 0008-Sa10***
Sent results to Tania.robitaille@burgundydiamonds.com, Landon.Murphy@burgundydiamonds.com & compliance.team@burgundydiamonds.com

Relinquished by:	Date 11-Sep-24 Time 7:30	Received by: SEAN EM	Date 2024/09/12 Time 09:30
Relinquished by:	Date Time	Received by:	Date Time

FOR LAB USE ONLY

Cooler seal intact upon receipt? ☐ Yes ☐ No ☐ N/A

Sample temperature upon receipt: Frozen? ☐ Yes ☐ No

ACTR

Send Analytical Results to: compliance.team@burgundydiamonds.com

C471599
2024/09/12 09:30

COR FCD-00265 / 5
Page ___ of ___

BUREAU VERITAS

ADDITIONAL COOLER TEMPERATURE RECORD

CHAIN-OF-CUSTODY RECORD

CHAIN OF CUSTODY #	
Page ___ of ___	
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COOLER OBSERVATIONS:

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	7.9	8.3	6.4
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID TROUT			
PRESENT		✓	TEMP	9.8	8.8	7.7
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID TROUT			
PRESENT		✓	TEMP	6.6	3.9	3.9
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID TROUT			
PRESENT		✓	TEMP	5.5	5.5	5.5
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	8.0	8.0	8.0
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	3.9	3.9	7.6
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	6.6	6.6	3.9
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	5.5	5.5	5.5
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	6.0	6.0	6.0
INTACT		✓		1	2	3
ICE PRESENT	✓					
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						

BV JOB#:

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						
CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						

RECEIVED BY (SIGN & PRINT)		DATE (YYYY/MM/DD)	TIME (HH:MM)
[signature]	SEAN ENZ	2024/09/12	09:30

Your P.O. #: 6404002992
Site Location: MDMER/SNP/SEEPAGE
Your C.O.C. #: 102248

Attention: COMPLIANCE TEAM

Arctic Canadian Diamond Company Ltd
900, 606 4 Street SW
Calgary, AB
CANADA T2P 1T1

Report Date: 2024/10/01
Report #: R3564876
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C473831
Received: 2024/09/18, 15:00

Sample Matrix: Water
Samples Received: 3

Analyses	Quantity	Date Extracted	Date Analyzed	Laboratory Method	Analytical Method
Acidity pH 4.5 & pH 8.3 (as CaCO3)	3	N/A	2024/09/24	AB SOP-00005	SM 24 2310 B m
Alkalinity - Low Level	2	N/A	2024/09/20	AB SOP-00005	SM 24 2320 B m
Alkalinity - Low Level	1	N/A	2024/09/25	AB SOP-00005	SM 24 2320 B m
Low level chloride/sulphate by AC	3	N/A	2024/09/19	AB SOP-00020	SM24-4500-Cl/SO4-E m
Conductance - Low Level	2	N/A	2024/09/20	AB SOP-00005	SM 24 2510 B m
Conductance - Low Level	1	N/A	2024/09/25	AB SOP-00005	SM 24 2510 B m
Fluoride - Low Level	2	N/A	2024/09/20	AB SOP-00005	SM 24 4500-F C m
Fluoride - Low Level	1	N/A	2024/09/25	AB SOP-00005	SM 24 4500-F C m
Hardness Total (calculated as CaCO3) (1)	1	N/A	2024/09/27	BBY WI-00033	Auto Calc
Hardness Total (calculated as CaCO3) (1)	1	N/A	2024/09/29	BBY WI-00033	Auto Calc
Hardness Total (calculated as CaCO3) (1)	1	N/A	2024/09/30	BBY WI-00033	Auto Calc
Mercury (Total) by CV	3	2024/09/20	2024/09/23	AB SOP-00084	BCMOE BCLM Oct2013 m
Elements by ICP - Total	2	2024/09/27	2024/09/27	AB SOP-00014 / AB SOP-00042	EPA 6010d R5 m
Elements by ICP - Total	1	2024/09/27	2024/09/28	AB SOP-00014 / AB SOP-00042	EPA 6010d R5 m
Elements by ICPMS - Total	3	2024/09/27	2024/09/27	AB SOP-00014 / AB SOP-00043	EPA 6020b R2 m
Ammonia-N Low Level (Preserved)	3	N/A	2024/09/19	AB SOP-00007	SM 24 4500 NH3 A G m
Nitrate + Nitrite-N (calculated) Low Lev	3	N/A	2024/09/20		Auto Calc
Nitrogen (Nitrite - Nitrate) Low Level	2	N/A	2024/09/19	AB SOP-00023	SM 24 4110 B m
Nitrogen (Nitrite - Nitrate) Low Level	1	N/A	2024/09/26	AB SOP-00023	SM 24 4110 B m
pH @25°C (2)	2	N/A	2024/09/20	AB SOP-00005	SM 24 4500-H+B m
pH @25°C (2)	1	N/A	2024/09/25	AB SOP-00005	SM 24 4500-H+B m
pH (Field)	3	N/A	2024/09/18	Field Test	Field Test
Orthophosphate LL by Automated Analyzer (3)	3	N/A	2024/09/19	AB SOP-00025	SM 24 4500-P A, F m
Silica (Reactive)	3	N/A	2024/09/19	AB SOP-00011	EPA 370.1 R1978 m
Sulphate (SO4) by IC	3	N/A	2024/09/21	AB SOP-00026	SM 24 4110 B m
Carbon (total) (Calc. - Org. + Inorg.)	3	N/A	2024/09/25		Auto Calc
Temperature (Field)	3	N/A	2024/09/18	Field Test	Field Test
Carbon (Inorganic)	3	N/A	2024/09/24	CAL SOP-00076	Modified AE 2411
Total Kjeldahl Nitrogen (Total)	3	N/A	2024/09/23	BBY WI-00033	Auto Calc

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Your P.O. #: 6404002992
Site Location: MDMER/SNP/SEEPAGE
Your C.O.C. #: 102248

Attention: COMPLIANCE TEAM

Arctic Canadian Diamond Company Ltd
900, 606 4 Street SW
Calgary, AB
CANADA T2P 1T1

Report Date: 2024/10/01
Report #: R3564876
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C473831
Received: 2024/09/18, 15:00

Sample Matrix: Water
Samples Received: 3

Analyses	Quantity	Date Extracted	Date Analyzed	Laboratory Method	Analytical Method
Nitrogen (Total)	3	2024/09/20	2024/09/23	AB SOP-00093	SM 24 4500-N C m
Carbon (Total Organic) (4)	3	N/A	2024/09/24	AB SOP-00087	MMCW 119 1996 m
Total Phosphorus Low Level Total	3	2024/09/20	2024/09/20	AB SOP-00024	SM 24 4500-P A,B,F m
Total Suspended Solids (NFR)	3	2024/09/18	2024/09/19	AB SOP-00061	SM 24 2540 D m
Turbidity	3	N/A	2024/09/19	CAL SOP-00081	SM 24 2130 B m
Ion Balance (5)	1	N/A	2024/09/27		
Ion Balance (5)	1	N/A	2024/09/29		
Ion Balance (5)	1	N/A	2024/09/30		
Total Dissolved Solids (Calculated) (5)	1	N/A	2024/09/27		
Total Dissolved Solids (Calculated) (5)	1	N/A	2024/09/29		
Total Dissolved Solids (Calculated) (5)	1	N/A	2024/09/30		

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, EPA, APHA or the Quebec Ministry of Environment.

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.
This Certificate shall not be reproduced except in full, without the written approval of the laboratory.
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) "Total Hardness" was calculated from Total Ca and Mg concentrations and may be biased high (Hardness, or Dissolved Hardness, calculated from Dissolved Ca and Mg, should be

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Your P.O. #: 6404002992
Site Location: MDMER/SNP/SEEPAGE
Your C.O.C. #: 102248

Attention: COMPLIANCE TEAM

Arctic Canadian Diamond Company Ltd
900, 606 4 Street SW
Calgary, AB
CANADA T2P 1T1

Report Date: 2024/10/01
Report #: R3564876
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C473831
Received: 2024/09/18, 15:00

used for compliance if available).
(2) The CCME method requires pH to be analysed within 15 minutes of sampling and therefore field analysis is required for compliance. All Laboratory pH analyses in this report are reported past the CCME holding time. Bureau Veritas endeavours to analyze samples as soon as possible after receipt.
(3) Orthophosphate > Total Phosphorus Imbalance: When applicable, Orthophosphate, Total Phosphorus and dissolved Phosphorus results were reviewed and data quality meets acceptable levels unless otherwise noted.
(4) TOC present in the sample should be considered as non-purgeable TOC.
(5) Calculation was conducted as per client request using CAL PDF-00333.

Encryption Key

Please direct all questions regarding this Certificate of Analysis to:
Geraldlyn Gouthro, Key Account Specialist
Email: geraldlyn.gouthro@bureauveritas.com
Phone# (403) 291-3077
==========
This report has been generated and distributed using a secure automated process.
Bureau Veritas 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 Signatures page if included, otherwise available by request. For Department specific Analyst/Supervisor validation names, please refer to the Test Summary section if included, otherwise available by request. This report is authorized by Scott Cantwell, General Manager responsible for Alberta Environmental laboratory operations.

Bureau Veritas Calgary: 2021 - 41st Avenue N.E. T2E 6P2 Telephone (403) 291-3077 Fax (403) 291-9468

Bureau Veritas Job #: C473831
Report Date: 2024/10/01

Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

RESULTS OF CHEMICAL ANALYSES OF WATER

Bureau Veritas ID		CVT090			CVT091			CVT092		
Sampling Date		2024/09/11 12:41			2024/09/11 12:55			2024/09/11 13:53		
COC Number		102248			102248			102248		
	UNITS	**0008-SA10**	**RDL**	**QC Batch**	**0008-SA3**	**RDL**	**QC Batch**	**0008-SA9B**	**RDL**	**QC Batch**
Calculated Parameters										
Total Hardness (CaCO3)	mg/L	150	0.50	B525801	80.1	0.50	B525801	24.9	0.50	B525801
Calculated Ion Balance (% Difference)	%	9.9		B527024	1.1		B527024	1.7		B527024
Nitrate plus Nitrite (N)	mg/L	16	0.020	B527011	2.5	0.0022	B527011	0.14	0.0022	B527011
Calculated Total Dissolved Solids	mg/L	330	1.8	B527025	130	0.95	B527025	39	0.95	B527025
Total Total Kjeldahl Nitrogen (Calc)	mg/L	<0.30	0.30	B526814	0.12	0.075	B526814	0.37	0.020	B526814
Field Parameters										
Field pH	pH	7.73	N/A	ONSITE	7.84	N/A	ONSITE	7.54	N/A	ONSITE
Field Temperature (Fd)	deg. C	9.7	N/A	ONSITE	8.7	N/A	ONSITE	7.5	N/A	ONSITE
Misc. Inorganics										
Fluoride (F)	mg/L	0.091	0.010	B528098	0.239	0.010	B528098	0.077	0.010	B534955
pH	pH	6.01	N/A	B528094	6.14	N/A	B528094	6.63	N/A	B534942
Reactive Silica	mg/L	0.78	0.050	B527802	0.56	0.050	B527802	0.25	0.050	B527806
Acidity (pH 4.5)	mg/L	<1.0	1.0	B533576	<1.0	1.0	B533576	<1.0	1.0	B533576
Alkalinity (Total as CaCO3)	mg/L	25.5	0.50	B528003	38.9	0.50	B528003	17.1	0.50	B534939
Total Organic Carbon (C)	mg/L	2.1	0.20	B535029	2.5	0.20	B535029	3.7	0.20	B535029
Acidity (pH 8.3)	mg/L	9.0	1.0	B533576	2.2	1.0	B533576	1.6	1.0	B533576
Alkalinity (PP as CaCO3)	mg/L	<0.50	0.50	B528003	<0.50	0.50	B528003	<0.50	0.50	B534939
Bicarbonate (HCO3)	mg/L	31.1	0.50	B528003	47.4	0.50	B528003	20.8	0.50	B534939
Carbonate (CO3)	mg/L	<0.50	0.50	B528003	<0.50	0.50	B528003	<0.50	0.50	B534939
Hydroxide (OH)	mg/L	<0.50	0.50	B528003	<0.50	0.50	B528003	<0.50	0.50	B534939
Total Suspended Solids	mg/L	<0.99	0.99	B526314	<1.0	1.0	B526314	1.7	1.0	B526314
Anions										
Orthophosphate (P)	mg/L	<0.0010	0.0010	B527884	<0.0010	0.0010	B527884	<0.0010	0.0010	B527884
Chloride (Cl)	mg/L	8.7	0.50	B527582	3.8	0.50	B527582	1.1	0.50	B527582
Dissolved-Low Level Sulphate (SO4)	mg/L	150	1.5	B531360	53	0.30	B531360	14	0.30	B531360
Nutrients										
Total Carbon (C)	mg/L	7.2	0.50	B527019	11	0.50	B527019	6.6	0.50	B527019
Total Inorganic Carbon (C)	mg/L	5.0	1.0	B534811	8.2	1.0	B534410	2.9	1.0	B534410
Total Phosphorus (P)	mg/L	<0.0020	0.0020	B529522	0.0025	0.0020	B529522	0.0064	0.0020	B529522
Total Ammonia (N)	mg/L	0.053	0.0050	B527700	0.029	0.0050	B527700	<0.0050	0.0050	B527700
Nitrite (N)	mg/L	0.072	0.0010	B528001	0.0050	0.0010	B538252	<0.0010	0.0010	B528001

RDL = Reportable Detection Limit
N/A = Not Applicable

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Bureau Veritas Job #: C473831
Report Date: 2024/10/01

Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

RESULTS OF CHEMICAL ANALYSES OF WATER

Bureau Veritas ID		CVT090			CVT091			CVT092		
Sampling Date		2024/09/11 12:41			2024/09/11 12:55			2024/09/11 13:53		
COC Number		102248			102248			102248		
	UNITS	**0008-SA10**	**RDL**	**QC Batch**	**0008-SA3**	**RDL**	**QC Batch**	**0008-SA9B**	**RDL**	**QC Batch**
Nitrate (N)	mg/L	16	0.020	B528001	2.5	0.0020	B538252	0.14	0.0020	B538252
Total Nitrogen (N)	mg/L	17 (1)	0.20	B529885	2.8	0.040	B529885	0.54	0.020	B529885
Physical Properties										
Conductivity	uS/cm	465	1.0	B528046	212	1.0	B528046	72.5	1.0	B534950
Physical Properties										
Turbidity - NTU	NTU	<0.10	0.10	B528193	<0.10	0.10	B528193	1.0	0.10	B528193

RDL = Reportable Detection Limit
(1) Due to the sample matrix, sample required dilution. Detection limit was adjusted accordingly.

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Bureau Veritas Job #: C473831
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Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

MERCURY BY COLD VAPOR (WATER)

Bureau Veritas ID		CVT090	CVT091	CVT092		
Sampling Date		2024/09/11 12:41	2024/09/11 12:55	2024/09/11 13:53		
COC Number		102248	102248	102248		
	UNITS	**0008-SA10**	**0008-SA3**	**0008-SA9B**	**RDL**	**QC Batch**
Elements						
Total Mercury (Hg)	mg/L	<0.0000019	<0.0000019	<0.0000019	0.0000019	B529872
RDL = Reportable Detection Limit						

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Bureau Veritas Job #: C473831
Report Date: 2024/10/01

Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

ELEMENTS BY ATOMIC SPECTROSCOPY (WATER)

Bureau Veritas ID		CVT090		CVT091		CVT092		
Sampling Date		2024/09/11 12:41		2024/09/11 12:55		2024/09/11 13:53		
COC Number		102248		102248		102248		
	UNITS	**0008-SA10**	**QC Batch**	**0008-SA3**	**QC Batch**	**0008-SA9B**	**RDL**	**QC Batch**
Elements								
Total Aluminum (Al)	mg/L	0.019	B539832	0.017	B540075	0.0092	0.0030	B539731
Total Antimony (Sb)	mg/L	<0.00060	B539832	<0.00060	B540075	<0.00060	0.00060	B539731
Total Arsenic (As)	mg/L	0.00035	B539832	0.00047	B540075	0.00032	0.00020	B539731
Total Barium (Ba)	mg/L	0.089	B539849	0.026	B540078	<0.010	0.010	B539733
Total Beryllium (Be)	mg/L	<0.0010	B539832	<0.0010	B540075	<0.0010	0.0010	B539731
Total Boron (B)	mg/L	0.023	B539849	<0.020	B540078	<0.020	0.020	B539733
Total Cadmium (Cd)	mg/L	0.000026	B539832	<0.000020	B540075	<0.000020	0.000020	B539731
Total Calcium (Ca)	mg/L	22	B539849	13	B540078	3.9	0.30	B539733
Total Chromium (Cr)	mg/L	<0.0010	B539832	<0.0010	B540075	<0.0010	0.0010	B539731
Total Cobalt (Co)	mg/L	<0.00030	B539832	0.00033	B540075	<0.00030	0.00030	B539731
Total Copper (Cu)	mg/L	<0.0010	B539832	<0.0010	B540075	<0.0010	0.0010	B539731
Total Iron (Fe)	mg/L	<0.060	B539849	0.090	B540078	0.089	0.060	B539733
Total Lead (Pb)	mg/L	0.0089	B539832	<0.00020	B540075	<0.00020	0.00020	B539731
Total Lithium (Li)	mg/L	<0.020	B539849	<0.020	B540078	<0.020	0.020	B539733
Total Magnesium (Mg)	mg/L	23	B539849	11	B540078	3.7	0.20	B539733
Total Manganese (Mn)	mg/L	0.0041	B539849	0.019	B540078	0.0071	0.0040	B539733
Total Molybdenum (Mo)	mg/L	0.044	B539832	0.030	B540075	0.00046	0.00020	B539731
Total Nickel (Ni)	mg/L	0.021	B539832	0.0057	B540075	<0.00050	0.00050	B539731
Total Potassium (K)	mg/L	19	B539849	7.9	B540078	2.6	0.30	B539733
Total Selenium (Se)	mg/L	0.00032	B539832	<0.00020	B540075	<0.00020	0.00020	B539731
Total Silicon (Si)	mg/L	<0.50	B539849	<0.50	B540078	<0.50	0.50	B539733
Total Silver (Ag)	mg/L	<0.00010	B539832	<0.00010	B540075	<0.00010	0.00010	B539731
Total Sodium (Na)	mg/L	15	B539849	7.5	B540078	2.9	0.50	B539733
Total Strontium (Sr)	mg/L	0.32	B539849	0.12	B540078	0.028	0.020	B539733
Total Sulphur (S)	mg/L	37	B539849	16	B540078	4.3	0.20	B539733
Total Thallium (Tl)	mg/L	<0.00020	B539832	<0.00020	B540075	<0.00020	0.00020	B539731
Total Tin (Sn)	mg/L	<0.0010	B539832	<0.0010	B540075	<0.0010	0.0010	B539731
Total Titanium (Ti)	mg/L	<0.0010	B539832	<0.0010	B540075	<0.0010	0.0010	B539731
Total Uranium (U)	mg/L	0.0042	B539832	0.0022	B540075	0.00010	0.00010	B539731
Total Vanadium (V)	mg/L	<0.0010	B539832	<0.0010	B540075	<0.0010	0.0010	B539731
Total Zinc (Zn)	mg/L	<0.0030	B539832	<0.0030	B540075	<0.0030	0.0030	B539731
RDL = Reportable Detection Limit								

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GENERAL COMMENTS

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

Package 1	6.0°C
Package 2	4.9°C
Package 3	5.6°C
Package 4	4.8°C
Package 5	5.4°C
Package 6	6.7°C
Package 7	5.3°C
Package 8	4.9°C
Package 9	5.5°C
Package 10	4.9°C
Package 11	4.0°C
Package 12	4.5°C
Package 13	6.9°C
Package 14	6.1°C
Package 15	4.3°C

Sample CVT090 [0008-SA10] : Sample was analyzed past method specified hold time for Orthophosphate LL by Automated Analyzer. Exceedance of hold time increases the uncertainty of test results but does not necessarily imply that results are compromised. Sample was analyzed past method specified hold time for Turbidity. Sample was analyzed past method specified hold time for NO2 (N); NO2 (N) + NO3 (N) in Water (LL). Sample was analyzed past method specified hold time for Nitrogen (Nitrite - Nitrate) Low Level.

Sample CVT091 [0008-SA3] : Sample was analyzed past method specified hold time for Orthophosphate LL by Automated Analyzer. Exceedance of hold time increases the uncertainty of test results but does not necessarily imply that results are compromised. Sample was analyzed past method specified hold time for Turbidity. Sample was analyzed past method specified hold time for NO2 (N); NO2 (N) + NO3 (N) in Water (LL). Sample was analyzed past method specified hold time for Nitrogen (Nitrite - Nitrate) Low Level.

Sample CVT092 [0008-SA9B] : Sample was analyzed past method specified hold time for Orthophosphate LL by Automated Analyzer. Exceedance of hold time increases the uncertainty of test results but does not necessarily imply that results are compromised. Sample was analyzed past method specified hold time for Turbidity. Sample was analyzed past method specified hold time for NO2 (N); NO2 (N) + NO3 (N) in Water (LL). Sample was analyzed past method specified hold time for Nitrogen (Nitrite - Nitrate) Low Level.

RESULTS OF CHEMICAL ANALYSES OF WATER Comments

Sample CVT090 [0008-SA10] Orthophosphate LL by Automated Analyzer: Sample was past hold time when received from FV.
Sample CVT091 [0008-SA3] Orthophosphate LL by Automated Analyzer: Sample was past hold time when received from FV.
Sample CVT092 [0008-SA9B] Orthophosphate LL by Automated Analyzer: Sample was past hold time when received from FV.
Sample CVT092, Nitrogen (Nitrite - Nitrate) Low Level: Test repeated.

Results relate only to the items tested.

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Bureau Veritas Job #: C473831
Report Date: 2024/10/01

QUALITY ASSURANCE REPORT

Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

			Matrix Spike		Spiked Blank		Method Blank		RPD		QC Standard	
QC Batch	Parameter	Date	% Recovery	QC Limits	% Recovery	QC Limits	Value	UNITS	Value (%)	QC Limits	% Recovery	QC Limits
B526314	Total Suspended Solids	2024/09/18	103	80 - 120	98	80 - 120	<1.0	mg/L	NC	20		
B527582	Chloride (Cl)	2024/09/19	100	80 - 120	95	80 - 120	<0.50	mg/L				
B527700	Total Ammonia (N)	2024/09/19	104	80 - 120	104	80 - 120	<0.0050	mg/L	NC	20		
B527802	Reactive Silica	2024/09/19	98	80 - 120	108	80 - 120	<0.050	mg/L	2.5	20		
B527806	Reactive Silica	2024/09/19	80	80 - 120	104	80 - 120	<0.050	mg/L	0.92	20		
B527884	Orthophosphate (P)	2024/09/19	111	80 - 120	99	80 - 120	<0.0010	mg/L	NC	20		
B528001	Nitrate (N)	2024/09/19	98	80 - 120	99	80 - 120	<0.0020	mg/L	0.28	20		
B528001	Nitrite (N)	2024/09/19	NC	80 - 120	99	80 - 120	<0.0010	mg/L	0.13	20		
B528003	Alkalinity (PP as CaCO3)	2024/09/20					<0.50	mg/L	NC	20		
B528003	Alkalinity (Total as CaCO3)	2024/09/20			98	80 - 120	<0.50	mg/L	0.71	20		
B528003	Bicarbonate (HCO3)	2024/09/20					<0.50	mg/L	0.71	20		
B528003	Carbonate (CO3)	2024/09/20					<0.50	mg/L	NC	20		
B528003	Hydroxide (OH)	2024/09/20					<0.50	mg/L	NC	20		
B528046	Conductivity	2024/09/20			102	90 - 110	<1.0	uS/cm	0.36	20		
B528094	pH	2024/09/20			100	97 - 103			0.81	N/A		
B528098	Fluoride (F)	2024/09/20	104	80 - 120	99	80 - 120	0.012, RDL=0.010 (1)	mg/L	4.6	20		
B528193	Turbidity - NTU	2024/09/19			101	80 - 120	<0.10	NTU	NC	20		
B529522	Total Phosphorus (P)	2024/09/20	101	80 - 120	97	80 - 120	<0.0010	mg/L	NC	20	89	80 - 120
B529872	Total Mercury (Hg)	2024/09/23	106	80 - 120	98	80 - 120	<0.0000019	mg/L	NC	20		
B529885	Total Nitrogen (N)	2024/09/23	108	80 - 120	108	80 - 120	<0.020	mg/L	NC	20	105	80 - 120
B531360	Dissolved-Low Level Sulphate (SO4)	2024/09/21	NC	80 - 120	108	80 - 120	<0.050	mg/L	2.6	20		
B533576	Acidity (pH 4.5)	2024/09/24					<1.0	mg/L	NC	20		
B533576	Acidity (pH 8.3)	2024/09/24			97	80 - 120	<1.0	mg/L	11	20		
B534410	Total Inorganic Carbon (C)	2024/09/24	103	80 - 120	109	80 - 120	<1.0	mg/L	0.92	20		
B534811	Total Inorganic Carbon (C)	2024/09/24	NC	80 - 120	107	80 - 120	<1.0	mg/L	0.33	20		
B534939	Alkalinity (PP as CaCO3)	2024/09/25					<0.50	mg/L	NC	20		
B534939	Alkalinity (Total as CaCO3)	2024/09/25			101	80 - 120	0.90, RDL=0.50 (1)	mg/L	2.8	20		
B534939	Bicarbonate (HCO3)	2024/09/25					1.09, RDL=0.50	mg/L	2.8	20		
B534939	Carbonate (CO3)	2024/09/25					<0.50	mg/L	NC	20		
B534939	Hydroxide (OH)	2024/09/25					<0.50	mg/L	NC	20		

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QUALITY ASSURANCE REPORT(CONT'D)

Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

			Matrix Spike		Spiked Blank		Method Blank		RPD		QC Standard	
QC Batch	Parameter	Date	% Recovery	QC Limits	% Recovery	QC Limits	Value	UNITS	Value (%)	QC Limits	% Recovery	QC Limits
B534942	pH	2024/09/25			101	97 - 103			1.4	N/A		
B534950	Conductivity	2024/09/25			102	90 - 110	<1.0	uS/cm	0.38	20		
B534955	Fluoride (F)	2024/09/25	99	80 - 120	96	80 - 120	<0.010	mg/L	2.4	20		
B535029	Total Organic Carbon (C)	2024/09/24	101	75 - 125	97	80 - 120	<0.20	mg/L	1.6	20		
B538252	Nitrate (N)	2024/09/26	100	80 - 120	99	80 - 120	<0.0020	mg/L	NC	20		
B538252	Nitrite (N)	2024/09/26	100	80 - 120	100	80 - 120	<0.0010	mg/L	NC	20		
B539731	Total Aluminum (Al)	2024/09/27	NC	80 - 120	125 (2)	80 - 120	<0.0030	mg/L	NC	20		
B539731	Total Antimony (Sb)	2024/09/27	99	80 - 120	93	80 - 120	<0.00060	mg/L	NC	20		
B539731	Total Arsenic (As)	2024/09/27	86	80 - 120	84	80 - 120	<0.00020	mg/L	NC	20		
B539731	Total Beryllium (Be)	2024/09/27	101	80 - 120	100	80 - 120	<0.0010	mg/L	NC	20		
B539731	Total Cadmium (Cd)	2024/09/27	93	80 - 120	90	80 - 120	<0.000020	mg/L	NC	20		
B539731	Total Chromium (Cr)	2024/09/27	95	80 - 120	96	80 - 120	<0.0010	mg/L	NC	20		
B539731	Total Cobalt (Co)	2024/09/27	93	80 - 120	98	80 - 120	<0.00030	mg/L	NC	20		
B539731	Total Copper (Cu)	2024/09/27	88	80 - 120	94	80 - 120	<0.0010	mg/L	NC	20		
B539731	Total Lead (Pb)	2024/09/27	92	80 - 120	96	80 - 120	<0.00020	mg/L	NC	20		
B539731	Total Molybdenum (Mo)	2024/09/27	110	80 - 120	99	80 - 120	<0.00020	mg/L	NC	20		
B539731	Total Nickel (Ni)	2024/09/27	90	80 - 120	96	80 - 120	<0.00050	mg/L	NC	20		
B539731	Total Selenium (Se)	2024/09/27	80	80 - 120	82	80 - 120	<0.00020	mg/L	NC	20		
B539731	Total Silver (Ag)	2024/09/27	94	80 - 120	97	80 - 120	<0.00010	mg/L	NC	20		
B539731	Total Thallium (Tl)	2024/09/27	95	80 - 120	100	80 - 120	<0.00020	mg/L	NC	20		
B539731	Total Tin (Sn)	2024/09/27	108	80 - 120	98	80 - 120	<0.0010	mg/L	NC	20		
B539731	Total Titanium (Ti)	2024/09/27	98	80 - 120	96	80 - 120	<0.0010	mg/L	NC	20		
B539731	Total Uranium (U)	2024/09/27	100	80 - 120	100	80 - 120	<0.00010	mg/L	NC	20		
B539731	Total Vanadium (V)	2024/09/27	100	80 - 120	97	80 - 120	<0.0010	mg/L	NC	20		
B539731	Total Zinc (Zn)	2024/09/27	79 (2)	80 - 120	80	80 - 120	<0.0030	mg/L	NC	20		
B539733	Total Barium (Ba)	2024/09/27	103	80 - 120	101	80 - 120	<0.010	mg/L	NC	20		
B539733	Total Boron (B)	2024/09/27	98	80 - 120	93	80 - 120	<0.020	mg/L	NC	20		
B539733	Total Calcium (Ca)	2024/09/27	NC	80 - 120	104	80 - 120	<0.30	mg/L	NC	20		
B539733	Total Iron (Fe)	2024/09/27	100	80 - 120	101	80 - 120	<0.060	mg/L	NC	20		
B539733	Total Lithium (Li)	2024/09/27	99	80 - 120	97	80 - 120	<0.020	mg/L	NC	20		
B539733	Total Magnesium (Mg)	2024/09/27	108	80 - 120	106	80 - 120	<0.20	mg/L	NC	20		
B539733	Total Manganese (Mn)	2024/09/27	95	80 - 120	95	80 - 120	<0.0040	mg/L	NC	20		
B539733	Total Potassium (K)	2024/09/27	106	80 - 120	103	80 - 120	<0.30	mg/L	NC	20		

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QUALITY ASSURANCE REPORT(CONT'D)

Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

			Matrix Spike		Spiked Blank		Method Blank		RPD		QC Standard	
QC Batch	Parameter	Date	% Recovery	QC Limits	% Recovery	QC Limits	Value	UNITS	Value (%)	QC Limits	% Recovery	QC Limits
B539733	Total Silicon (Si)	2024/09/27	100	80 - 120	100	80 - 120	<0.50	mg/L	NC	20		
B539733	Total Sodium (Na)	2024/09/27	99	80 - 120	99	80 - 120	<0.50	mg/L	NC	20		
B539733	Total Strontium (Sr)	2024/09/27	103	80 - 120	100	80 - 120	<0.020	mg/L	NC	20		
B539733	Total Sulphur (S)	2024/09/27	97	80 - 120	97	80 - 120	<0.20	mg/L	NC	20		
B539832	Total Aluminum (Al)	2024/09/27	100	80 - 120	101	80 - 120	<0.0030	mg/L	1.3	20		
B539832	Total Antimony (Sb)	2024/09/27	99	80 - 120	101	80 - 120	<0.00060	mg/L	NC	20		
B539832	Total Arsenic (As)	2024/09/27	99	80 - 120	99	80 - 120	<0.00020	mg/L	14	20		
B539832	Total Beryllium (Be)	2024/09/27	98	80 - 120	98	80 - 120	<0.0010	mg/L	NC	20		
B539832	Total Cadmium (Cd)	2024/09/27	99	80 - 120	99	80 - 120	<0.000020	mg/L				
B539832	Total Chromium (Cr)	2024/09/27	94	80 - 120	96	80 - 120	<0.0010	mg/L	NC	20		
B539832	Total Cobalt (Co)	2024/09/27	95	80 - 120	95	80 - 120	<0.00030	mg/L	NC	20		
B539832	Total Copper (Cu)	2024/09/27	94	80 - 120	94	80 - 120	<0.0010	mg/L	NC	20		
B539832	Total Lead (Pb)	2024/09/27	93	80 - 120	95	80 - 120	<0.00020	mg/L	NC	20		
B539832	Total Molybdenum (Mo)	2024/09/27	100	80 - 120	98	80 - 120	<0.00020	mg/L	NC	20		
B539832	Total Nickel (Ni)	2024/09/27	94	80 - 120	95	80 - 120	<0.00050	mg/L	NC	20		
B539832	Total Selenium (Se)	2024/09/27	99	80 - 120	100	80 - 120	<0.00020	mg/L	6.3	20		
B539832	Total Silver (Ag)	2024/09/27	97	80 - 120	96	80 - 120	<0.00010	mg/L	NC	20		
B539832	Total Thallium (Tl)	2024/09/27	92	80 - 120	93	80 - 120	<0.00020	mg/L	NC	20		
B539832	Total Tin (Sn)	2024/09/27	100	80 - 120	99	80 - 120	<0.0010	mg/L	NC	20		
B539832	Total Titanium (Ti)	2024/09/27	95	80 - 120	95	80 - 120	<0.0010	mg/L	NC	20		
B539832	Total Uranium (U)	2024/09/27	99	80 - 120	99	80 - 120	<0.00010	mg/L	3.0	20		
B539832	Total Vanadium (V)	2024/09/27	97	80 - 120	97	80 - 120	<0.0010	mg/L	NC	20		
B539832	Total Zinc (Zn)	2024/09/27	96	80 - 120	96	80 - 120	<0.0030	mg/L	NC	20		
B539849	Total Barium (Ba)	2024/09/27	108	80 - 120	107	80 - 120	<0.010	mg/L	1.2	20		
B539849	Total Boron (B)	2024/09/27	98	80 - 120	97	80 - 120	<0.020	mg/L	9.5	20		
B539849	Total Calcium (Ca)	2024/09/27	96	80 - 120	91	80 - 120	<0.30	mg/L	2.0	20		
B539849	Total Iron (Fe)	2024/09/27	114	80 - 120	110	80 - 120	<0.060	mg/L	NC	20		
B539849	Total Lithium (Li)	2024/09/27	89	80 - 120	87	80 - 120	<0.020	mg/L	NC	20		
B539849	Total Magnesium (Mg)	2024/09/27	105	80 - 120	103	80 - 120	<0.20	mg/L	2.3	20		
B539849	Total Manganese (Mn)	2024/09/27	108	80 - 120	105	80 - 120	<0.0040	mg/L	NC	20		
B539849	Total Potassium (K)	2024/09/27	95	80 - 120	91	80 - 120	<0.30	mg/L	1.3	20		
B539849	Total Silicon (Si)	2024/09/27	103	80 - 120	101	80 - 120	<0.50	mg/L	0.60	20		
B539849	Total Sodium (Na)	2024/09/27	91	80 - 120	88	80 - 120	<0.50	mg/L	2.4	20		

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Bureau Veritas Job #: C473831
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QUALITY ASSURANCE REPORT(CONT'D)

Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

			Matrix Spike		Spiked Blank		Method Blank		RPD		QC Standard	
QC Batch	Parameter	Date	% Recovery	QC Limits	% Recovery	QC Limits	Value	UNITS	Value (%)	QC Limits	% Recovery	QC Limits
B539849	Total Strontium (Sr)	2024/09/27	108	80 - 120	107	80 - 120	<0.020	mg/L	0.98	20		
B539849	Total Sulphur (S)	2024/09/27	106	80 - 120	101	80 - 120	<0.20	mg/L	1.1	20		
B540075	Total Aluminum (Al)	2024/09/27	214 (2)	80 - 120	123 (2)	80 - 120	<0.0030	mg/L	3.7	20		
B540075	Total Antimony (Sb)	2024/09/27	101	80 - 120	101	80 - 120	<0.00060	mg/L	NC	20		
B540075	Total Arsenic (As)	2024/09/27	89	80 - 120	89	80 - 120	<0.00020	mg/L	14	20		
B540075	Total Beryllium (Be)	2024/09/27	106	80 - 120	106	80 - 120	<0.0010	mg/L	3.5	20		
B540075	Total Cadmium (Cd)	2024/09/27	93	80 - 120	91	80 - 120	<0.000020	mg/L				
B540075	Total Chromium (Cr)	2024/09/27	98	80 - 120	98	80 - 120	<0.0010	mg/L	11	20		
B540075	Total Cobalt (Co)	2024/09/27	97	80 - 120	98	80 - 120	<0.00030	mg/L	5.2	20		
B540075	Total Copper (Cu)	2024/09/27	93	80 - 120	94	80 - 120	<0.0010	mg/L	NC	20		
B540075	Total Lead (Pb)	2024/09/27	97	80 - 120	97	80 - 120	<0.00020	mg/L	NC	20		
B540075	Total Molybdenum (Mo)	2024/09/27	105	80 - 120	100	80 - 120	<0.00020	mg/L	5.5	20		
B540075	Total Nickel (Ni)	2024/09/27	95	80 - 120	95	80 - 120	<0.00050	mg/L	6.4	20		
B540075	Total Selenium (Se)	2024/09/27	83	80 - 120	83	80 - 120	<0.00020	mg/L	12	20		
B540075	Total Silver (Ag)	2024/09/27	98	80 - 120	96	80 - 120	<0.00010	mg/L	NC	20		
B540075	Total Thallium (Tl)	2024/09/27	100	80 - 120	100	80 - 120	<0.00020	mg/L	NC	20		
B540075	Total Tin (Sn)	2024/09/27	103	80 - 120	99	80 - 120	<0.0010	mg/L	NC	20		
B540075	Total Titanium (Ti)	2024/09/27	99	80 - 120	98	80 - 120	<0.0010	mg/L	NC	20		
B540075	Total Uranium (U)	2024/09/27	101	80 - 120	100	80 - 120	<0.00010	mg/L	5.8	20		
B540075	Total Vanadium (V)	2024/09/27	101	80 - 120	100	80 - 120	<0.0010	mg/L	4.2	20		
B540075	Total Zinc (Zn)	2024/09/27	83	80 - 120	82	80 - 120	<0.0030	mg/L	6.0	20		
B540078	Total Barium (Ba)	2024/09/28	103	80 - 120	104	80 - 120	<0.010	mg/L	0.30	20		
B540078	Total Boron (B)	2024/09/28	99	80 - 120	102	80 - 120	<0.020	mg/L	5.5	20		
B540078	Total Calcium (Ca)	2024/09/28	NC	80 - 120	104	80 - 120	<0.30	mg/L	6.0	20		
B540078	Total Iron (Fe)	2024/09/28	NC	80 - 120	112	80 - 120	<0.060	mg/L	6.3	20		
B540078	Total Lithium (Li)	2024/09/28	107	80 - 120	105	80 - 120	<0.020	mg/L	13	20		
B540078	Total Magnesium (Mg)	2024/09/28	NC	80 - 120	105	80 - 120	<0.20	mg/L	5.7	20		
B540078	Total Manganese (Mn)	2024/09/28	NC	80 - 120	110	80 - 120	<0.0040	mg/L	6.3	20		
B540078	Total Potassium (K)	2024/09/28	104	80 - 120	104	80 - 120	<0.30	mg/L	7.7	20		
B540078	Total Silicon (Si)	2024/09/28	107	80 - 120	106	80 - 120	<0.50	mg/L	4.0	20		
B540078	Total Sodium (Na)	2024/09/28	NC	80 - 120	104	80 - 120	<0.50	mg/L	6.6	20		
B540078	Total Strontium (Sr)	2024/09/28	NC	80 - 120	99	80 - 120	<0.020	mg/L	4.7	20		

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QUALITY ASSURANCE REPORT(CONT'D)

Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

			Matrix Spike		Spiked Blank		Method Blank		RPD		QC Standard	
QC Batch	Parameter	Date	% Recovery	QC Limits	% Recovery	QC Limits	Value	UNITS	Value (%)	QC Limits	% Recovery	QC Limits
B540078	Total Sulphur (S)	2024/09/28	NC	80 - 120	108	80 - 120	<0.20	mg/L	6.9	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) Method blank exceeds acceptance limits, 2x RDL acceptable for low level analysis

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

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Bureau Veritas Job #: C473831
Report Date: 2024/10/01

Arctic Canadian Diamond Company Ltd
Site Location: MDMER/SNP/SEEPAGE
Your P.O. #: 6404002992

VALIDATION SIGNATURE PAGE

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

Ghayasuddin Khan, M.Sc., P.Chem., QP, Scientific Specialist, Inorganics

Sandy Yuan, M.Sc., QP, Scientific Specialist

Bureau Veritas 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 Signatures page if included, otherwise available by request. For Department specific Analyst/Supervisor validation names, please refer to the Test Summary section if included, otherwise available by request. This report is authorized by Scott Cantwell, General Manager responsible for Alberta Environmental laboratory operations.

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BUREAU VERITAS

ADDITIONAL COOLER TEMPERATURE RECORD

CHAIN-OF-CUSTODY RECORD

CHAIN OF CUSTODY #	
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COOLER OBSERVATIONS:

BV JOB#:

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	6.2	6.6	5.2
INTACT		✓		1	2	3
ICE PRESENT	✓					

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	4.2	5.2	5.3
INTACT		✓		1	2	3
ICE PRESENT	✓					

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	4.8	5.0	7.0
INTACT		✓		1	2	3
ICE PRESENT	✓					

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	5.5	4.5	4.4
INTACT		✓		1	2	3
ICE PRESENT	✓					

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	4.6	5.1	6.4
INTACT		✓		1	2	3
ICE PRESENT	✓					

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	7.1	5.9	7.0
INTACT		✓		1	2	3
ICE PRESENT	✓					

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	5.1	5.2	5.7
INTACT		✓		1	2	3
ICE PRESENT	✓					

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	4.7	4.9	5.2
INTACT		✓		1	2	3
ICE PRESENT	✓					

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	5.4	5.5	5.5
INTACT		✓		1	2	3
ICE PRESENT	✓					

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	4.3	4.4	6.0
INTACT		✓		1	2	3
ICE PRESENT	✓					

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	3.0	4.6	4.4
INTACT		✓		1	2	3
ICE PRESENT	✓					

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	3.1	4.4	5.9
INTACT		✓		1	2	3
ICE PRESENT	✓					

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	7.7	7.4	5.6
INTACT		✓		1	2	3
ICE PRESENT	✓					

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	5.6	5.9	6.8
INTACT		✓		1	2	3
ICE PRESENT	✓					

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT		✓	TEMP	5.3	3.7	3.9
INTACT		✓		1	2	3
ICE PRESENT	✓					

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						

CUSTODY SEAL	YES	NO	COOLER ID			
PRESENT			TEMP			
INTACT				1	2	3
ICE PRESENT						

RECEIVED BY (SIGN & PRINT)		DATE (YYYY/MM/DD)	TIME (HH:MM)
	Ekta Patel	2024/09/18	15:00

C473831
2024/09/18 15:00

Burgundy Diamond Mines
900 - 606 4 Street SW, Calgary, Alberta, Canada T2P 1T1
Tel: 867-880-4400 ext 2157
Burgundy Contact: Richard Ehlert / Jonah Kelly

BURGUNDY DIAMOND MINES

CHAIN OF CUSTODY FORM

BUREAU VERITAS 1828

BUREAU VERITAS

COC# 102248

SO# 57210

For Lab Use	SAMPLE INFORMATION						ANALYSIS REQUESTED (Indicate Filtered (F), Preserved (P) or Filtered and Preserved (F/P) below)																			
	Sample Point	Station Type	Date	Time	Matrix	Type	Major Ions	SNP Total Nutrients	Standard Total Metals																pH Field (pH)	Water Temp (°C)
	0008-Sa10	EKA 2002 0008	11-Sep-2024	12:41	Water	SNP	Y	Y	Y																7.73	9.7
	0008-Sa3	EKA 2002 0008	11-Sep-2024	12:55	Water	SNP	Y	Y	Y																7.84	8.7
	0008-Sa9b	EKA 2002 0008	11-Sep-2024	13:53	Water	SNP	Y	Y	Y																7.54	7.5

FOR LAB USE ONLY

MCAL-2024-09-1571

Special Instructions (Billing details, QC reporting etc):
Frequency: On the first day of Discharge, weekly during periods of Discharge, and on the final day of Discharge.
Parameters: TSS, major ion, physical parameters, total metals and nutrients.
*** Sample :0008-Sa3, 0008-Sa9b with Profil, 0008-Sa10***
Sent results to Tania.robitaille@burgundydiamonds.com, Landon.Murphy@burgundydiamonds.com & compliance.team@burgundydiamonds.com

Relinquished by:	Date / Time	Received by:	Date / Time
A Arott	18SEP24 0730	Ekta Patel	2024/09/18 15:00
Relinquished by:	Date / Time	Received by:	Date / Time

FOR LAB USE ONLY

Cooler seal intact upon receipt?	Sample temperature upon receipt:
☐ Yes ☐ No ☐ N/A	Frozen? ☐ Yes ☐ No

Send Analytical Results to: compliance.team@burgundydiamonds.com

See ACTR.