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26 August 2021

Kyle Siesser
Cottonwood Consulting
PO Box 1653
Durango, CO 81302
RE: COGCC Table 915-1 GW

Enclosed are the results of analyses for samples received by the laboratory on 08/12/21 14:30. The data to follow was performed, in whole or in part, by a subcontract laboratory with an additional report attached.

If you need any further assistance, please feel free to contact me.

Sincerely,

A handwritten signature in black ink that reads 'Debbie Zufelt'. The script is cursive and fluid, with the first name 'Debbie' and last name 'Zufelt' clearly legible.

Debbie Zufelt
Reports Manager

All accredited analytes contained in this report are denoted by an asterisk (*). For a complete list of accredited analytes please do not hesitate to contact us via any of the contact information contained in this report. All of our certifications can be viewed at <http://greenanalytical.com/certifications/>

Green Analytical Laboratories is NELAP accredited through the Texas Commission on Environmental Quality. Accreditation applies to drinking water and non-potable water matrices for trace metals and a variety of inorganic parameters. Green Analytical Laboratories is also accredited through the Colorado Department of Public Health and Environment and EPA region 8 for trace metals, Cyanide, Fluoride, Nitrate, and Nitrite in drinking water. TNI Certificate Number: T104704514-21-12

Our affiliate laboratory, Cardinal Laboratories, is also NELAP accredited through the Texas Commission on Environmental Quality for a variety of organic constituents in drinking water, non-potable water and solid matrices. Cardinal is also accredited for regulated VOCs, TTHM, and HAA-5 in drinking water through the Colorado Department of Public Health and Environment and EPA region 8. TNI Certificate Number: T104704398-21-14



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Cottonwood Consulting
PO Box 1653
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Project: COGCC Table 915-1 GW
Project Name / Number: Underwood Ditch Well Plugging Project
Project Manager: Kyle Siesser

Reported:
08/26/21 06:30

ANALYTICAL REPORT FOR SAMPLES

Sample ID	Laboratory ID	Matrix	Date Sampled	Date Received	Notes
WS01	2108125-01	Water	08/12/21 10:46	08/12/21 14:30	
WS02	2108125-02	Water	08/12/21 11:18	08/12/21 14:30	

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Project Name / Number: Underwood Ditch Well Plugging Project
Project Manager: Kyle Siesser

Reported:
08/26/21 06:30

WS01**2108125-01 (Surface Water)**

Analyte	Result	RL	MDL	Units	Dilution	Analyzed	Method	Notes	Analyst
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General Chemistry

Chloride*	5.57	1.00	0.0422	mg/L	1	08/23/21 14:38	EPA300.0		AES
Total Dissolved Solids*	480	10.0		mg/L	1	08/17/21 16:30	EPA160.1		VJW
Sulfate*	70.4	5.00	0.762	mg/L	5	08/24/21 03:19	EPA300.0		AES

Subcontracted -- Cardinal Laboratories**VOLATILES BY GC/MS**

Methyl t-Butyl Ether*	<0.001	0.001	0.0003	mg/L	1	08/20/21 17:06	8260B		MS
Benzene*	<0.0005	0.0005	0.00003	mg/L	1	08/20/21 17:06	8260B		MS
Toluene*	<0.0005	0.0005	0.00004	mg/L	1	08/20/21 17:06	8260B		MS
Ethylbenzene*	<0.0005	0.0005	0.00004	mg/L	1	08/20/21 17:06	8260B		MS
m+p - Xylene*	<0.001	0.001	0.00002	mg/L	1	08/20/21 17:06	8260B		MS
o-Xylene*	<0.0005	0.0005	0.00003	mg/L	1	08/20/21 17:06	8260B		MS
Total Xylenes*	<0.0005	0.0005	0.00005	mg/L	1	08/20/21 17:06	8260B		MS
1,3,5-Trimethylbenzene*	<0.0005	0.0005	0.00003	mg/L	1	08/20/21 17:06	8260B		MS
1,2,4-Trimethylbenzene*	<0.0005	0.0005	0.00003	mg/L	1	08/20/21 17:06	8260B		MS
Naphthalene*	<0.0005	0.0005	0.00004	mg/L	1	08/20/21 17:06	8260B		MS

Surrogate: Dibromofluoromethane	113 %	82.4-141				08/20/21 17:06	8260B		MS
Surrogate: Toluene-d8	99.5 %	87.1-110				08/20/21 17:06	8260B		MS
Surrogate: 4-Bromofluorobenzene	86.0 %	76.4-114				08/20/21 17:06	8260B		MS

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WS02**2108125-02 (Surface Water)**

Analyte	Result	RL	MDL	Units	Dilution	Analyzed	Method	Notes	Analyst
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General Chemistry

Chloride*	5.82	1.00	0.0422	mg/L	1	08/23/21 14:58	EPA300.0		AES
Total Dissolved Solids*	440	10.0		mg/L	1	08/17/21 16:30	EPA160.1		VJW
Sulfate*	65.1	5.00	0.762	mg/L	5	08/24/21 03:38	EPA300.0		AES

Subcontracted -- Cardinal Laboratories**VOLATILES BY GC/MS**

Methyl t-Butyl Ether*	<0.001	0.001	0.0003	mg/L	1	08/20/21 17:27	8260B		MS
Benzene*	<0.0005	0.0005	0.00003	mg/L	1	08/20/21 17:27	8260B		MS
Toluene*	<0.0005	0.0005	0.00004	mg/L	1	08/20/21 17:27	8260B		MS
Ethylbenzene*	<0.0005	0.0005	0.00004	mg/L	1	08/20/21 17:27	8260B		MS
m+p - Xylene*	<0.001	0.001	0.00002	mg/L	1	08/20/21 17:27	8260B		MS
o-Xylene*	<0.0005	0.0005	0.00003	mg/L	1	08/20/21 17:27	8260B		MS
Total Xylenes*	<0.0005	0.0005	0.00005	mg/L	1	08/20/21 17:27	8260B		MS
1,3,5-Trimethylbenzene*	<0.0005	0.0005	0.00003	mg/L	1	08/20/21 17:27	8260B		MS
1,2,4-Trimethylbenzene*	<0.0005	0.0005	0.00003	mg/L	1	08/20/21 17:27	8260B		MS
Naphthalene*	<0.0005	0.0005	0.00004	mg/L	1	08/20/21 17:27	8260B		MS

Surrogate: Dibromofluoromethane	114 %	82.4-141		08/20/21 17:27	8260B		MS
Surrogate: Toluene-d8	100 %	87.1-110		08/20/21 17:27	8260B		MS
Surrogate: 4-Bromofluorobenzene	89.6 %	76.4-114		08/20/21 17:27	8260B		MS

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Project Name / Number: Underwood Ditch Well Plugging Project
Project Manager: Kyle Siesser

Reported:
08/26/21 06:30

General Chemistry - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B211889 - General Prep - Wet Chem										
Blank (B211889-BLK1)				Prepared & Analyzed: 08/17/21						
Total Dissolved Solids	ND	10.0	mg/L							
Duplicate (B211889-DUP1)				Source: 2108153-01 Prepared & Analyzed: 08/17/21						
Total Dissolved Solids	2320	10.0	mg/L		2330			0.643	20	
Reference (B211889-SRM1)				Prepared & Analyzed: 08/17/21						
Total Dissolved Solids	390	10.0	mg/L	380		103	85-115			
Batch B211937 - General Prep - Wet Chem										
Blank (B211937-BLK1)				Prepared & Analyzed: 08/23/21						
Chloride	ND	1.00	mg/L							
Sulfate	ND	1.00	mg/L							
LCS (B211937-BS1)				Prepared & Analyzed: 08/23/21						
Chloride	24.6	1.00	mg/L	25.0		98.3	90-110			
Sulfate	24.3	1.00	mg/L	25.0		97.2	90-110			
LCS Dup (B211937-BSD1)				Prepared & Analyzed: 08/23/21						
Chloride	24.3	1.00	mg/L	25.0		97.3	90-110	0.977	20	
Sulfate	24.1	1.00	mg/L	25.0		96.3	90-110	0.984	20	

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Reported:
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VOLATILES BY GC/MS - Quality Control

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch 1081915 - Volatiles

Blank (1081915-BLK1)

Prepared: 08/19/21 Analyzed: 08/20/21

1,1,1,2-Tetrachloroethane	ND	0.0005	mg/L
1,1,1-Trichloroethane	ND	0.0005	mg/L
1,1,2,2-Tetrachloroethane	ND	0.0005	mg/L
1,1,2-Trichloroethane	ND	0.0005	mg/L
1,1-Dichloroethane	ND	0.0005	mg/L
1,1-Dichloroethene	ND	0.0005	mg/L
1,1-Dichloropropene	ND	0.0005	mg/L
1,2,3-Trichlorobenzene	ND	0.0005	mg/L
1,2,4-Trichlorobenzene	ND	0.0005	mg/L
1,2,4-Trimethylbenzene	ND	0.0005	mg/L
1,2-Dibromo-3-chloropropane	ND	0.0005	mg/L
1,2-Dibromoethane	ND	0.0005	mg/L
1,2-Dichlorobenzene	ND	0.0005	mg/L
1,2-Dichloroethane	ND	0.0005	mg/L
1,2-Dichloropropane	ND	0.0005	mg/L
1,3,5-Trimethylbenzene	ND	0.0005	mg/L
1,3-Dichlorobenzene	ND	0.0005	mg/L
1,3-Dichloropropane	ND	0.0005	mg/L
1,4 Dichlorobenzene	ND	0.0005	mg/L
1,4-Dioxane	ND	0.100	mg/L
1,2,3-trichloropropane	ND	0.0005	mg/L
2,2-Dichloropropane	ND	0.0005	mg/L
2-Butanone	ND	0.002	mg/L
2-Chlorotoluene	ND	0.0005	mg/L
2-Hexanone	ND	0.001	mg/L

Surrogate: 4-Bromofluorobenzene	0.0223		mg/L	0.0250	89.0	76.4-114
4-Chlorotoluene	ND	0.0005	mg/L			
4-Methyl-2-pentanone	ND	0.001	mg/L			
Acetone	ND	0.010	mg/L			
Acrolein	ND	0.005	mg/L			
Acrylonitrile	ND	0.002	mg/L			
Benzene	ND	0.0005	mg/L			
Bromobenzene	ND	0.0005	mg/L			
Bromochloromethane	ND	0.0005	mg/L			
Bromodichloromethane	ND	0.0005	mg/L			
Bromoform	ND	0.0005	mg/L			
Bromomethane	ND	0.0005	mg/L			
Carbon disulfide	ND	0.001	mg/L			
Carbon tetrachloride	ND	0.0005	mg/L			

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Reported:
08/26/21 06:30

VOLATILES BY GC/MS - Quality Control
(Continued)

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch 1081915 - Volatiles (Continued)

Blank (1081915-BLK1) (Continued)

Prepared: 08/19/21 Analyzed: 08/20/21

Chlorobenzene	ND	0.0005	mg/L							
Chloroethane	ND	0.0005	mg/L							
Chloroform	ND	0.0005	mg/L							
Chloromethane	ND	0.0005	mg/L							
cis-1,2-Dichloroethene	ND	0.0005	mg/L							
cis-1,3-Dichloropropene	ND	0.0005	mg/L							
Dibromochloromethane	ND	0.0005	mg/L							
<i>Surrogate: Dibromofluoromethane</i>	<i>0.0277</i>		mg/L	<i>0.0250</i>		<i>111</i>	<i>82.4-141</i>			
Dibromomethane	ND	0.0005	mg/L							
Dichlorodifluoromethane	ND	0.0005	mg/L							
Ethylbenzene	ND	0.0005	mg/L							
Hexachlorobutadiene	ND	0.0005	mg/L							
Iodomethane	ND	0.001	mg/L							
Isopropylbenzene	ND	0.0005	mg/L							
m+p - Xylene	ND	0.001	mg/L							
Methyl t-Butyl Ether	ND	0.001	mg/L							
Methylene chloride	ND	0.0005	mg/L							
Naphthalene	ND	0.0005	mg/L							
n-Butylbenzene	ND	0.0005	mg/L							
n-Propylbenzene	ND	0.0005	mg/L							
o-Xylene	ND	0.0005	mg/L							
p-Isopropyltoluene	ND	0.0005	mg/L							
sec-Butylbenzene	ND	0.0005	mg/L							
Styrene	ND	0.0005	mg/L							
tert-Butylbenzene	ND	0.0005	mg/L							
Tetrachloroethene	ND	0.0005	mg/L							
Toluene	ND	0.0005	mg/L							
<i>Surrogate: Toluene-d8</i>	<i>0.0249</i>		mg/L	<i>0.0250</i>		<i>99.7</i>	<i>87.1-110</i>			
Total Xylenes	ND	0.0005	mg/L							
trans-1,2-Dichloroethene	ND	0.0005	mg/L							
trans-1,3-Dichloropropene	ND	0.0005	mg/L							
trans-1,4-Dichloro-2-butene	ND	0.010	mg/L							
Trichloroethene	ND	0.0005	mg/L							
Trichlorofluoromethane	ND	0.0005	mg/L							
Vinyl acetate	ND	0.0005	mg/L							
Vinyl chloride	ND	0.0005	mg/L							

LCS (1081915-BS1)

Prepared: 08/19/21 Analyzed: 08/20/21

1,1,1,2-Tetrachloroethane	0.022	0.0005	mg/L	0.0200		108	77.2-132			
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VOLATILES BY GC/MS - Quality Control
(Continued)

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch 1081915 - Volatiles (Continued)

LCS (1081915-BS1) (Continued)

Prepared: 08/19/21 Analyzed: 08/20/21

1,1,1-Trichloroethane	0.021	0.0005	mg/L	0.0200		106	84.9-121			
1,1,2,2-Tetrachloroethane	0.017	0.0005	mg/L	0.0200		84.2	83-118			
1,1,2-Trichloroethane	0.018	0.0005	mg/L	0.0200		89.5	85.8-121			
1,1-Dichloroethane	0.019	0.0005	mg/L	0.0200		97.0	82.3-134			
1,1-Dichloroethene	0.018	0.0005	mg/L	0.0200		90.6	69.4-135			
1,1-Dichloropropene	0.020	0.0005	mg/L	0.0200		99.2	79-126			
1,2,3-Trichlorobenzene	0.018	0.0005	mg/L	0.0200		92.4	66-144			
1,2,4-Trichlorobenzene	0.019	0.0005	mg/L	0.0200		96.0	66-139			
1,2,4-Trimethylbenzene	0.020	0.0005	mg/L	0.0200		98.3	85.2-120			
1,2-Dibromo-3-chloropropane	0.015	0.0005	mg/L	0.0200		73.4	85.9-113			BS2
1,2-Dibromoethane	0.017	0.0005	mg/L	0.0200		87.3	84.9-118			
1,2-Dichlorobenzene	0.019	0.0005	mg/L	0.0200		96.2	85.1-112			
1,2-Dichloroethane	0.021	0.0005	mg/L	0.0200		105	80.8-125			
1,2-Dichloropropane	0.021	0.0005	mg/L	0.0200		106	83.2-124			
1,3,5-Trimethylbenzene	0.019	0.0005	mg/L	0.0200		96.9	84.3-120			
1,3-Dichlorobenzene	0.020	0.0005	mg/L	0.0200		99.2	84.9-110			
1,3-Dichloropropane	0.019	0.0005	mg/L	0.0200		95.4	88.8-117			
1,4 Dichlorobenzene	0.020	0.0005	mg/L	0.0200		97.5	80.9-112			
1,4-Dioxane	1.43	0.100	mg/L	2.00		71.6	-99.5-195			
1,2,3-trichloropropane	0.019	0.0005	mg/L	0.0200		93.8	6.02-213			
2,2-Dichloropropane	0.017	0.0005	mg/L	0.0200		83.4	59.7-146			
2-Butanone	0.033	0.002	mg/L	0.0400		81.8	69.2-152			
2-Chlorotoluene	0.019	0.0005	mg/L	0.0200		95.0	84.7-117			
2-Hexanone	0.027	0.001	mg/L	0.0400		67.4	66-142			
Surrogate: 4-Bromofluorobenzene	0.0247		mg/L	0.0250		98.7	76.4-114			
4-Chlorotoluene	0.020	0.0005	mg/L	0.0200		101	81.8-122			
4-Methyl-2-pentanone	0.032	0.001	mg/L	0.0400		81.2	75.9-139			
Acetone	0.034	0.010	mg/L	0.0400		84.2	47.7-194			
Acrolein	0.219	0.005	mg/L	0.200		109	46.2-182			
Acrylonitrile	0.032	0.002	mg/L	0.0400		80.3	69.5-152			
Benzene	0.021	0.0005	mg/L	0.0200		104	85.9-114			
Bromobenzene	0.020	0.0005	mg/L	0.0200		97.6	85.7-113			
Bromochloromethane	0.019	0.0005	mg/L	0.0200		97.2	74.2-140			
Bromodichloromethane	0.023	0.0005	mg/L	0.0200		113	82-126			
Bromoform	0.020	0.0005	mg/L	0.0200		99.2	80.3-140			
Bromomethane	0.020	0.0005	mg/L	0.0200		98.1	69.3-136			
Carbon disulfide	0.044	0.001	mg/L	0.0400		110	74.2-141			
Carbon tetrachloride	0.025	0.0005	mg/L	0.0200		124	85.8-125			
Chlorobenzene	0.020	0.0005	mg/L	0.0200		99.4	88.8-112			

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Project Manager: Kyle Siesser

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VOLATILES BY GC/MS - Quality Control
(Continued)

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch 1081915 - Volatiles (Continued)

LCS (1081915-BS1) (Continued)

Prepared: 08/19/21 Analyzed: 08/20/21

Chloroethane	0.020	0.0005	mg/L	0.0200		98.6	73.8-135			
Chloroform	0.019	0.0005	mg/L	0.0200		95.6	88.1-124			
Chloromethane	0.022	0.0005	mg/L	0.0200		108	59.9-154			
cis-1,2-Dichloroethene	0.021	0.0005	mg/L	0.0200		105	85.8-117			
cis-1,3-Dichloropropene	0.019	0.0005	mg/L	0.0200		94.4	84.6-125			
Dibromochloromethane	0.021	0.0005	mg/L	0.0200		106	88.2-121			
<i>Surrogate: Dibromofluoromethane</i>	<i>0.0265</i>		mg/L	<i>0.0250</i>		<i>106</i>	<i>82.4-141</i>			
Dibromomethane	0.019	0.0005	mg/L	0.0200		93.6	73.5-132			
Dichlorodifluoromethane	0.021	0.0005	mg/L	0.0200		107	63.3-132			
Ethylbenzene	0.020	0.0005	mg/L	0.0200		98.8	81.8-127			
Hexachlorobutadiene	0.020	0.0005	mg/L	0.0200		100	52.9-152			
Iodomethane	0.041	0.001	mg/L	0.0400		102	72.5-133			
Isopropylbenzene	0.019	0.0005	mg/L	0.0200		97.0	75.7-136			
m+p - Xylene	0.040	0.001	mg/L	0.0400		98.9	72.4-134			
Methyl t-Butyl Ether	0.034	0.001	mg/L	0.0400		84.2	75.3-137			
Methylene chloride	0.023	0.0005	mg/L	0.0200		114	74.8-131			
Naphthalene	0.014	0.0005	mg/L	0.0200		71.9	59.3-140			
n-Butylbenzene	0.019	0.0005	mg/L	0.0200		93.8	70.1-136			
n-Propylbenzene	0.020	0.0005	mg/L	0.0200		97.6	83-121			
o-Xylene	0.019	0.0005	mg/L	0.0200		93.6	76.2-135			
p-Isopropyltoluene	0.018	0.0005	mg/L	0.0200		92.4	81.8-124			
sec-Butylbenzene	0.019	0.0005	mg/L	0.0200		95.6	78.4-128			
Styrene	0.019	0.0005	mg/L	0.0200		96.3	75.7-128			
tert-Butylbenzene	0.019	0.0005	mg/L	0.0200		95.4	90.8-119			
Tetrachloroethene	0.019	0.0005	mg/L	0.0200		92.8	66.8-126			
Toluene	0.019	0.0005	mg/L	0.0200		96.2	78.8-121			
<i>Surrogate: Toluene-d8</i>	<i>0.0247</i>		mg/L	<i>0.0250</i>		<i>98.8</i>	<i>87.1-110</i>			
Total Xylenes	0.058	0.0005	mg/L	0.0600		97.1	74.3-134			
trans-1,2-Dichloroethene	0.019	0.0005	mg/L	0.0200		93.5	80.4-125			
trans-1,3-Dichloropropene	0.020	0.0005	mg/L	0.0200		101	84-128			
trans-1,4-Dichloro-2-butene	0.058	0.010	mg/L	0.0400		145	18.7-238			
Trichloroethene	0.020	0.0005	mg/L	0.0200		97.7	73.1-117			
Trichlorofluoromethane	0.018	0.0005	mg/L	0.0200		91.2	71.9-138			
Vinyl acetate	0.024	0.0005	mg/L	0.0200		121	39.5-167			
Vinyl chloride	0.020	0.0005	mg/L	0.0200		101	73.4-137			

LCS Dup (1081915-BSD1)

Prepared: 08/19/21 Analyzed: 08/20/21

1,1,1,2-Tetrachloroethane	0.022	0.0005	mg/L	0.0200		108	77.2-132	0.371	6.88	
1,1,1-Trichloroethane	0.021	0.0005	mg/L	0.0200		107	84.9-121	0.847	7.43	

Green Analytical Laboratories

Debbie Zufelt, Reports Manager

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Cottonwood Consulting
PO Box 1653
Durango CO, 81302

Project: COGCC Table 915-1 GW
Project Name / Number: Underwood Ditch Well Plugging Project
Project Manager: Kyle Siesser

Reported:
08/26/21 06:30

VOLATILES BY GC/MS - Quality Control
(Continued)

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch 1081915 - Volatiles (Continued)

LCS Dup (1081915-BSD1) (Continued)

Prepared: 08/19/21 Analyzed: 08/20/21

1,1,2,2-Tetrachloroethane	0.016	0.0005	mg/L	0.0200		82.2	83-118	2.40	8.68	BS2
1,1,2-Trichloroethane	0.018	0.0005	mg/L	0.0200		88.8	85.8-121	0.673	6.82	
1,1-Dichloroethane	0.020	0.0005	mg/L	0.0200		99.2	82.3-134	2.14	4.3	
1,1-Dichloroethene	0.019	0.0005	mg/L	0.0200		95.1	69.4-135	4.90	16.5	
1,1-Dichloropropene	0.020	0.0005	mg/L	0.0200		101	79-126	1.65	5.47	
1,2,3-Trichlorobenzene	0.019	0.0005	mg/L	0.0200		92.9	66-144	0.486	43	
1,2,4-Trichlorobenzene	0.019	0.0005	mg/L	0.0200		97.0	66-139	0.984	22.3	
1,2,4-Trimethylbenzene	0.020	0.0005	mg/L	0.0200		97.9	85.2-120	0.408	8.94	
1,2-Dibromo-3-chloropropane	0.014	0.0005	mg/L	0.0200		71.4	85.9-113	2.83	15.1	BS2
1,2-Dibromoethane	0.018	0.0005	mg/L	0.0200		88.8	84.9-118	1.70	5.83	
1,2-Dichlorobenzene	0.020	0.0005	mg/L	0.0200		97.7	85.1-112	1.60	8.72	
1,2-Dichloroethane	0.021	0.0005	mg/L	0.0200		106	80.8-125	0.760	8.94	
1,2-Dichloropropane	0.021	0.0005	mg/L	0.0200		107	83.2-124	0.844	5.51	
1,3,5-Trimethylbenzene	0.020	0.0005	mg/L	0.0200		97.6	84.3-120	0.669	16.5	
1,3-Dichlorobenzene	0.020	0.0005	mg/L	0.0200		102	84.9-110	2.83	9	
1,3-Dichloropropane	0.019	0.0005	mg/L	0.0200		96.2	88.8-117	0.783	6.06	
1,4-Dichlorobenzene	0.020	0.0005	mg/L	0.0200		98.6	80.9-112	1.07	7.71	
1,4-Dioxane	1.38	0.100	mg/L	2.00		68.8	-99.5-195	4.05	35.2	
1,2,3-trichloropropane	0.017	0.0005	mg/L	0.0200		85.4	6.02-213	9.37	49.2	
2,2-Dichloropropane	0.017	0.0005	mg/L	0.0200		84.6	59.7-146	1.37	9.62	
2-Butanone	0.033	0.002	mg/L	0.0400		82.8	69.2-152	1.22	14.2	
2-Chlorotoluene	0.019	0.0005	mg/L	0.0200		94.2	84.7-117	0.898	8.62	
2-Hexanone	0.027	0.001	mg/L	0.0400		66.3	66-142	1.53	7.28	
Surrogate: 4-Bromofluorobenzene	0.0243		mg/L	0.0250		97.1	76.4-114			
4-Chlorotoluene	0.020	0.0005	mg/L	0.0200		100	81.8-122	1.34	15.5	
4-Methyl-2-pentanone	0.032	0.001	mg/L	0.0400		80.5	75.9-139	0.958	7.57	
Acetone	0.033	0.010	mg/L	0.0400		82.4	47.7-194	2.16	30.5	
Acrolein	0.207	0.005	mg/L	0.200		103	46.2-182	5.83	22.4	
Acrylonitrile	0.033	0.002	mg/L	0.0400		82.6	69.5-152	2.76	7.62	
Benzene	0.021	0.0005	mg/L	0.0200		104	85.9-114	0.00	4.16	
Bromobenzene	0.019	0.0005	mg/L	0.0200		95.9	85.7-113	1.71	8.41	
Bromochloromethane	0.019	0.0005	mg/L	0.0200		96.2	74.2-140	0.982	5.16	
Bromodichloromethane	0.023	0.0005	mg/L	0.0200		113	82-126	0.487	5.36	
Bromoform	0.019	0.0005	mg/L	0.0200		94.6	80.3-140	4.75	14.1	
Bromomethane	0.020	0.0005	mg/L	0.0200		98.0	69.3-136	0.153	21.5	
Carbon disulfide	0.043	0.001	mg/L	0.0400		107	74.2-141	1.98	20.3	
Carbon tetrachloride	0.022	0.0005	mg/L	0.0200		108	85.8-125	14.0	11.4	QR-04
Chlorobenzene	0.020	0.0005	mg/L	0.0200		100	88.8-112	0.752	5.18	
Chloroethane	0.020	0.0005	mg/L	0.0200		98.6	73.8-135	0.00	24.1	

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Debbie Zufelt

Debbie Zufelt, Reports Manager

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Cottonwood Consulting
PO Box 1653
Durango CO, 81302

Project: COGCC Table 915-1 GW
Project Name / Number: Underwood Ditch Well Plugging Project
Project Manager: Kyle Siesser

Reported:
08/26/21 06:30

VOLATILES BY GC/MS - Quality Control
(Continued)

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch 1081915 - Volatiles (Continued)

LCS Dup (1081915-BSD1) (Continued)

Prepared: 08/19/21 Analyzed: 08/20/21

Chloroform	0.019	0.0005	mg/L	0.0200		94.3	88.1-124	1.37	5.15	
Chloromethane	0.022	0.0005	mg/L	0.0200		110	59.9-154	1.65	27	
cis-1,2-Dichloroethene	0.022	0.0005	mg/L	0.0200		108	85.8-117	2.25	5.73	
cis-1,3-Dichloropropene	0.020	0.0005	mg/L	0.0200		98.2	84.6-125	4.00	6.09	
Dibromochloromethane	0.020	0.0005	mg/L	0.0200		102	88.2-121	3.31	7.24	
<i>Surrogate: Dibromofluoromethane</i>	<i>0.0262</i>		mg/L	<i>0.0250</i>		<i>105</i>	<i>82.4-141</i>			
Dibromomethane	0.019	0.0005	mg/L	0.0200		94.0	73.5-132	0.427	5.75	
Dichlorodifluoromethane	0.022	0.0005	mg/L	0.0200		109	63.3-132	2.46	22.6	
Ethylbenzene	0.020	0.0005	mg/L	0.0200		100	81.8-127	1.26	4.83	
Hexachlorobutadiene	0.020	0.0005	mg/L	0.0200		102	52.9-152	1.59	18.4	
Iodomethane	0.042	0.001	mg/L	0.0400		104	72.5-133	1.94	24.3	
Isopropylbenzene	0.020	0.0005	mg/L	0.0200		98.0	75.7-136	1.08	6.25	
m+p - Xylene	0.040	0.001	mg/L	0.0400		101	72.4-134	2.20	5.77	
Methyl t-Butyl Ether	0.034	0.001	mg/L	0.0400		84.0	75.3-137	0.178	12.8	
Methylene chloride	0.021	0.0005	mg/L	0.0200		107	74.8-131	6.53	19.7	
Naphthalene	0.014	0.0005	mg/L	0.0200		71.6	59.3-140	0.488	33.5	
n-Butylbenzene	0.019	0.0005	mg/L	0.0200		96.7	70.1-136	3.04	10.1	
n-Propylbenzene	0.020	0.0005	mg/L	0.0200		98.7	83-121	1.12	9.09	
o-Xylene	0.019	0.0005	mg/L	0.0200		95.4	76.2-135	1.96	6.29	
p-Isopropyltoluene	0.019	0.0005	mg/L	0.0200		96.0	81.8-124	3.87	9.26	
sec-Butylbenzene	0.020	0.0005	mg/L	0.0200		97.6	78.4-128	2.12	9.85	
Styrene	0.019	0.0005	mg/L	0.0200		97.2	75.7-128	0.879	7.55	
tert-Butylbenzene	0.021	0.0005	mg/L	0.0200		106	90.8-119	10.8	18.6	
Tetrachloroethene	0.019	0.0005	mg/L	0.0200		96.9	66.8-126	4.22	6.38	
Toluene	0.019	0.0005	mg/L	0.0200		96.6	78.8-121	0.415	5.67	
<i>Surrogate: Toluene-d8</i>	<i>0.0250</i>		mg/L	<i>0.0250</i>		<i>100</i>	<i>87.1-110</i>			
Total Xylenes	0.060	0.0005	mg/L	0.0600		99.2	74.3-134	2.12	5.83	
trans-1,2-Dichloroethene	0.019	0.0005	mg/L	0.0200		95.8	80.4-125	2.43	19.1	
trans-1,3-Dichloropropene	0.020	0.0005	mg/L	0.0200		100	84-128	0.793	6.26	
trans-1,4-Dichloro-2-butene	0.050	0.010	mg/L	0.0400		124	18.7-238	15.6	92.8	
Trichloroethene	0.020	0.0005	mg/L	0.0200		97.5	73.1-117	0.205	4.92	
Trichlorofluoromethane	0.018	0.0005	mg/L	0.0200		91.3	71.9-138	0.0548	19.8	
Vinyl acetate	0.023	0.0005	mg/L	0.0200		116	39.5-167	4.02	7.84	
Vinyl chloride	0.021	0.0005	mg/L	0.0200		107	73.4-137	5.09	23	

Green Analytical Laboratories

Debbie Zufelt

Debbie Zufelt, Reports Manager

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Cottonwood Consulting
PO Box 1653
Durango CO, 81302

Project: COGCC Table 915-1 GW
Project Name / Number: Underwood Ditch Well Plugging Project
Project Manager: Kyle Siesser

Reported:
08/26/21 06:30

Notes and Definitions

QR-04 The RPD for the BS/BSD was outside of historical limits.

BS2 Blank spike recovery below laboratory acceptance criteria. Results for analyte potentially biased low.

DET Analyte DETECTED

ND Analyte NOT DETECTED at or above the reporting limit

NR Not Reported

dry Sample results reported on a dry weight basis
*Results reported on as received basis unless designated as dry.

RPD Relative Percent Difference

LCS Laboratory Control Sample (Blank Spike)

RL Report Limit

MDL Method Detection Limit

Green Analytical Laboratories

Debbie Zufelt, Reports Manager

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CHAIN-OF-CUSTODY AND ANALYSIS REQUEST

(970) 247-4220 service@greenanalytical.com or dzufelt@greenanalytical.com
Fax: (970) 247-4227 75 Suttle St Durango, CO 81303

Company Name: Cottonwood Consulting LLC		P.O. #:		Bill to (if different):		ANALYSIS REQUEST																																					
Project Manager: Kyle Siesser		Company:																																									
Address: PO Box 1653		Attn:																																									
City: Durango		State: CO		Zip: 81302																																							
Phone #: 970-764-7356		Email: ksiesser@cottonwoodconsulting.com		Address:																																							
Additional Report To:		City:		State:		Zip:																																					
Project Name: Underwood Ditch well Plugging Project		Phone #:																																									
Project Number:		Fax or Email:																																									
Sampler Name (Print): Emma Millar																																											
FOR LAB USE ONLY		Collected		Matrix (check one)		# of containers																																					
Lab I.D.		Date		Time		GROUNDWATER		SURFACEWATER		WASTEWATER		PRODUCEDWATER		SOIL		OTHER :		No preservation (general)		HNO ₃		HCl		H ₂ SO ₄		Other:		Other:															
Sample Name or Location		8/12/21		1046		X		X										1		1		8																					
8168125-01 WSO1		8/12/21		1118		X																																					
-02 WSO2																																											