



January 06, 2015

Mr. Alex Fischer  
West Environmental Supervisor  
Colorado Oil & Gas Conservation Commission  
1120 Lincoln Street, Suite 801  
Denver, Colorado

**RE: 4<sup>th</sup> Quarter 2014 Groundwater Monitoring Report  
Peakview Operating Company, LLC  
Voloshin-Morton 1(-8)  
Craig, Colorado**

Dear Mr. Fischer:

LT Environmental, Inc. (LTE) has been requested to submit this report on behalf of Peakview Operating Company, LLC (Peakview) detailing quarterly groundwater monitoring activities at the Voloshin-Morton 1(-8) well pad (Site).

## **QUARTERLY GROUNDWATER MONITORING ACTIVITIES**

### **Depth to Groundwater Measurements**

Depth to groundwater was measured in monitoring wells PMW01, MW02 through MW05, PMW09, MW16, MW17, PMW18, MW19 and MW20 on December 11, 2014. The recorded groundwater levels were used to calculate potentiometric surfaces and purge volumes. The depths to static groundwater level ranged from 4.86 feet below top of casing (BTOC) in PMW18 to 6.91 feet BTOC in MW03 (Table 1).

Calculating the difference in the top of casing and depth to groundwater, LTE determined the groundwater elevation in each monitoring well and generated a Groundwater Elevation Map (Figure 2). Monitoring wells (PMW01, PMW09, PMW13 and PMW18) were surveyed by LTE personnel on December 11, 2014. Based on the fourth quarter 2014 Groundwater Elevation Map, groundwater flow was generally to the north, toward the Yampa River.

### **Groundwater Sampling Procedures**

Each monitoring well was purged of a minimum of three well casing volumes or until dry prior to collection of groundwater samples. Groundwater samples for all 1-inch diameter wells were collected utilizing a peristaltic pump (MW02, MW03, MW04, MW05, MW16, MW17, W19 and MW20). Groundwater samples for all 2-inch diameter wells were collected using 1.6-inch diameter disposable bailers (PMW01, PMW09, PMW13 and PMW18). Groundwater samples were collected in laboratory-prepared sample bottles, placed on ice, and delivered under chain-



of-custody protocol to ESC Lab Sciences of Mt. Juliet, Tennessee (ESC) for laboratory analysis of constituents identified in COGCC Table 910-1.

### **Groundwater Analytical Results**

During the December 2014 groundwater monitoring event, 12 groundwater samples were collected and submitted to ESC for constituents identified in COGCC Table 910-1. All analytes were either below the laboratory detection limits or were within COGCC allowable concentrations. Groundwater analytical results for the December 2014 monitoring event are depicted on Figure 3. Table 2 summarizes historical analytical data for all groundwater sampling events. The laboratory analytical reports are included as an attachment.

The December 2014 groundwater monitoring event represents the third consecutive quarter of complaint groundwater data at the Site. Peakview and LTE understand that after four consecutive quarters of groundwater compliance with COGCC Table 910-1 allowable concentrations have been observed, the remediation number associated with the Site shall be closed. The next quarterly monitoring event is scheduled for March, 2015.

Should you have any questions regarding this report, please contact LTE at (970) 285-9985.

Sincerely,

LT ENVIRONMENTAL, INC.

A handwritten signature in blue ink, appearing to read 'Chris McKisson', is located below the typed name.

Chris McKisson  
Project Environmental Scientist

A handwritten signature in black ink, appearing to read 'Rob Fishburn', is located below the typed name.

Rob Fishburn, P.G.  
Western Slope Office Manager/  
Senior Hydrogeologist

#### Attachments:

Figure 1 – Site Location Map  
Figure 2 – Groundwater Elevation Map  
Figure 3 – Groundwater Analytical Data  
Table 1 – Groundwater Field Parameters  
Table 2 – Groundwater Analytical Results  
Laboratory Analytical Reports

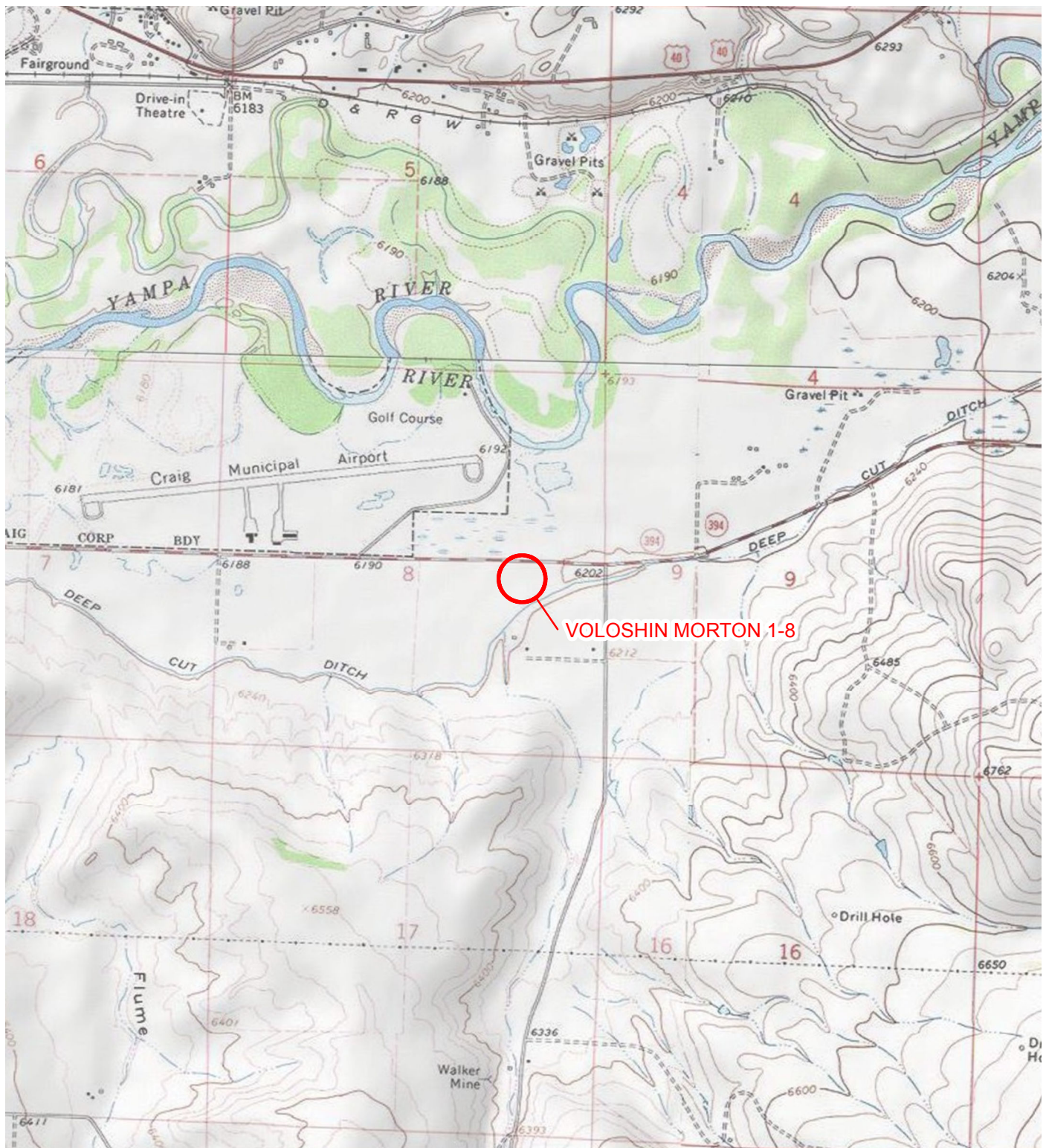


IMAGE COURTESY OF ESRI/BING MAPS

# LEGEND

○ SITE LOCATION

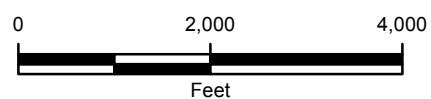


FIGURE 1  
SITE LOCATION MAP  
VOLOSHIN MORTON 1-8  
MOFFAT COUNTY, COLORADO





PEAKVIEW OPERATING COMPANY

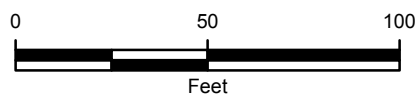




IMAGE COURTESY OF ESRI

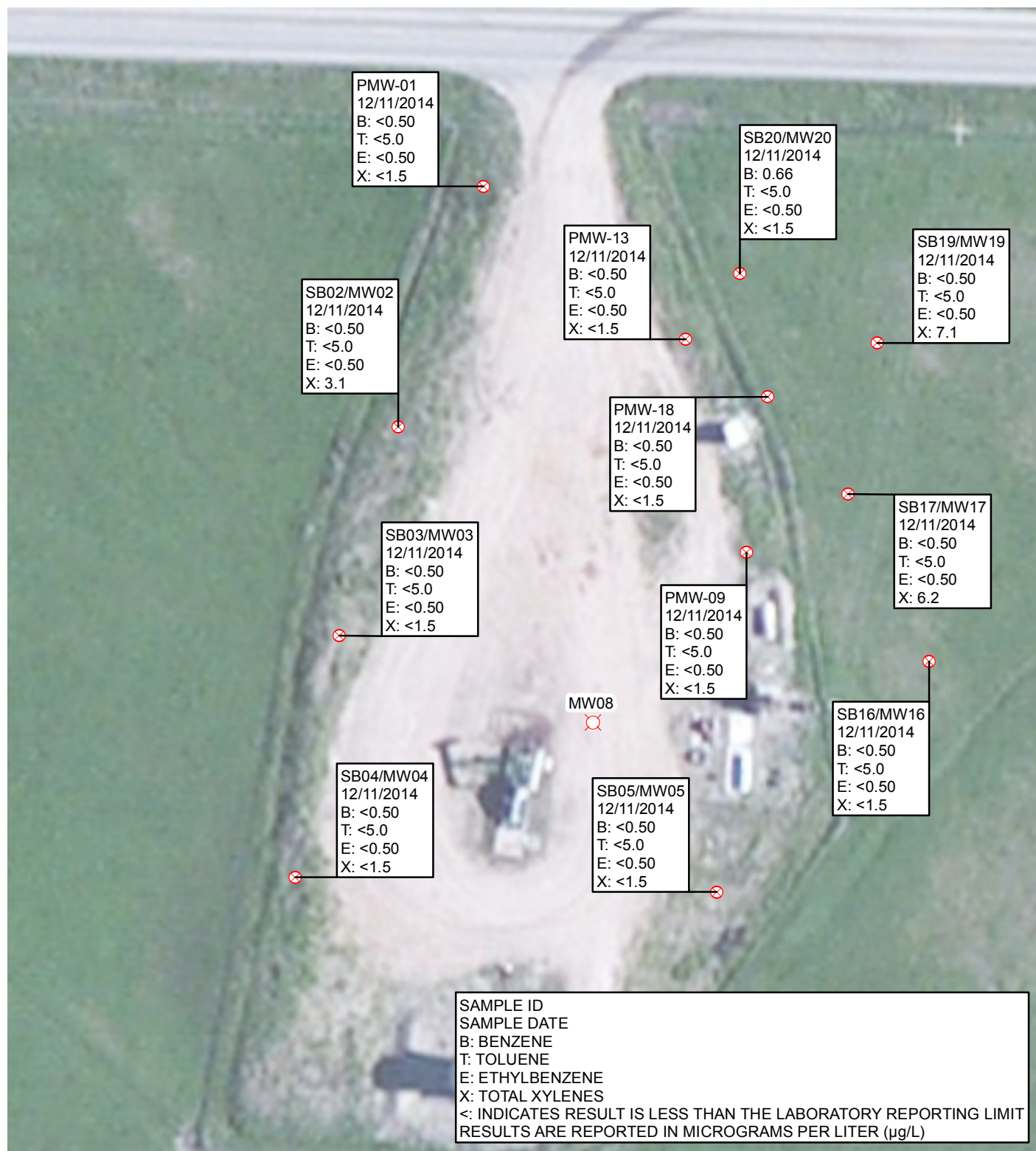
## LEGEND

-  SOIL BORING/MONITORING WELL
-  REMOVED/DESTROYED MONITORING WELL
-  ESTIMATED GROUNDWATER FLOW DIRECTION
-  RELATIVE GROUNDWATER ELEVATION CONTOUR  
CONTOUR INTERVAL = 0.50 FEET  
GRADIENT = 0.025 FEET/FOOT



**FIGURE 2**  
**RELATIVE GROUNDWATER ELEVATION MAP**  
 DECEMBER 12, 2014  
 VOLOSHIN MORTON 1-8  
 MOFFAT COUNTY, COLORADO  
**PEAKVIEW OPERATING COMPANY**





## LEGEND

- SOIL BORING/MONITORING WELL
- REMOVED/DESTROYED MONITORING WELL

0 50 100  
Feet



**FIGURE 3**  
**GROUNDWATER ANALYTICAL RESULTS**  
 DECEMBER 11, 2014  
 VOLOSHIN MORTON 1-8  
 MOFFAT COUNTY, COLORADO  
 PEAKVIEW OPERATING COMPANY



**TABLE 1**  
**VOLOSHIN MORTON 1-8**  
**GROUNDWATER FIELD PARAMETERS**  
**PEAKVIEW OPERATING COMPANY, LLC**

Sample ID	Date	TD ft btoc	DTW ft btoc	DTP ft btoc	Temperature °C	Conductivity µS/cm	TDS g/L	pH
MW01	5/24/2013*	4.56	2.35	NM	NM	NM	NM	NM
	9/17/2013	5.32	1.73	NA	18.1	1,115	0.832	7.15
PMW01	6/16/2014	10.07	3.07	NA	9.64	1,303	1.196	7.12
	9/22/2014	10.06	3.12	NA	14.66	1,302.7	1.055	7.16
	12/11/2014	10.06	5.02	NA	8.64	959.2	0.90666	7.3
MW02	5/24/2013	9.63	4.76	NA	10.89	1,544	1.350	8.05
	6/11/2013	9.21	3.43	NA	9.57	1,274	1.176	7.75
	9/17/2013	9.20	4.48	NA	14.4	1,194	0.975	7.47
	3/12/2014	9.55	3.73	NA	5.62	937	0.911	7.97
	6/16/2014	9.55	3.70	NA	11.47	1,780	1.56	7.62
	9/22/2014	9.57	3.90	NA	14.65	1,800.8	1.420	7.69
	12/11/2014	9.57	5.87	NA	10.67	1,058.4	0.94719	7.81
MW03	5/24/2013	9.75	5.02	NA	11.00	627	0.533	7.50
	9/17/2013	9.75	5.29	NA	17.9	717	0.539	7.25
	6/16/2014	9.72	4.55	NA	11.70	662	0.572	7.57
	9/22/2014	9.74	4.94	NA	17.10	744.2	0.563	7.50
	12/11/2014	9.74	6.91	NA	10.02	780.7	0.71049	7.71
MW04	5/24/2013	9.74	5.42	NA	9.92	1,758	1.592	7.42
	9/17/2013	9.74	5.31	NA	17.2	1,278	0.981	8.26
	6/16/2014	9.75	4.50	NA	10.24	895	0.809	8.23
	9/22/2014	9.73	4.76	NA	16.23	1,123.7	0.877	8.51
	12/11/2014	9.73	6.62	NA	10.82	1,214.5	1.0838	8.9
MW05	5/24/2013	9.50	3.90	NA	10.72	1,379	1.229	7.93
	9/17/2013	9.55	3.95	NA	17.0	1,660	NM	7.17
	6/16/2014	9.55	3.50	NA	11.50	1,293	1.096	7.66
	9/22/2014	9.54	4.28	NA	15.97	1,523.9	0.988	7.33
	12/11/2014	9.54	5.38	NA	10.02	1,185.7	1.0799	7.51
MW08	5/24/2013	9.66	4.32	NA	NM	NM	NM	NM
	9/17/2013	9.66	6.40	NA	18.0	1,114	0.832	7.96
MW09	5/24/2013	7.61	4.30	NA	NM	NM	NM	NM
PMW09	6/16/2014	10.05	3.73	NA	8.53	1,418	1.344	7.84
	9/22/2014	10.04	3.39	NA	13.82	1,429.9	1.181	7.70
	12/11/2014	10.04	5.22	NA	10.81	1,101.2	0.98113	7.72
MW13	5/24/2013	9.75	4.66	NA	12.67	1,649	1.384	7.89
	6/11/2013	9.74	4.43	NA	10.43	1,568	1.409	7.66
	9/17/2013	9.75	5.44	NA	16.7	1,605	1.235	7.34
PMW13	6/16/2014	10.11	4.55	NA	9.93	2,421	2.231	7.53
	9/22/2014	10.10	4.91	NA	14.68	2,575.7	2.077	7.31
	12/11/2014	10.10	6.93	NA	10.33	2,387.4	2.15607	7.38



**TABLE 1**  
**VOLOSHIN MORTON 1-8**  
**GROUNDWATER FIELD PARAMETERS**  
**PEAKVIEW OPERATING COMPANY, LLC**

Sample ID	Date	TD ft btoc	DTW ft btoc	DTP ft btoc	Temperature °C	Conductivity µS/cm	TDS g/L	pH
MW16	5/24/2013	9.43	4.06	NA	12.30	3,371	2.868	8.92
	6/11/2013	9.43	2.14	NA	10.38	3,884	3.489	8.85
	9/17/2013	9.44	4.20	NA	13.8	4,416	3.646	8.22
	6/16/2014	9.43	3.04	NA	9.22	4,872	4.534	8.42
	9/22/2014	9.42	3.76	NA	12.25	2,969.4	2.551	8.46
	12/11/2014	9.42	5.81	NA	9.08	5,038.5	4.7005	8.3
MW17	5/24/2013	9.39	3.91	NA	10.49	1,711	1.538	7.90
	6/11/2013	9.06	2.61	NA	10.60	4,014	3.591	6.71
	9/17/2013	9.14	3.80	NA	13.6	1,371	1.137	7.66
	6/16/2014	9.15	2.41	NA	11.09	1,365	1.216	7.64
	9/22/2014	9.15	3.21	NA	12.89	1,491.0	1.260	7.83
	12/11/2014	9.15	5.19	NA	8.93	1,364.5	1.2795	7.77
MW18	5/24/2013	9.38	3.93	3.57	10.92	1,652	1.445	8.06
	6/11/2013	9.14	2.50	2.44	10.09	4,041	3.670	6.78
	9/17/2013	9.21	3.88	3.76	NM	NM	NM	NM
PMW18	6/16/2014	9.90	2.20	NA	9.77	1,967	1.806	7.75
	9/22/2014	9.91	2.44	NA	12.66	2,109.4	1.794	7.45
	12/11/2014	9.91	4.86	NA	9.36	1,988.9	1.84002	7.48
MW19	5/24/2013	9.70	3.82	NA	10.35	1,507	1.355	7.72
	6/11/2013	9.46	2.19	NA	10.15	1,210	1.093	7.68
	9/17/2013	9.46	3.60	NA	13.3	1,108	0.929	7.53
	3/12/2014	9.45	2.90	NA	3.77	750	0.820	7.29
	6/16/2014	9.45	2.60	NA	10.30	1,022	0.924	7.51
	9/22/2014	9.45	3.09	NA	12.38	1,136.4	0.973	7.64
	12/11/2014	9.45	5.16	NA	9.11	1,161.3	1.07993	7.82
MW20	5/24/2013	9.20	3.78	NA	9.56	1,161	1.066	7.94
	6/11/2013	9.20	1.70	NA	9.47	1,449	1.338	8.42
	9/17/2013	9.20	3.44	NA	13.0	1,139	0.955	8.09
	3/12/2014	9.21	2.78	NA	4.46	1,331	1.423	8.23
	6/16/2014	9.20	2.52	NA	10.20	1,105	0.984	8.20
	9/22/2014	9.20	2.86	NA	12.55	1,024.6	0.873	7.86
	12/11/2014	9.20	4.93	NA	9.64	1,493.3	1.37359	8.32

**Notes:**

< - less than the stated reporting limit

**BOLD** - indicates result exceeds the COGCC concentration level

COGCC - Colorado Oil and Gas Conservation Commission

g/L - grams per liter

µS/cm - microsiemens per centimeter

NA - not applicable

SU - standard unit

ft - feet

btoc - below top of casing

NM - not measured

TD - total depth

DTW - depth to water

DTP - depth to product (estimated based on visual observation)

\* - well casing filled with silt after installation



**TABLE 2**  
**VOLOSHIN MORTON 1-8**  
**GROUNDWATER ANALYTICAL RESULTS**  
**PEAKVIEW OPERATING COMPANY, LLC**

Sample ID	Date	Benzene µg/L	Toluene µg/L	Ethylbenzene µg/L	Total Xylenes µg/L	Chlorides µg/L	Sulfates µg/L	TDS µg/L
MW01	9/17/2013	<0.50	<5.0	<0.50	<1.5	68,000	43,000	740,000
PMW01	6/16/2014	<b>5.2</b>	<5.0	<0.50	<1.5	140,000	43,000	1,000,000
	9/22/2014	<0.50	<5.0	<0.50	<1.5	NA	NA	NA
	12/11/2014	<0.50	<5.0	<0.50	<1.5	98,000	62,000	790,000
MW02	5/24/2013	<b>460</b>	<5.0	<0.50	2.7	NA	NA	NA
	6/11/2013	<b>160</b>	<25	<2.5	12	NA	NA	NA
	9/17/2014	<b>7.4</b>	<5.0	<0.50	<1.5	46,000	320,000	1,000,000
	3/12/2014	<1.0	<5.0	<1.0	<3.0	NA	NA	NA
	6/16/2014	<0.50	<5.0	<0.50	<1.5	70,000	820,000	1,900,000
	9/22/2014	<0.50	<5.0	<0.50	<1.5	NA	NA	NA
	12/11/2014	<0.50	<5.0	<0.50	3.1	31,000	330,000	940,000
MW03	5/24/2013	<0.50	<5.0	<0.50	<1.5	NA	NA	NA
	9/17/2014	<0.50	<5.0	<0.50	<1.5	22,000	35,000	570,000
	6/16/2014	0.70	<5.0	<0.50	<1.5	22,000	38,000	540,000
	9/22/2014	<0.50	<5.0	<0.50	<1.5	NA	NA	NA
	12/11/2014	<0.50	<5.0	<0.50	<1.5	23,000	56,000	600,000
MW04	5/24/2013	<0.50	<5.0	<0.50	<1.5	NA	NA	NA
	9/17/2013	<0.50	<5.0	<0.50	<1.5	21,000	66,000	1,300,000
	6/16/2014	0.53	<5.0	<0.50	<1.5	20,000	52,000	1,000,000
	9/22/2014	<0.50	<5.0	<0.50	<1.5	NA	NA	NA
	12/11/2014	<0.50	<5.0	<0.50	<1.5	NM*	NM*	NM*
	12/12/2014	NA	NA	NA	NA	13,000	58,000	1,000,000
MW05	5/24/2013	<0.50	<5.0	<0.50	<1.5	NA	NA	NA
	9/17/2013	<0.50	<5.0	<0.50	<1.5	9,500	190,000	890,000
	6/16/2014	0.77	<5.0	<0.50	<1.5	7,300	140,000	1,100,000
	9/22/2014	<0.50	<5.0	<0.50	<1.5	NA	NA	NA
	12/11/2014	<0.50	<5.0	<0.50	<1.5	NM*	NM*	NM*
	12/21/2014	NA	NA	NA	NA	7,300	200,000	1,000,000
MW08	5/24/2013	<0.50	<5.0	1.1	4.1	NA	NA	NA
	9/17/2013	<0.50	<5.0	<0.50	<1.5	NA	NA	NA
MW09	5/24/2013	<b>2,200</b>	310	390	540	NA	NA	NA
PMW09	6/16/2014	<0.50	<5.0	<0.50	<1.5	71,000	680,000	1,500,000
	9/22/2014	<0.50	<5.0	<0.50	<1.5	NA	NA	NA
	12/11/2014	<0.50	<5.0	<0.50	<1.5	42,000	310,000	930,000
MW13	5/24/2013	<b>8.9</b>	<5.0	<0.50	1.8	NA	NA	NA
	6/11/2013	<b>31</b>	<5.0	<0.50	1.6	NA	NA	NA
	9/17/2013	<b>7.1</b>	<5.0	<0.50	<1.5	100,000	150,000	1,200,000
PMW13	6/16/2014	<0.50	<5.0	<0.50	<1.5	130,000	1,200,000	2,300,000
	9/22/2014	<0.50	<5.0	<0.50	<1.5	NA	NA	NA
	12/11/2014	<0.50	<5.0	<0.50	<1.5	130,000	1,200,000	2,200,000
MW16	5/24/2013	<0.50	<5.0	<0.50	<1.5	NA	NA	NA
	6/11/2013	<0.50	<5.0	<0.50	<1.5	NA	NA	NA
	9/17/2013	<0.50	<5.0	<0.50	<1.5	76,000	990,000	3,400,000
	6/16/2014	<0.50	<5.0	<0.50	<1.5	140,000	1,600,000	4,600,000
	9/22/2014	<0.50	<5.0	<0.50	<1.5	NA	NA	NA
	12/11/2014	<0.50	<5.0	<0.50	<1.5	140,000	1,500,000	3,700,000



**TABLE 2**  
**VOLOSHIN MORTON 1-8**  
**GROUNDWATER ANALYTICAL RESULTS**  
**PEAKVIEW OPERATING COMPANY, LLC**

Sample ID	Date	Benzene µg/L	Toluene µg/L	Ethylbenzene µg/L	Total Xylenes µg/L	Chlorides µg/L	Sulfates µg/L	TDS µg/L
MW17	5/24/2013	<0.50	<5.0	<0.50	<1.5	NA	NA	NA
	6/11/2013	<0.50	<5.0	<0.50	<1.5	NA	NA	NA
	9/17/2013	<0.50	<5.0	<0.50	<1.5	43,000	310,000	1,200,000
	6/16/2014	<0.50	<5.0	<0.50	<1.5	44,000	330,000	1,200,000
	9/22/2014	<0.50	<5.0	<0.50	5.5	NA	NA	NA
	12/11/2014	<0.50	<5.0	<0.50	6.2	69,000	280,000	1,100,000
MW18	5/24/2013	<b>5,700</b>	<b>5,800</b>	470	<b>2,400</b>	82,000	360,000	1,400,000
	6/11/2013	<b>4,700</b>	<b>5,200</b>	490	<b>2,500</b>	NA	NA	NA
PMW18	6/16/2014	<b>10</b>	<5.0	1.8	<1.5	53,000	1,000,000	1,800,000
	9/22/2014	<0.50	<5.0	0.59	<1.5	NA	NA	NA
	12/11/2014	<0.50	<5.0	<0.50	<1.5	47,000	650,000	1,500,000
MW19	5/24/2013	0.72	<5.0	<0.50	<1.5	NA	NA	NA
	6/11/2013	<0.50	<5.0	<0.50	<1.5	NA	NA	NA
	9/17/2013	<0.50	<5.0	<0.50	<1.5	26,000	320,000	1,000,000
	3/12/2014	<1.0	<5.0	<1.0	<3.0	NA	NA	NA
	6/16/2014	<0.50	<5.0	<0.50	<1.5	23,000	260,000	880,000
	9/22/2014	<0.50	<5.0	<0.50	2.5	NA	NA	NA
	12/11/2014	<0.50	<5.0	<0.50	7.1	33,000	410,000	1,100,000
MW20	5/24/2013	<0.50	<5.0	<0.50	<1.5	NA	NA	NA
	6/11/2013	<0.50	<5.0	<0.50	<1.5	NA	NA	NA
	9/17/2013	<0.50	<5.0	<0.50	<1.5	26,000	220,000	860,000
	3/12/2014	<1.0	<5.0	<1.0	<3.0	NA	NA	NA
	6/16/2014	<0.50	<5.0	<0.50	<1.5	38,000	280,000	970,000
	9/22/2014	<0.50	<5.0	<0.50	<1.5	NA	NA	NA
	12/11/2014	0.66	<5.0	<0.50	<1.5	35,000	440,000	1,100,000
COGCC CONCENTRATION LEVELS		5	560	700	1,400	<1.25 x background	<1.25 x background	<1.25 x background

**Notes:**

< - less than the stated reporting limit

**BOLD** - indicates result exceeds the COGCC concentration level

COGCC - Colorado Oil and Gas Conservation Commission

µg/L - micrograms per liter

NM\* - Sample not collected due to insufficient sampling material

NA - not analyzed

SU - standard unit





12065 Lebanon Rd.  
Mt. Juliet, TN 37122  
(615) 758-5858  
1-800-767-5859  
Fax (615) 758-5859

Tax I.D. 62-0814289

Est. 1970

Rob Fishburn  
LT Environmental- Rifle, CO  
820 Megan Ave, Unit B  
Rifle, CO 81650

## Report Summary

Tuesday December 23, 2014

Report Number: L738945

Samples Received: 12/15/14

Client Project: 047813001

Description: Voloshin Morton 1(-8)

The analytical results in this report are based upon information supplied by you, the client, and are for your exclusive use. If you have any questions regarding this data package, please do not hesitate to call.

Entire Report Reviewed By:

  
Jared Willis , ESC Representative

### Laboratory Certification Numbers

A2LA - 1461-01, AIHA - 100789, AL - 40660, CA - 01157CA, CT - PH-0197,  
FL - E87487, GA - 923, IN - C-IN-01, KY - 90010, KYUST - 0016,  
NC - ENV375/DW21704/BIO041, ND - R-140, NJ - TN002, NJ NELAP - TN002,  
SC - 84004, TN - 2006, VA - 460132, WV - 233, AZ - 0612,  
MN - 047-999-395, NY - 11742, WI - 998093910, NV - TN000032011-1,  
TX - T104704245-11-3, OK - 9915, PA - 68-02979, IA Lab #364, EPA - TN002

Accreditation is only applicable to the test methods specified on each scope of accreditation held by ESC Lab Sciences.

This report may not be reproduced, except in full, without written approval from ESC Lab Sciences. Where applicable, sampling conducted by ESC is performed per guidance provided in laboratory standard operating procedures: 060302, 060303, and 060304.



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Tax I.D. 62-0814289

Est. 1970

REPORT OF ANALYSIS

Rob Fishburn  
LT Environmental- Rifle, CO  
820 Megan Ave, Unit B  
Rifle, CO 81650

December 23, 2014

Date Received : December 15, 2014  
Description : Voloshin Morton 1(-8)  
Sample ID : PMW01  
Collected By : Dustin Held  
Collection Date : 12/11/14 14:15

ESC Sample # : L738945-01

Site ID :

Project # : 047813001

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Chloride	98000	5000	ug/l	9056MOD	12/19/14	5
Sulfate	62000	25000	ug/l	9056MOD	12/19/14	5
Dissolved Solids	790000	10000	ug/l	2540 C-201	12/18/14	1
Benzene	BDL	0.50	ug/l	8021B	12/18/14	1
Toluene	BDL	5.0	ug/l	8021B	12/18/14	1
Ethylbenzene	BDL	0.50	ug/l	8021B	12/18/14	1
Total Xylene	BDL	1.5	ug/l	8021B	12/18/14	1
Surrogate Recovery(%) a,a,a-Trifluorotoluene(PID)	101.		% Rec.	8021B	12/18/14	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

Note:

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Tax I.D. 62-0814289

Est. 1970

# REPORT OF ANALYSIS

Rob Fishburn  
LT Environmental- Rifle, CO  
820 Megan Ave, Unit B  
Rifle, CO 81650

December 23, 2014

Date Received : December 15, 2014  
Description : Voloshin Morton 1(-8)  
Sample ID : MW02  
Collected By : Dustin Held  
Collection Date : 12/11/14 13:50

ESC Sample # : L738945-02

Site ID :

Project # : 047813001

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Chloride	31000	1000	ug/l	9056MOD	12/19/14	1
Sulfate	330000	50000	ug/l	9056MOD	12/20/14	10
Dissolved Solids	940000	10000	ug/l	2540 C-201	12/18/14	1
Benzene	BDL	0.50	ug/l	8021B	12/21/14	1
Toluene	BDL	5.0	ug/l	8021B	12/21/14	1
Ethylbenzene	BDL	0.50	ug/l	8021B	12/21/14	1
Total Xylene	3.1	1.5	ug/l	8021B	12/21/14	1
Surrogate Recovery(%)						
a,a,a-Trifluorotoluene(PID)	95.8		% Rec.	8021B	12/21/14	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

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REPORT OF ANALYSIS

Rob Fishburn  
LT Environmental- Rifle, CO  
820 Megan Ave, Unit B  
Rifle, CO 81650

December 23, 2014

Date Received : December 15, 2014  
Description : Voloshin Morton 1(-8)  
Sample ID : MW03  
Collected By : Dustin Held  
Collection Date : 12/11/14 13:55

ESC Sample # : L738945-03

Site ID :

Project # : 047813001

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Chloride	23000	1000	ug/l	9056MOD	12/19/14	1
Sulfate	56000	5000	ug/l	9056MOD	12/19/14	1
Dissolved Solids	600000	10000	ug/l	2540 C-201	12/18/14	1
Benzene	BDL	0.50	ug/l	8021B	12/21/14	1
Toluene	BDL	5.0	ug/l	8021B	12/21/14	1
Ethylbenzene	BDL	0.50	ug/l	8021B	12/21/14	1
Total Xylene	BDL	1.5	ug/l	8021B	12/21/14	1
Surrogate Recovery(%) a,a,a-Trifluorotoluene(PID)	96.2		% Rec.	8021B	12/21/14	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

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REPORT OF ANALYSIS

Rob Fishburn  
LT Environmental- Rifle, CO  
820 Megan Ave, Unit B  
Rifle, CO 81650

December 23, 2014

Date Received : December 15, 2014  
Description : Voloshin Morton 1(-8)  
Sample ID : MW04  
Collected By : Dustin Held  
Collection Date : 12/11/14 15:30

ESC Sample # : L738945-04

Site ID :

Project # : 047813001

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Benzene	BDL	0.50	ug/l	8021B	12/21/14	1
Toluene	BDL	5.0	ug/l	8021B	12/21/14	1
Ethylbenzene	BDL	0.50	ug/l	8021B	12/21/14	1
Total Xylene	BDL	1.5	ug/l	8021B	12/21/14	1
Surrogate Recovery(%)						
a,a,a-Trifluorotoluene(PID)	96.1		% Rec.	8021B	12/21/14	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

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REPORT OF ANALYSIS

Rob Fishburn  
LT Environmental- Rifle, CO  
820 Megan Ave, Unit B  
Rifle, CO 81650

December 23, 2014

Date Received : December 15, 2014  
Description : Voloshin Morton 1(-8)  
Sample ID : MW05  
Collected By : Dustin Held  
Collection Date : 12/11/14 14:10

ESC Sample # : L738945-05

Site ID :

Project # : 047813001

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Benzene	BDL	0.50	ug/l	8021B	12/21/14	1
Toluene	BDL	5.0	ug/l	8021B	12/21/14	1
Ethylbenzene	BDL	0.50	ug/l	8021B	12/21/14	1
Total Xylene	BDL	1.5	ug/l	8021B	12/21/14	1
Surrogate Recovery(%)						
a,a,a-Trifluorotoluene(PID)	95.5		% Rec.	8021B	12/21/14	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

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REPORT OF ANALYSIS

Rob Fishburn  
LT Environmental- Rifle, CO  
820 Megan Ave, Unit B  
Rifle, CO 81650

December 23, 2014

Date Received : December 15, 2014  
Description : Voloshin Morton 1(-8)  
Sample ID : PMW09  
Collected By : Dustin Held  
Collection Date : 12/11/14 13:45

ESC Sample # : L738945-06

Site ID :

Project # : 047813001

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Chloride	42000	1000	ug/l	9056MOD	12/19/14	1
Sulfate	310000	50000	ug/l	9056MOD	12/20/14	10
Dissolved Solids	930000	10000	ug/l	2540 C-201	12/18/14	1
Benzene	BDL	0.50	ug/l	8021B	12/21/14	1
Toluene	BDL	5.0	ug/l	8021B	12/21/14	1
Ethylbenzene	BDL	0.50	ug/l	8021B	12/21/14	1
Total Xylene	BDL	1.5	ug/l	8021B	12/21/14	1
Surrogate Recovery(%)						
a,a,a-Trifluorotoluene(PID)	96.6		% Rec.	8021B	12/21/14	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

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REPORT OF ANALYSIS

Rob Fishburn  
LT Environmental- Rifle, CO  
820 Megan Ave, Unit B  
Rifle, CO 81650

December 23, 2014

Date Received : December 15, 2014  
Description : Voloshin Morton 1(-8)  
Sample ID : PMW13  
Collected By : Dustin Held  
Collection Date : 12/11/14 14:00

ESC Sample # : L738945-07

Site ID :

Project # : 047813001

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Chloride	130000	50000	ug/l	9056MOD	12/19/14	50
Sulfate	1200000	250000	ug/l	9056MOD	12/19/14	50
Dissolved Solids	2200000	10000	ug/l	2540 C-201	12/18/14	1
Benzene	BDL	0.50	ug/l	8021B	12/21/14	1
Toluene	BDL	5.0	ug/l	8021B	12/21/14	1
Ethylbenzene	BDL	0.50	ug/l	8021B	12/21/14	1
Total Xylene	BDL	1.5	ug/l	8021B	12/21/14	1
Surrogate Recovery(%)						
a,a,a-Trifluorotoluene(PID)	94.0		% Rec.	8021B	12/21/14	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

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# REPORT OF ANALYSIS

Rob Fishburn  
LT Environmental- Rifle, CO  
820 Megan Ave, Unit B  
Rifle, CO 81650

December 23, 2014

Date Received : December 15, 2014  
Description : Voloshin Morton 1(-8)  
Sample ID : MW16  
Collected By : Dustin Held  
Collection Date : 12/11/14 14:20

ESC Sample # : L738945-08

Site ID :

Project # : 047813001

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Chloride	140000	50000	ug/l	9056MOD	12/19/14	50
Sulfate	1500000	250000	ug/l	9056MOD	12/19/14	50
Dissolved Solids	3700000	10000	ug/l	2540 C-201	12/18/14	1
Benzene	BDL	0.50	ug/l	8021B	12/21/14	1
Toluene	BDL	5.0	ug/l	8021B	12/21/14	1
Ethylbenzene	BDL	0.50	ug/l	8021B	12/21/14	1
Total Xylene	BDL	1.5	ug/l	8021B	12/21/14	1
Surrogate Recovery(%)						
a,a,a-Trifluorotoluene(PID)	94.8		% Rec.	8021B	12/21/14	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

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# REPORT OF ANALYSIS

Rob Fishburn  
LT Environmental- Rifle, CO  
820 Megan Ave, Unit B  
Rifle, CO 81650

December 23, 2014

Date Received : December 15, 2014  
Description : Voloshin Morton 1(-8)  
Sample ID : MW17  
Collected By : Dustin Held  
Collection Date : 12/11/14 14:35

ESC Sample # : L738945-09

Site ID :

Project # : 047813001

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Chloride	69000	20000	ug/l	9056MOD	12/19/14	20
Sulfate	280000	100000	ug/l	9056MOD	12/19/14	20
Dissolved Solids	1100000	10000	ug/l	2540 C-201	12/18/14	1
Benzene	BDL	0.50	ug/l	8021B	12/21/14	1
Toluene	BDL	5.0	ug/l	8021B	12/21/14	1
Ethylbenzene	BDL	0.50	ug/l	8021B	12/21/14	1
Total Xylene	6.2	1.5	ug/l	8021B	12/21/14	1
Surrogate Recovery(%)						
a,a,a-Trifluorotoluene(PID)	96.4		% Rec.	8021B	12/21/14	1

BDL - Below Detection Limit

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REPORT OF ANALYSIS

Rob Fishburn  
LT Environmental- Rifle, CO  
820 Megan Ave, Unit B  
Rifle, CO 81650

December 23, 2014

Date Received : December 15, 2014  
Description : Voloshin Morton 1(-8)  
Sample ID : PMW18  
Collected By : Dustin Held  
Collection Date : 12/11/14 14:05

ESC Sample # : L738945-10

Site ID :

Project # : 047813001

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Chloride	47000	20000	ug/l	9056MOD	12/19/14	20
Sulfate	650000	100000	ug/l	9056MOD	12/19/14	20
Dissolved Solids	1500000	10000	ug/l	2540 C-201	12/18/14	1
Benzene	BDL	0.50	ug/l	8021B	12/21/14	1
Toluene	BDL	5.0	ug/l	8021B	12/21/14	1
Ethylbenzene	BDL	0.50	ug/l	8021B	12/21/14	1
Total Xylene	BDL	1.5	ug/l	8021B	12/21/14	1
Surrogate Recovery(%)						
a,a,a-Trifluorotoluene(PID)	95.3		% Rec.	8021B	12/21/14	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

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REPORT OF ANALYSIS

Rob Fishburn  
LT Environmental- Rifle, CO  
820 Megan Ave, Unit B  
Rifle, CO 81650

December 23, 2014

Date Received : December 15, 2014  
Description : Voloshin Morton 1(-8)  
Sample ID : MW19  
Collected By : Dustin Held  
Collection Date : 12/11/14 14:40

ESC Sample # : L738945-11

Site ID :

Project # : 047813001

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Chloride	33000	1000	ug/l	9056MOD	12/20/14	1
Sulfate	410000	50000	ug/l	9056MOD	12/23/14	10
Dissolved Solids	1100000	10000	ug/l	2540 C-201	12/18/14	1
Benzene	BDL	0.50	ug/l	8021B	12/21/14	1
Toluene	BDL	5.0	ug/l	8021B	12/21/14	1
Ethylbenzene	BDL	0.50	ug/l	8021B	12/21/14	1
Total Xylene	7.1	1.5	ug/l	8021B	12/21/14	1
Surrogate Recovery(%) a,a,a-Trifluorotoluene(PID)	94.3		% Rec.	8021B	12/21/14	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

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# REPORT OF ANALYSIS

Rob Fishburn  
LT Environmental- Rifle, CO  
820 Megan Ave, Unit B  
Rifle, CO 81650

December 23, 2014

Date Received : December 15, 2014  
Description : Voloshin Morton 1(-8)  
Sample ID : MW20  
Collected By : Dustin Held  
Collection Date : 12/11/14 14:50

ESC Sample # : L738945-12

Site ID :

Project # : 047813001

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Chloride	35000	1000	ug/l	9056MOD	12/20/14	1
Sulfate	440000	50000	ug/l	9056MOD	12/23/14	10
Dissolved Solids	1100000	10000	ug/l	2540 C-201	12/18/14	1
Benzene	0.66	0.50	ug/l	8021B	12/21/14	1
Toluene	BDL	5.0	ug/l	8021B	12/21/14	1
Ethylbenzene	BDL	0.50	ug/l	8021B	12/21/14	1
Total Xylene	BDL	1.5	ug/l	8021B	12/21/14	1
Surrogate Recovery(%)						
a,a,a-Trifluorotoluene(PID)	94.3		% Rec.	8021B	12/21/14	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

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Summary of Remarks For Samples Printed  
12/23/14 at 14:33:38

TSR Signing Reports: 358  
R5 - Desired TAT

Sample: L738945-01 Account: LTENVRCO Received: 12/15/14 09:30 Due Date: 12/22/14 00:00 RPT Date: 12/23/14 14:33  
Sample: L738945-02 Account: LTENVRCO Received: 12/15/14 09:30 Due Date: 12/22/14 00:00 RPT Date: 12/23/14 14:33  
Sample: L738945-03 Account: LTENVRCO Received: 12/15/14 09:30 Due Date: 12/22/14 00:00 RPT Date: 12/23/14 14:33  
Sample: L738945-04 Account: LTENVRCO Received: 12/15/14 09:30 Due Date: 12/22/14 00:00 RPT Date: 12/23/14 14:33  
Sample: L738945-05 Account: LTENVRCO Received: 12/15/14 09:30 Due Date: 12/22/14 00:00 RPT Date: 12/23/14 14:33  
Sample: L738945-06 Account: LTENVRCO Received: 12/15/14 09:30 Due Date: 12/22/14 00:00 RPT Date: 12/23/14 14:33  
Sample: L738945-07 Account: LTENVRCO Received: 12/15/14 09:30 Due Date: 12/22/14 00:00 RPT Date: 12/23/14 14:33  
Sample: L738945-08 Account: LTENVRCO Received: 12/15/14 09:30 Due Date: 12/22/14 00:00 RPT Date: 12/23/14 14:33  
Sample: L738945-09 Account: LTENVRCO Received: 12/15/14 09:30 Due Date: 12/22/14 00:00 RPT Date: 12/23/14 14:33  
Sample: L738945-10 Account: LTENVRCO Received: 12/15/14 09:30 Due Date: 12/22/14 00:00 RPT Date: 12/23/14 14:33  
Sample: L738945-11 Account: LTENVRCO Received: 12/15/14 09:30 Due Date: 12/22/14 00:00 RPT Date: 12/23/14 14:33  
Sample: L738945-12 Account: LTENVRCO Received: 12/15/14 09:30 Due Date: 12/22/14 00:00 RPT Date: 12/23/14 14:33



**YOUR LAB OF CHOICE**

LT Environmental- Rifle, CO  
Rob Fishburn  
820 Megan Ave, Unit B

Rifle, CO 81650

Quality Assurance Report  
Level II

L738945

12065 Lebanon Rd.  
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December 23, 2014

Analyte	Result	Laboratory Blank		Limit	Batch	Date Analyzed
		Units	% Rec			
Dissolved Solids	< 10	mg/l			WG760058	12/18/14 15:15
Dissolved Solids	< 10	mg/l			WG759966	12/18/14 16:16
Benzene	< .0005	mg/l			WG760379	12/18/14 17:47
Ethylbenzene	< .0005	mg/l			WG760379	12/18/14 17:47
Toluene	< .005	mg/l			WG760379	12/18/14 17:47
Total Xylene	< .0015	mg/l			WG760379	12/18/14 17:47
a,a,a-Trifluorotoluene(PID)		% Rec.	100.0	55-122	WG760379	12/18/14 17:47
Chloride	< 1	mg/l			WG760757	12/19/14 14:03
Sulfate	< 5	mg/l			WG760757	12/19/14 14:03
Benzene	< .0005	mg/l			WG760862	12/20/14 20:50
Ethylbenzene	< .0005	mg/l			WG760862	12/20/14 20:50
Toluene	< .005	mg/l			WG760862	12/20/14 20:50
Total Xylene	< .0015	mg/l			WG760862	12/20/14 20:50
a,a,a-Trifluorotoluene(PID)		% Rec.	96.30	55-122	WG760862	12/20/14 20:50
Chloride	< 1	mg/l			WG760758	12/20/14 11:54
Sulfate	< 5	mg/l			WG761525	12/23/14 07:11

Analyte	Units	Duplicate		RPD	Limit	Ref Samp	Batch
		Result	Duplicate				
Dissolved Solids	mg/l	1150	1140	0.876	5	L738945-09	WG760058
Dissolved Solids	mg/l	200.	203.	1.49	5	L738835-06	WG759966
Chloride	mg/l	100.	110.	9.00	20	L738511-01	WG760757
Chloride	mg/l	170.	177.	2.00	20	L738972-01	WG760757
Sulfate	mg/l	380.	391.	2.00	20	L738972-01	WG760757
Chloride	mg/l	32.0	32.7	1.00	20	L738945-11	WG760758
Chloride	mg/l	14.0	14.1	0.0	20	L739383-01	WG760758

Analyte	Units	Laboratory Control Sample		% Rec	Limit	Batch
		Known Val	Result			
Dissolved Solids	mg/l	8800	8570	97.4	85-115	WG760058
Dissolved Solids	mg/l	8800	8520	96.8	85-115	WG759966
Benzene	mg/l	.05	0.0579	116.	70-130	WG760379
Ethylbenzene	mg/l	.05	0.0552	110.	70-130	WG760379
Toluene	mg/l	.05	0.0537	107.	70-130	WG760379
Total Xylene	mg/l	.15	0.166	111.	70-130	WG760379

\* Performance of this Analyte is outside of established criteria.

For additional information, please see Attachment A 'List of Analytes with QC Qualifiers.'



**YOUR LAB OF CHOICE**

LT Environmental- Rifle, CO  
Rob Fishburn  
820 Megan Ave, Unit B

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Quality Assurance Report  
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Est. 1970

December 23, 2014

Analyte	Units	Laboratory Control Sample		% Rec	Limit	Batch
		Known Val	Result			
a,a,a-Trifluorotoluene(PID)				99.40	55-122	
Chloride	mg/l	40	39.4	99.0	90-110	WG760757
Sulfate	mg/l	40	39.7	99.0	90-110	WG760757
Benzene	mg/l	.05	0.0469	93.9	70-130	WG760862
Ethylbenzene	mg/l	.05	0.0487	97.3	70-130	WG760862
Toluene	mg/l	.05	0.0468	93.7	70-130	WG760862
Total Xylene	mg/l	.15	0.137	91.1	70-130	WG760862
a,a,a-Trifluorotoluene(PID)				103.0	55-122	WG760862
Chloride	mg/l	40	39.4	99.0	90-110	WG760758
Sulfate	mg/l	40	40.2	101.	90-110	WG761525

Analyte	Units	Laboratory Control Sample Duplicate			Limit	RPD	Limit	Batch
		Result	Ref	%Rec				
Dissolved Solids	mg/l	8600	8570	98.0	85-115	0.349	5	WG760058
Dissolved Solids	mg/l	8520	8520	97.0	85-115	0.00	5	WG759966
Benzene	mg/l	0.0555	0.0579	111.	70-130	4.17	20	WG760379
Ethylbenzene	mg/l	0.0503	0.0552	100.	70-130	9.29	20	WG760379
Toluene	mg/l	0.0501	0.0537	100.	70-130	7.00	20	WG760379
Total Xylene	mg/l	0.154	0.166	102.	70-130	7.47	20	WG760379
a,a,a-Trifluorotoluene(PID)				98.50	55-122			WG760379
Chloride	mg/l	39.4	39.4	98.0	90-110	0.0	20	WG760757
Sulfate	mg/l	39.6	39.7	99.0	90-110	0.0	20	WG760757
Benzene	mg/l	0.0470	0.0469	94.0	70-130	0.140	20	WG760862
Ethylbenzene	mg/l	0.0486	0.0487	97.0	70-130	0.0900	20	WG760862
Toluene	mg/l	0.0469	0.0468	94.0	70-130	0.120	20	WG760862
Total Xylene	mg/l	0.136	0.137	90.0	70-130	0.670	20	WG760862
a,a,a-Trifluorotoluene(PID)				104.0	55-122			WG760862
Chloride	mg/l	39.3	39.4	98.0	90-110	0.0	20	WG760758
Sulfate	mg/l	40.4	40.2	101.	90-110	1.00	20	WG761525

Analyte	Units	Matrix Spike			% Rec	Limit	Ref Samp	Batch
		MS Res	Ref Res	TV				
Benzene	mg/l	0.0567	0.0	.05	110.	57.2-131	L738945-01	WG760379
Ethylbenzene	mg/l	0.0516	0.0000374	.05	100.	67.5-135	L738945-01	WG760379
Toluene	mg/l	0.0512	0.0000588	.05	100.	63.7-134	L738945-01	WG760379
Total Xylene	mg/l	0.158	0.000140	.15	100.	65.9-138	L738945-01	WG760379
a,a,a-Trifluorotoluene(PID)					98.50	55-122		WG760379

\* Performance of this Analyte is outside of established criteria.  
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**YOUR LAB OF CHOICE**

LT Environmental- Rifle, CO  
Rob Fishburn  
820 Megan Ave, Unit B

Rifle, CO 81650

Quality Assurance Report  
Level II

L738945

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Analyte	Units	MS Res	Matrix Spike		% Rec	Limit	Ref Samp	Batch
			Ref Res	TV				
Chloride	mg/l	89.0	42.3	50	93.0	80-120	L738945-06	WG760757
Sulfate	mg/l	787.	309.	5	96.0	80-120	L738945-06	WG760757
Benzene	mg/l	0.0466	0.0000668	.05	93.0	57.2-131	L738831-10	WG760862
Ethylbenzene	mg/l	0.0484	0.0	.05	97.0	67.5-135	L738831-10	WG760862
Toluene	mg/l	0.0466	0.000144	.05	93.0	63.7-134	L738831-10	WG760862
Total Xylene	mg/l	0.136	0.000268	.15	91.0	65.9-138	L738831-10	WG760862
a,a,a-Trifluorotoluene(PID)					103.0	55-122		WG760862
Chloride	mg/l	57.2	7.27	50	100.	80-120	L738947-01	WG760758

Analyte	Units	MSD	Matrix Spike Duplicate		Limit	RPD	Limit	Ref Samp	Batch
			Ref	%Rec					
Benzene	mg/l	0.0614	0.0567	123.	57.2-131	7.95	20	L738945-01	WG760379
Ethylbenzene	mg/l	0.0552	0.0516	110.	67.5-135	6.77	20	L738945-01	WG760379
Toluene	mg/l	0.0549	0.0512	110.	63.7-134	6.93	20	L738945-01	WG760379
Total Xylene	mg/l	0.169	0.158	113.	65.9-138	6.92	20	L738945-01	WG760379
a,a,a-Trifluorotoluene(PID)				99.30	55-122				WG760379
Chloride	mg/l	85.5	89.0	86.3	80-120	4.00	20	L738945-06	WG760757
Sulfate	mg/l	795.	787.	971.*	80-120	1.00	20	L738945-06	WG760757
Benzene	mg/l	0.0466	0.0466	93.1	57.2-131	0.0600	20	L738831-10	WG760862
Ethylbenzene	mg/l	0.0485	0.0484	97.0	67.5-135	0.120	20	L738831-10	WG760862
Toluene	mg/l	0.0465	0.0466	92.8	63.7-134	0.100	20	L738831-10	WG760862
Total Xylene	mg/l	0.135	0.136	90.0	65.9-138	0.830	20	L738831-10	WG760862
a,a,a-Trifluorotoluene(PID)				105.0	55-122				WG760862
Chloride	mg/l	58.2	57.2	102.	80-120	2.00	20	L738947-01	WG760758

Batch number /Run number / Sample number cross reference

WG760058: R3010741: L738945-09 10 11 12  
WG759966: R3010757: L738945-01 02 03 06 07 08  
WG760379: R3010866: L738945-01  
WG760757: R3011071: L738945-01 02 03 06 07 08 09 10  
WG760862: R3011166: L738945-02 03 04 05 06 07 08 09 10 11 12  
WG760758: R3011252: L738945-11 12  
WG761525: R3011645: L738945-11 12

\* \* Calculations are performed prior to rounding of reported values.

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Level II

L738945

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The data package includes a summary of the analytic results of the quality control samples required by the SW-846 or CWA methods. The quality control samples include a method blank, a laboratory control sample, and the matrix spike/matrix spike duplicate analysis. If a target parameter is outside the method limits, every sample that is effected is flagged with the appropriate qualifier in Appendix B of the analytic report.

Method Blank - an aliquot of reagent water carried through the entire analytic process. The method blank results indicate if any possible contamination exposure during the sample handling, digestion or extraction process, and analysis. Concentrations of target analytes above the reporting limit in the method blank are qualified with the "B" qualifier.

Laboratory Control Sample - is a sample of known concentration that is carried through the digestion/extraction and analysis process. The percent recovery, expressed as a percentage of the theoretical concentration, has statistical control limits indicating that the analytic process is "in control". If a target analyte is outside the control limits for the laboratory control sample or any other control sample, the parameter is flagged with a "J4" qualifier for all effected samples.

Matrix Spike and Matrix Spike Duplicate - is two aliquots of an environmental sample that is spiked with known concentrations of target analytes. The percent recovery of the target analytes also has statistical control limits. If any recoveries that are outside the method control limits, the sample that was selected for matrix spike/matrix spike duplicate analysis is flagged with either a "J5" or a "J6". The relative percent difference (%RPD) between the matrix spike and the matrix spike duplicate recoveries is all calculated. If the RPD is above the method limit, the effected samples are flagged with a "J3" qualifier.



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Rob Fishburn  
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820 Megan Ave, Unit B  
Rifle, CO 81650

## Report Summary

Tuesday December 23, 2014

Report Number: L738947


Samples Received: 12/15/14

Client Project: 047813001

Description: Voloshin Morton 1(-8)

The analytical results in this report are based upon information supplied by you, the client, and are for your exclusive use. If you have any questions regarding this data package, please do not hesitate to call.

Entire Report Reviewed By:

  
Jared Willis , ESC Representative

### Laboratory Certification Numbers

A2LA - 1461-01, AIHA - 100789, AL - 40660, CA - 01157CA, CT - PH-0197,  
FL - E87487, GA - 923, IN - C-IN-01, KY - 90010, KYUST - 0016,  
NC - ENV375/DW21704/BIO041, ND - R-140, NJ - TN002, NJ NELAP - TN002,  
SC - 84004, TN - 2006, VA - 460132, WV - 233, AZ - 0612,  
MN - 047-999-395, NY - 11742, WI - 998093910, NV - TN000032011-1,  
TX - T104704245-11-3, OK - 9915, PA - 68-02979, IA Lab #364, EPA - TN002

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# REPORT OF ANALYSIS

Rob Fishburn  
LT Environmental- Rifle, CO  
820 Megan Ave, Unit B  
Rifle, CO 81650

December 23, 2014

Date Received : December 15, 2014  
Description : Voloshin Morton 1(-8)  
Sample ID : MW05  
Collected By : Dustin Held  
Collection Date : 12/12/14 10:20

ESC Sample # : L738947-01

Site ID :

Project # : 047813001

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Chloride	7300	1000	ug/l	9056MOD	12/20/14	1
Sulfate	200000	50000	ug/l	9056MOD	12/23/14	10
Dissolved Solids	1000000	10000	ug/l	2540 C-201	12/18/14	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

Note:

The reported analytical results relate only to the sample submitted.

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Reported: 12/23/14 14:33 Printed: 12/23/14 14:33



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REPORT OF ANALYSIS

Rob Fishburn  
LT Environmental- Rifle, CO  
820 Megan Ave, Unit B  
Rifle, CO 81650

December 23, 2014

Date Received : December 15, 2014  
Description : Voloshin Morton 1(-8)  
Sample ID : MW04  
Collected By : Dustin Held  
Collection Date : 12/12/14 10:10

ESC Sample # : L738947-02

Site ID :

Project # : 047813001

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
Chloride	13000	1000	ug/l	9056MOD	12/20/14	1
Sulfate	58000	5000	ug/l	9056MOD	12/20/14	1
Dissolved Solids	1000000	10000	ug/l	2540 C-201	12/18/14	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

Note:

The reported analytical results relate only to the sample submitted.

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Reported: 12/23/14 14:33 Printed: 12/23/14 14:33

Summary of Remarks For Samples Printed  
12/23/14 at 14:33:43

TSR Signing Reports: 358  
R5 - Desired TAT

Sample: L738947-01 Account: LTENVRCO Received: 12/15/14 09:30 Due Date: 12/22/14 00:00 RPT Date: 12/23/14 14:33

Sample: L738947-02 Account: LTENVRCO Received: 12/15/14 09:30 Due Date: 12/22/14 00:00 RPT Date: 12/23/14 14:33



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Analyte	Result	Laboratory Blank		Limit	Batch	Date Analyzed
		Units	% Rec			
Dissolved Solids	< 10	mg/l			WG760058	12/18/14 15:51
Chloride	< 1	mg/l			WG760758	12/20/14 11:54
Sulfate	< 5	mg/l			WG760758	12/20/14 11:54
Sulfate	< 5	mg/l			WG761525	12/23/14 07:11

Analyte	Units	Duplicate		RPD	Limit	Ref Samp	Batch
		Result	Duplicate				
Dissolved Solids	mg/l	1150	1140	0.876	5	L738945-09	WG760058
Chloride	mg/l	32.0	32.7	1.00	20	L738945-11	WG760758
Chloride	mg/l	14.0	14.1	0.0	20	L739383-01	WG760758
Sulfate	mg/l	28.0	28.1	0.0	20	L739383-01	WG760758

Analyte	Units	Laboratory Control Sample		% Rec	Limit	Batch
		Known Val	Result			
Dissolved Solids	mg/l	8800	8570	97.4	85-115	WG760058
Chloride	mg/l	40	39.4	99.0	90-110	WG760758
Sulfate	mg/l	40	40.0	100.	90-110	WG760758
Sulfate	mg/l	40	40.2	101.	90-110	WG761525

Analyte	Units	Laboratory Control Sample Duplicate			Limit	RPD	Limit	Batch
		Result	Ref	%Rec				
Dissolved Solids	mg/l	8600	8570	98.0	85-115	0.349	5	WG760058
Chloride	mg/l	39.3	39.4	98.0	90-110	0.0	20	WG760758
Sulfate	mg/l	39.9	40.0	100.	90-110	0.0	20	WG760758
Sulfate	mg/l	40.4	40.2	101.	90-110	1.00	20	WG761525

Analyte	Units	Matrix Spike			% Rec	Limit	Ref Samp	Batch
		MS Res	Ref Res	TV				
Chloride	mg/l	57.2	7.27	50	100.	80-120	L738947-01	WG760758

Analyte	Units	Matrix Spike Duplicate			Limit	RPD	Limit	Ref Samp	Batch
		MSD	Ref	%Rec					
Chloride	mg/l	58.2	57.2	102.	80-120	2.00	20	L738947-01	WG760758

Batch number /Run number / Sample number cross reference

WG760058: R3010741: L738947-01 02  
WG760758: R3011252: L738947-01 02  
WG761525: R3011645: L738947-01

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Matrix Spike and Matrix Spike Duplicate - is two aliquots of an environmental sample that is spiked with known concentrations of target analytes. The percent recovery of the target analytes also has statistical control limits. If any recoveries that are outside the method control limits, the sample that was selected for matrix spike/matrix spike duplicate analysis is flagged with either a "J5" or a "J6". The relative percent difference (%RPD) between the matrix spike and the matrix spike duplicate recoveries is all calculated. If the RPD is above the method limit, the effected samples are flagged with a "J3" qualifier.