

**INDEPENDENT TESTING LAB**

830 ROBINWOOD COURT, TRAVERSE CITY, MI 49686

PH: 231-929-0905

FAX: 231-929-0894

www.gtanalytical.com

Company: FIFE LAKE AREA UTILITY AUTHORITY

Name:

ClientProj: QUARTERLY MONITOR WELLS

GTA ProjNo: 112020-8

Site Addr: 10701 VAN'S LANE

Sampled By: FIFE LAKE
CH/FLAUA

Date Rec: 11/20/2020

Time Rec: 3:35 PM

Sample No.	Sample ID	Date Sampled	Time Sampled	Sample Matrix
1	MW-5	11/20/2020	2:03 PM	WATER
2	MW-7	11/20/2020	2:15 PM	WATER
3	MW-12	11/20/2020	2:45 PM	WATER
4	MW-13	11/20/2020	1:30 PM	WATER
5	MW-14	11/20/2020	1:49 PM	WATER
6	MW-15	11/20/2020	2:30 PM	WATER

ELECTRONIC SIGNATURE REPORT. This is a final report for the following pages of data for the samples specified above. All analysis was performed by the methods stated and all quality control measures required were completed. All quality control information is available upon request.

Kirk Chase

Kirk L. Chase/Chemist
Grand Traverse Analytical
830 Robinwood Court
Traverse City, MI 49686
Ph: 231-929-0905
Fx: 231-929-0894
SP: 231-590-0291
kirk@gtanalytical.com

**INDEPENDENT TESTING LAB**

830 ROBINWOOD COURT, TRAVERSE CITY, MI 49686

PH: 231-929-0905

FAX: 231-929-0894

www.gtanalytical.com

COMPANY: FIFE LAKE AREA UTILITY AUTHORITY
PROJECT NO: QUARTERLY MONITOR WELLS
LOCATION: 10701 VAN'S LANE
FIFE LAKE
MI
SAMPLED BY: CH/FLAUA
SAMPLE ID: MW-5

GTA PROJECT NO: 112020-8
GTA SAMPLE NO: 1
DATE RECEIVED: 11/20/2020
TIME RECEIVED: 3:35 PM
DATE SAMPLED: 11/20/2020
TIME SAMPLED: 2:03 PM
SAMPLE MATRIX: WATER

SAMPLE RESULTS

<u>Analysis</u>	<u>Concentration</u>	<u>LOD</u>	<u>Units</u>	<u>Analyst</u>	<u>Date Completed</u>
AMMONIA-N EPA 350.1	<0.015	0.015	mg/L (PPM)	KC	11/30/2020
CHLORIDE EPA 300.0	120	10	mg/L (PPM)	LV	11/20/2020
CONDUCTIVITY SM2510-B	770	1.0	uS/cm@25C	LV	11/20/2020
NITRATE-N EPA 300.0	1.1	0.10	mg/L (PPM)	LV	11/20/2020
NITRITE-N EPA 300.0	<0.10	0.10	mg/L (PPM)	LV	11/20/2020
SODIUM EPA 200.8	61	0.50	mg/L (PPM)	MR	12/4/2020
TOTAL INORGANIC NITROGEN	1.1	0.22	mg/L (PPM)	LV/KC	11/30/2020
TOTAL PHOSPHORUS EPA 365.3	<0.010	0.010	mg/L (PPM)	LV	11/24/2020

ND = NOT DETECTED, RESULT < LOD

LOD = LIMIT OF DETECTION

s.u. = STANDARD pH UNITS REPORTED AT 25 C

DISS = DISSOLVED

**INDEPENDENT TESTING LAB**

830 ROBINWOOD COURT, TRAVERSE CITY, MI 49686

PH: 231-929-0905

FAX: 231-929-0894

www.gtanalytical.com

COMPANY: FIFE LAKE AREA UTILITY AUTHORITY

PROJECT NO: QUARTERLY MONITOR WELLS

LOCATION: 10701 VAN'S LANE

FIFE LAKE
MI

SAMPLED BY: CH/FLAUA

SAMPLE ID: MW-7

GTA PROJECT NO: 112020-8

GTA SAMPLE NO: 2

DATE RECEIVED: 11/20/2020

TIME RECEIVED: 3:35 PM

DATE SAMPLED: 11/20/2020

TIME SAMPLED: 2:15 PM

SAMPLE MATRIX: WATER

SAMPLE RESULTS

<u>Analysis</u>	<u>Concentration</u>	<u>LOD</u>	<u>Units</u>	<u>Analyst</u>	<u>Date Completed</u>
AMMONIA-N EPA 350.1	<0.015	0.015	mg/L (PPM)	KC	11/30/2020
CHLORIDE EPA 300.0	33	10	mg/L (PPM)	LV	11/20/2020
CONDUCTIVITY SM2510-B	330	1.0	uS/cm@25C	LV	11/20/2020
NITRATE-N EPA 300.0	0.25	0.10	mg/L (PPM)	LV	11/20/2020
NITRITE-N EPA 300.0	<0.10	0.10	mg/L (PPM)	LV	11/20/2020
SODIUM EPA 200.8	44	0.50	mg/L (PPM)	MR	12/4/2020
TOTAL INORGANIC NITROGEN	0.25	0.22	mg/L (PPM)	LV/KC	11/30/2020
TOTAL PHOSPHORUS EPA 365.3	<0.010	0.010	mg/L (PPM)	LV	11/24/2020

ND = NOT DETECTED, RESULT < LOD

LOD = LIMIT OF DETECTION

s.u. = STANDARD pH UNITS REPORTED AT 25 C

DISS = DISSOLVED

**INDEPENDENT TESTING LAB**

830 ROBINWOOD COURT, TRAVERSE CITY, MI 49686

PH: 231-929-0905

FAX: 231-929-0894

www.gtanalytical.com

COMPANY: FIFE LAKE AREA UTILITY AUTHORITY
PROJECT NO: QUARTERLY MONITOR WELLS
LOCATION: 10701 VAN'S LANE
FIFE LAKE
MI
SAMPLED BY: CH/FLAUA
SAMPLE ID: MW-12

GTA PROJECT NO: 112020-8
GTA SAMPLE NO: 3
DATE RECEIVED: 11/20/2020
TIME RECEIVED: 3:35 PM
DATE SAMPLED: 11/20/2020
TIME SAMPLED: 2:45 PM
SAMPLE MATRIX: WATER

SAMPLE RESULTS

<u>Analysis</u>	<u>Concentration</u>	<u>LOD</u>	<u>Units</u>	<u>Analyst</u>	<u>Date Completed</u>
AMMONIA-N EPA 350.1	<0.015	0.015	mg/L (PPM)	KC	11/30/2020
CHLORIDE EPA 300.0	32	10	mg/L (PPM)	LV	11/20/2020
CONDUCTIVITY SM2510-B	500	1.0	uS/cm@25C	LV	11/20/2020
NITRATE-N EPA 300.0	5.0	0.10	mg/L (PPM)	LV	11/20/2020
NITRITE-N EPA 300.0	<0.10	0.10	mg/L (PPM)	LV	11/20/2020
SODIUM EPA 200.8	29	0.50	mg/L (PPM)	MR	12/4/2020
TOTAL INORGANIC NITROGEN	5.0	0.22	mg/L (PPM)	LV/KC	11/30/2020
TOTAL PHOSPHORUS EPA 365.3	0.022	0.010	mg/L (PPM)	LV	11/24/2020

ND = NOT DETECTED, RESULT < LOD

LOD = LIMIT OF DETECTION

s.u. = STANDARD pH UNITS REPORTED AT 25 C

DISS = DISSOLVED

**INDEPENDENT TESTING LAB**

830 ROBINWOOD COURT, TRAVERSE CITY, MI 49686

PH: 231-929-0905

FAX: 231-929-0894

www.gtanalytical.com

COMPANY: FIFE LAKE AREA UTILITY AUTHORITY
PROJECT NO: QUARTERLY MONITOR WELLS
LOCATION: 10701 VAN'S LANE
FIFE LAKE
MI
SAMPLED BY: CH/FLAUA
SAMPLE ID: MW-13

GTA PROJECT NO: 112020-8
GTA SAMPLE NO: 4
DATE RECEIVED: 11/20/2020
TIME RECEIVED: 3:35 PM
DATE SAMPLED: 11/20/2020
TIME SAMPLED: 1:30 PM
SAMPLE MATRIX: WATER

SAMPLE RESULTS

<u>Analysis</u>	<u>Concentration</u>	<u>LOD</u>	<u>Units</u>	<u>Analyst</u>	<u>Date Completed</u>
AMMONIA-N EPA 350.1	<0.015	0.015	mg/L (PPM)	KC	11/30/2020
CHLORIDE EPA 300.0	100	10	mg/L (PPM)	LV	11/20/2020
CONDUCTIVITY SM2510-B	850	1.0	uS/cm@25C	LV	11/20/2020
NITRATE-N EPA 300.0	3.2	0.10	mg/L (PPM)	LV	11/20/2020
NITRITE-N EPA 300.0	<0.10	0.10	mg/L (PPM)	LV	11/20/2020
SODIUM EPA 200.8	39	0.50	mg/L (PPM)	MR	12/4/2020
TOTAL INORGANIC NITROGEN	3.2	0.22	mg/L (PPM)	LV/KC	11/30/2020
TOTAL PHOSPHORUS EPA 365.3	0.045	0.010	mg/L (PPM)	LV	11/24/2020

ND = NOT DETECTED, RESULT < LOD

LOD = LIMIT OF DETECTION

s.u. = STANDARD pH UNITS REPORTED AT 25 C

DISS = DISSOLVED

**INDEPENDENT TESTING LAB**

830 ROBINWOOD COURT, TRAVERSE CITY, MI 49686

PH: 231-929-0905

FAX: 231-929-0894

www.gtanalytical.com

COMPANY: FIFE LAKE AREA UTILITY AUTHORITY
PROJECT NO: QUARTERLY MONITOR WELLS
LOCATION: 10701 VAN'S LANE
FIFE LAKE
MI
SAMPLED BY: CH/FLAUA
SAMPLE ID: MW-14

GTA PROJECT NO: 112020-8
GTA SAMPLE NO: 5
DATE RECEIVED: 11/20/2020
TIME RECEIVED: 3:35 PM
DATE SAMPLED: 11/20/2020
TIME SAMPLED: 1:49 PM
SAMPLE MATRIX: WATER

SAMPLE RESULTS

<u>Analysis</u>	<u>Concentration</u>	<u>LOD</u>	<u>Units</u>	<u>Analyst</u>	<u>Date Completed</u>
AMMONIA-N EPA 350.1	<0.015	0.015	mg/L (PPM)	KC	11/30/2020
CHLORIDE EPA 300.0	120	10	mg/L (PPM)	LV	11/20/2020
CONDUCTIVITY SM2510-B	820	1.0	uS/cm@25C	LV	11/20/2020
NITRATE-N EPA 300.0	4.0	0.10	mg/L (PPM)	LV	11/20/2020
NITRITE-N EPA 300.0	<0.10	0.10	mg/L (PPM)	LV	11/20/2020
SODIUM EPA 200.8	46	0.50	mg/L (PPM)	MR	12/4/2020
TOTAL INORGANIC NITROGEN	4.0	0.22	mg/L (PPM)	LV/KC	11/30/2020
TOTAL PHOSPHORUS EPA 365.3	0.058	0.010	mg/L (PPM)	LV	11/24/2020

ND = NOT DETECTED, RESULT < LOD

LOD = LIMIT OF DETECTION

s.u. = STANDARD pH UNITS REPORTED AT 25 C

DISS = DISSOLVED

**INDEPENDENT TESTING LAB**

830 ROBINWOOD COURT, TRAVERSE CITY, MI 49686

PH: 231-929-0905

FAX: 231-929-0894

www.gtanalytical.com

COMPANY: FIFE LAKE AREA UTILITY AUTHORITY
PROJECT NO: QUARTERLY MONITOR WELLS
LOCATION: 10701 VAN'S LANE
FIFE LAKE
MI
SAMPLED BY: CH/FLAUA
SAMPLE ID: MW-15

GTA PROJECT NO: 112020-8
GTA SAMPLE NO: 6
DATE RECEIVED: 11/20/2020
TIME RECEIVED: 3:35 PM
DATE SAMPLED: 11/20/2020
TIME SAMPLED: 2:30 PM
SAMPLE MATRIX: WATER

SAMPLE RESULTS

<u>Analysis</u>	<u>Concentration</u>	<u>LOD</u>	<u>Units</u>	<u>Analyst</u>	<u>Date Completed</u>
AMMONIA-N EPA 350.1	<0.015	0.015	mg/L (PPM)	KC	11/30/2020
CHLORIDE EPA 300.0	48	10	mg/L (PPM)	LV	11/20/2020
CONDUCTIVITY SM2510-B	580	1.0	uS/cm@25C	LV	11/20/2020
NITRATE-N EPA 300.0	3.3	0.10	mg/L (PPM)	LV	11/20/2020
NITRITE-N EPA 300.0	<0.10	0.10	mg/L (PPM)	LV	11/20/2020
SODIUM EPA 200.8	31	0.50	mg/L (PPM)	MR	12/4/2020
TOTAL INORGANIC NITROGEN	3.3	0.22	mg/L (PPM)	LV/KC	11/30/2020
TOTAL PHOSPHORUS EPA 365.3	<0.010	0.010	mg/L (PPM)	LV	11/24/2020

ND = NOT DETECTED, RESULT < LOD

LOD = LIMIT OF DETECTION

s.u. = STANDARD pH UNITS REPORTED AT 25 C

DISS = DISSOLVED

CHAIN OF CUSTODY

PROJECT NUMBER <i>Quartz 2020</i>	SITE NAME/ADDRESS <i>Van Linn</i>	COMPANY/NAME <i>FLAVA</i>
SAMPLED BY <i>CH</i>	COMPANY <i>FLAVA</i>	GTA PROJECT # <i>1/2020-8</i>

SAMPLE INFORMATION

#	SAMPLE ID	DATE SAMPLED	TIME	MATRIX	ANALYSIS
1	<i>MW-5</i>	<i>11/20/20</i>	<i>2:03</i>	<i>H₂O</i>	<i>Quarterly</i>
2	<i>-7</i>	<i>✓</i>	<i>2:15</i>	<i>✓</i>	<i>✓</i>
3	<i>-12</i>		<i>2:45</i>		
4	<i>-13</i>		<i>1:30</i>		
5	<i>-14</i>		<i>1:49</i>		
6	<i>-15</i>		<i>2:30</i>		

BILL TO:

REPORT TO:

RELEASED BY <i>Chris Wright</i>	DATE/TIME <i>11-20-2020 3:33</i>	RECEIVED BY <i>K. Chen</i>	DATE/TIME <i>11/20/20 3:35p</i>
		<i>see 10°C</i>	

REQUESTED TAT ☐ STANDARD ☐ 1 BUSINESS DAY ☐ 2 BUSINESS DAYS ☐ 3 BUSINESS DAYS