



December 22, 2017

Eagle Environmental Consulting, Inc.

Dan Coloccia

4101 Inca Street

Denver

CO 80211

Project Name - Crestone - lone4

Project Number - [none]

Attached are your analytical results for Crestone - lone4 received by Origins Laboratory, Inc. December 18, 2017. This project is associated with Origins project number Y712330-01.

The analytical results in the following report were analyzed under the guidelines of EPA Methods. These methods are identified as follows; "SW" are defined in SW-846, "EPA" are defined in 40CFR part 136 and "SM" are defined in the most current revision of Standard Methods For the Examination of Water and Wastewater.

The analytical results apply specifically to the samples and analyses specified per the attached Chain of Custody. As such, this report shall not be reproduced except in full, without the written approval of Origin's laboratory.

Unless otherwise noted, the analytical results for all soil samples are reported on a wet weight basis. All analytical analyses were performed under NELAP guidelines unless noted by a data qualifier.

Any holding time exceedances, deviations from the method specifications or deviations from Origins Laboratory's Standard Operating Procedures are outlined in the case narrative.

Thank you for selecting Origins for your analytical needs. Please contact us with any questions concerning this report, or if we can help with anything at all.

Origins Laboratory, Inc.
303.433.1322
o-squad@oelabinc.com



1725 Elk Place, Denver, CO 80211 | Phone: 303.433.1322 | Fax: 303.265.9645

Eagle Environmental Consulting, Inc.

4101 Inca Street

Denver CO 80211

Dan Coloccia

Project Number: [none]

Project: Crestone - lone4

CROSS REFERENCE REPORT

Sample ID	Laboratory ID	Matrix	Date Sampled	Date Received
MW-1	Y712330-01	Water	December 18, 2017 13:20	12/18/2017 16:20
MW-2	Y712330-02	Water	December 18, 2017 13:30	12/18/2017 16:20
MW-3	Y712330-03	Water	December 18, 2017 13:20	12/18/2017 16:20
MW-4	Y712330-04	Water	December 18, 2017 13:30	12/18/2017 16:20
MW-5	Y712330-05	Water	December 18, 2017 13:35	12/18/2017 16:20

Origins Laboratory, Inc.



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Eagle Environmental Consulting, Inc.
4101 Inca Street
Denver CO 80211

Dan Coloccia
Project Number: [none]
Project: Crestone - lone4

ORIGINS
LABORATORY, INC

www.originslaboratory.com

1712330

page / of /

Client: Eagle
Address: 4101 Inca Street
Telephone Number: 303-433-0429
Email Address: dcoloccia@eagle-enviro.com

Project Manager: Dan Coloccia
Project Name: lone4
Project Number: Crestone
Samples Collected By: SVB JG.

Sample ID Description	Date Sampled	Time Sampled	# of Containers	Preservative				Matrix			Analysis	Sample Instructions	
				Unpreserved	HCl	HNO ₃	Other	Groundwater	Soil	Air/Sediment			
MW-1	12-18-17	13:20	3		X				X				1
MW-2	12-18-17	13:30	3		X				X				2
MW-3	12-18-17	13:20	3		X				X				3
MW-4	12-18-17	13:30	3		X				X				4
MW-5	12-18-17	13:55	3		X				X				5
													6
													7
													8
													9
													10

Relinquished By:	Date:	Time:	Received By:	Date:	Time:	Turnaround Time:		
						Some Day	24 Hr	72 Hr
<u>[Signature]</u>	12-18-17	16:20	<u>[Signature]</u>	12-18-17	16:20	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
<u>[Signature]</u>			<u>[Signature]</u>			<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Temp Received- 4.7 Date Results Needed

Origins Laboratory, Inc.

Jefe Pellegrini

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Eagle Environmental Consulting, Inc.
4101 Inca Street
Denver CO 80211

Dan Coloccia
Project Number: [none]
Project: Crestone - Ione4

Origins Laboratory

F-012207-01-R1
Effective Date: 01/09/12

Sample Receipt Checklist

Origins Work Order: 7112330

Client: Eagle Env

Client Project ID: Crestone - Ione 4

Checklist Completed by: Jim W

Shipped Via: HL

(UPS, FedEx, Hand Delivered, Pick-up, etc.)

Date/time completed: 12-19-11

Airbill #: 128

Matrix(s) Received: (Check all that apply): ☐ Soil/Solid ☒ Water ☐ Other: _____

Cooler Number/Temperature: 1 / 4.7 °C 1 / _____ °C 1 / _____ °C 1 / _____ °C

Thermometer ID: 7003

Requirement Description	Yes	No	N/A	Comments (if any)
If samples require cooling, was the temperature between 0°C to ≤ 6°C ⁽¹⁾ ?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Is there ice present (document if blue ice is used)	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Are custody seals present on cooler? (if so, document in comments if they are signed and dated, broken or intact)	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	
Are custody seals present on each sample container? (if so, document in comments if they are signed and dated, broken or intact)	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	
Were all samples received intact ⁽¹⁾ ?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Was adequate sample volume provided ⁽¹⁾ ?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Are short holding time analytes or samples with HTs due within 48 hours present ⁽¹⁾ ?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	
Is a chain-of-custody (COC) present and filled out completely ⁽¹⁾ ?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Does the COC agree with the number and type of sample bottles received ⁽¹⁾ ?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Do the sample IDs on the bottle labels match the COC ⁽¹⁾ ?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Is the COC properly relinquished by the client with date and time recorded ⁽¹⁾ ?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
For volatiles in water – is there headspace (> ¼ inch bubble) present? If yes, contact client and note in narrative.	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	
Are samples preserved that require preservation and was it checked ⁽¹⁾ ? (note ID of confirmation instrument used in comments) / (preservation is not confirmed for subcontracted analyses in order to insure sample integrity)(pH <2 for samples preserved with HNO ₃ , HCL, H ₂ SO ₄) / (pH >10 for samples preserved with NaAsO ₂ +NaOH, ZnAc+NaOH)	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	
Additional Comments (if any):				

⁽¹⁾If NO, then contact the client before proceeding with analysis and note date/time and person contacted as well as the corrective action to in the additional comments (above) and the case narrative.

Reviewed by (Project Manager) JP

Date/Time Reviewed 12/20/11

Origins Laboratory, Inc.

Jefe Pellegrini

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Eagle Environmental Consulting, Inc.

4101 Inca Street

Denver CO 80211

Dan Coloccia

Project Number: [none]

Project: Crestone - lone4

MW-1

12/18/2017 1:20:00PM

Analyte	Result	Reporting		Units	Dilution	Batch	Prepared	Analyzed	Notes
		Limit							

Origins Laboratory, Inc.

Y712330-01 (Water)

BTEX by EPA 8260C

Benzene	ND	1.00	ug/L	1	B7L2106	12/21/2017	12/22/2017	U
Toluene	ND	1.00	"	"	"	"	"	U
Ethylbenzene	ND	1.00	"	"	"	"	"	U
Xylenes, total	ND	1.00	"	"	"	"	"	U

Surrogate: 1,2-Dichloroethane-d4	99.1 %	84-121	"	"	"
Surrogate: Toluene-d8	102 %	85-115	"	"	"
Surrogate: 4-Bromofluorobenzene	94.8 %	84-114	"	"	"

Origins Laboratory, Inc.



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Eagle Environmental Consulting, Inc.
4101 Inca Street
Denver CO 80211

Dan Coloccia
Project Number: [none]
Project: Crestone - lone4

MW-2

12/18/2017 1:30:00PM

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Notes
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Origins Laboratory, Inc. Y712330-02 (Water)

BTEX by EPA 8260C

Benzene	506	10.0	ug/L	10	B7L2106	12/21/2017	12/22/2017	
Toluene	ND	1.00	"	1	"	"	12/22/2017	U
Ethylbenzene	166	1.00	"	"	"	"	"	
Xylenes, total	1350	10.0	"	10	"	"	12/22/2017	
Surrogate: 1,2-Dichloroethane-d4	96.1 %	84-121			"	"	12/22/2017	
Surrogate: Toluene-d8	102 %	85-115			"	"	"	
Surrogate: 4-Bromofluorobenzene	95.1 %	84-114			"	"	"	

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4101 Inca Street
Denver CO 80211

Dan Coloccia
Project Number: [none]
Project: Crestone - lone4

MW-3

12/18/2017 1:20:00PM

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Notes
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Origins Laboratory, Inc. Y712330-03 (Water)

BTEX by EPA 8260C

Benzene	ND	1.00	ug/L	1	B7L2106	12/21/2017	12/22/2017	U
Toluene	ND	1.00	"	"	"	"	"	U
Ethylbenzene	88.6	1.00	"	"	"	"	"	
Xylenes, total	1460	10.0	"	10	"	"	12/22/2017	

Surrogate: 1,2-Dichloroethane-d4	98.0 %	84-121			"	"	12/22/2017	
Surrogate: Toluene-d8	106 %	85-115			"	"	"	
Surrogate: 4-Bromofluorobenzene	97.2 %	84-114			"	"	"	

Origins Laboratory, Inc.



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4101 Inca Street
Denver CO 80211

Dan Coloccia
Project Number: [none]
Project: Crestone - lone4

MW-4

12/18/2017 1:30:00PM

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Notes
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Origins Laboratory, Inc. Y712330-04 (Water)

BTEX by EPA 8260C

Benzene	ND	1.00	ug/L	1	B7L2106	12/21/2017	12/22/2017	U
Toluene	ND	1.00	"	"	"	"	"	U
Ethylbenzene	ND	1.00	"	"	"	"	"	U
Xylenes, total	ND	1.00	"	"	"	"	"	U

Surrogate: 1,2-Dichloroethane-d4	101 %	84-121			"	"	"	
Surrogate: Toluene-d8	105 %	85-115			"	"	"	
Surrogate: 4-Bromofluorobenzene	96.1 %	84-114			"	"	"	

Origins Laboratory, Inc.



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Eagle Environmental Consulting, Inc.
4101 Inca Street
Denver CO 80211

Dan Coloccia
Project Number: [none]
Project: Crestone - lone4

MW-5

12/18/2017 1:35:00PM

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Notes
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Origins Laboratory, Inc. Y712330-05 (Water)

BTEX by EPA 8260C

Benzene	ND	1.00	ug/L	1	B7L2106	12/21/2017	12/22/2017	U
Toluene	ND	1.00	"	"	"	"	"	U
Ethylbenzene	ND	1.00	"	"	"	"	"	U
Xylenes, total	ND	1.00	"	"	"	"	"	U

Surrogate: 1,2-Dichloroethane-d4	98.4 %	84-121			"	"	"	
Surrogate: Toluene-d8	101 %	85-115			"	"	"	
Surrogate: 4-Bromofluorobenzene	95.5 %	84-114			"	"	"	

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4101 Inca Street
Denver CO 80211

Dan Coloccia
Project Number: [none]
Project: Crestone - lone4

Volatile Organic Compounds by GC/MS SW846 8260C - Quality Control
Origins Laboratory, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B7L2106 - EPA 5030B (Water)										
Blank (B7L2106-BLK1)					Prepared: 12/21/2017 Analyzed: 12/21/2017					
Benzene	ND	1.00	ug/L							U
Toluene	ND	1.00	"							U
Ethylbenzene	ND	1.00	"							U
Xylenes, total	ND	1.00	"							U
Surrogate: 1,2-Dichloroethane-d4	62		"	62.5		99.1	84-121			
Surrogate: Toluene-d8	64		"	62.5		102	85-115			
Surrogate: 4-Bromofluorobenzene	60		"	62.5		95.7	84-114			

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Dan Coloccia

Project Number: [none]

Project: Crestone - lone4

Volatile Organic Compounds by GC/MS SW846 8260C - Quality Control
Origins Laboratory, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B7L2106 - EPA 5030B (Water)

LCS (B7L2106-BS1)

Prepared: 12/21/2017 Analyzed: 12/21/2017

Benzene	48.2	1.00	ug/L	50.0		96.4	73.3-129			
Toluene	47.2	1.00	"	50.0		94.3	76.2-123			
Ethylbenzene	48.8	1.00	"	50.0		97.5	73.6-130			
m,p-Xylene	95.6	2.00	"	100		95.6	76.1-126			
o-Xylene	49.3	1.00	"	50.0		98.5	76.6-124			
Surrogate: 1,2-Dichloroethane-d4	57		"	62.5		90.9	84-121			
Surrogate: Toluene-d8	63		"	62.5		101	85-115			
Surrogate: 4-Bromofluorobenzene	61		"	62.5		97.7	84-114			

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Dan Coloccia
Project Number: [none]
Project: Crestone - lone4

Volatile Organic Compounds by GC/MS SW846 8260C - Quality Control
Origins Laboratory, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B7L2106 - EPA 5030B (Water)

Matrix Spike (B7L2106-MS1)		Source: Y712325-05			Prepared: 12/21/2017 Analyzed: 12/22/2017					
Benzene	40.9	1.00	ug/L	50.0	ND	81.8	74-130			
Toluene	38.9	1.00	"	50.0	ND	77.8	73-131			
Ethylbenzene	39.6	1.00	"	50.0	ND	79.2	76-132			
m,p-Xylene	78.9	2.00	"	100	ND	78.9	69-139			
o-Xylene	41.4	1.00	"	50.0	ND	82.8	74-131			
Surrogate: 1,2-Dichloroethane-d4	57		"	62.5		91.6	84-121			
Surrogate: Toluene-d8	63		"	62.5		101	85-115			
Surrogate: 4-Bromofluorobenzene	60		"	62.5		95.7	84-114			

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Project: Crestone - lone4

Volatile Organic Compounds by GC/MS SW846 8260C - Quality Control
Origins Laboratory, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B7L2106 - EPA 5030B (Water)

Matrix Spike Dup (B7L2106-MSD1)		Source: Y712325-05			Prepared: 12/21/2017 Analyzed: 12/22/2017					
Benzene	42.4	1.00	ug/L	50.0	ND	84.7	74-130	3.43	20	
Toluene	41.0	1.00	"	50.0	ND	81.9	73-131	5.16	20	
Ethylbenzene	41.0	1.00	"	50.0	ND	82.1	76-132	3.62	20	
m,p-Xylene	83.4	2.00	"	100	ND	83.4	69-139	5.53	20	
o-Xylene	45.1	1.00	"	50.0	ND	90.2	74-131	8.53	20	
Surrogate: 1,2-Dichloroethane-d4	66		"	62.5		106	84-121			
Surrogate: Toluene-d8	63		"	62.5		100	85-115			
Surrogate: 4-Bromofluorobenzene	60		"	62.5		96.6	84-114			

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4101 Inca Street

Denver CO 80211

Dan Coloccia

Project Number: [none]

Project: Crestone - lone4

Notes and Definitions

U Sample is Non-Detect.

ND Analyte NOT DETECTED at or above the reporting limit

RPD Relative Percent Difference

All soil results are reported at a wet weight basis.

Origins Laboratory, Inc.



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Jen Pellegrini For Noelle Doyle Mathis, President