



December 20, 2018

Eagle Environmental Consulting, Inc.

Martin C Eckert III

4101 Inca Street

Denver

CO 80211

**Project Name - Noble - Edward Hemple Unit 1**

**Project Number - [none]**

Attached are your analytical results for Noble - Edward Hemple Unit 1 received by Origins Laboratory, Inc. December 19, 2018. This project is associated with Origins project number Y812327-01.

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

Martin C Eckert III  
Project Number: [none]  
Project: Noble - Edward Hemple Unit 1

CROSS REFERENCE REPORT

Sample ID	Laboratory ID	Matrix	Date Sampled	Date Received
GW-01	Y812327-01	Water	December 19, 2018 11:30	12/19/2018 14:55

Origins Laboratory, Inc.



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Jen Pellegrini For Noelle Doyle Mathis, President

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 4101 Inca Street  
 Denver CO 80211

Martin C Eckert III  
 Project Number: [none]  
 Project: Noble - Edward Hemple Unit 1

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4012327

page 1 of 1

**ORIGINS**  
 LABORATORY, INC

Client: Eagle Env. Consulting, Inc.  
 Address: 4101 Inca Street  
Denver, CO 80211  
 Telephone Number: 303-433-0179  
 Email Address: MCE3@eagle-env.com

Project Manager: Martin Eckert III  
 Project Name: Edward Hemple Unit 1  
 Project Number: 1  
 Samples Collected By: A. Newberry

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

Sample ID Description	Date Sampled	Time Sampled	# of Containers	Preservative				Matrix				Analysis		Sample Instructions	Turnaround Time: 24 Hr <input type="checkbox"/> 48 Hr <input type="checkbox"/> 72 Hr <input type="checkbox"/> Standard <input type="checkbox"/>		
				Unpreserved	HCl	HNO <sub>3</sub>	Other	Groundwater	Soil	Air Summa Canister #	Other	Date	Time			Date	Time
GW-01	12/19/18	11:30	3	X				X									

Relinquished By: [Signature] Date: 12/19/18 Time: 1435  
 Relinquished By: [Signature] Date: 12-6-18 Time: 1435

Received By: [Signature] Date: 12-6-18 Time: 1435  
 Received By: [Signature] Date: 12-6-18 Time: 1435

Temp Received: 49 Date Results Needed: Noble  
 Bill to Howard  
 RC: 425.857836  
 Code: 515315

Origins Laboratory, Inc.

*Jefe Pellegrini*

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Origins Laboratory

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

**Sample Receipt Checklist**

Origins Work Order: 7812327

Client: Eagle Env.

Client Project ID: Noble - Edward Hemple Unit 1

Checklist Completed by: Don Lee

Shipped Via: HD  
 (UPS, FedEx, Hand Delivered, Pick-up, etc.)

Date/time completed: 12-19-12

Airbill #: NA

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

Cooler Number/Temperature: 1 4.9 °C 1 °C 1 °C (Describe) 1 °C

Thermometer ID: 1003

Requirement Description	Yes	No	N/A	Comments (if any)
If samples require cooling, was the temperature between 0°C to ≤ 6°C <sup>(1)</sup> ?	<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 <sup>(1)</sup> ?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Was adequate sample volume provided <sup>(1)</sup> ?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Are short holding time analytes or samples with HTs due within 48 hours present <sup>(1)</sup> ?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	
Is a chain-of-custody (COC) present and filled out completely <sup>(1)</sup> ?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Does the COC agree with the number and type of sample bottles received <sup>(1)</sup> ?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Do the sample IDs on the bottle labels match the COC <sup>(1)</sup> ?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Is the COC properly relinquished by the client with date and time recorded <sup>(1)</sup> ?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
For volatiles in water – is there headspace (> ¼ inch bubble) present? <b>If yes, contact client and note in narrative.</b>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	
Are samples preserved that require preservation and was it checked <sup>(1)</sup> ? (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 <sub>3</sub> , HCL, H <sub>2</sub> SO <sub>4</sub> ) / (pH > 10 for samples preserved with NaAsO <sub>2</sub> +NaOH, ZnAc+NaOH)	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
Additional Comments (if any):				

<sup>(1)</sup>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) [Signature]

Date/Time Reviewed 12-19-12

Origins Laboratory, Inc.

Jefe Pellegrini

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 Denver CO 80211

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 Project: Noble - Edward Hemple Unit 1

**GW-01**

**12/19/2018 11:30:00AM**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Analyst	Prepared	Analyzed	Notes
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**Origins Laboratory, Inc.**  
**Y812327-01 (Water)**

**BTEX by EPA 8260C**

Benzene	277	4.00	ug/L	4	B8L1908	KDK	12/19/2018	12/19/2018	
Toluene	765	4.00	"	"	"	KDK	"	"	
Ethylbenzene	66.3	4.00	"	"	"	KDK	"	"	
Xylenes, total	907	4.00	"	"	"	KDK	"	"	
Surrogate: 1,2-Dichloroethane-d4	106 %			84-121		"	"	"	
Surrogate: Toluene-d8	98.7 %			85-115		"	"	"	
Surrogate: 4-Bromofluorobenzene	101 %			84-114		"	"	"	

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**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 B8L1908 - EPA 5030B (Water)**

**Blank (B8L1908-BLK1)**

Prepared: 12/19/2018 Analyzed: 12/19/2018

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	67		"	62.5	107		84-121			
Surrogate: Toluene-d8	62		"	62.5	99.8		85-115			
Surrogate: 4-Bromofluorobenzene	62		"	62.5	99.3		84-114			

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**Origins Laboratory, Inc.**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B8L1908 - EPA 5030B (Water)

**LCS (B8L1908-BS1)**

Prepared: 12/19/2018 Analyzed: 12/19/2018

Benzene	46.9	1.00	ug/L	50.0		93.8	73.3-129			
Toluene	45.6	1.00	"	50.0		91.2	76.2-123			
Ethylbenzene	44.2	1.00	"	50.0		88.3	73.6-130			
m,p-Xylene	88.9	2.00	"	100		88.9	76.1-126			
o-Xylene	44.1	1.00	"	50.0		88.2	76.6-124			
Surrogate: 1,2-Dichloroethane-d4	62		"	62.5		99.8	84-121			
Surrogate: Toluene-d8	62		"	62.5		99.2	85-115			
Surrogate: 4-Bromofluorobenzene	61		"	62.5		97.9	84-114			

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**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 B8L1908 - EPA 5030B (Water)

Matrix Spike (B8L1908-MS1)	Source: Y812274-06			Prepared: 12/19/2018 Analyzed: 12/19/2018						
Benzene	54.5	1.00	ug/L	50.0	0.100	109	74-130			
Toluene	53.3	1.00	"	50.0	0.130	106	73-131			
Ethylbenzene	51.2	1.00	"	50.0	0.130	102	76-132			
m,p-Xylene	104	2.00	"	100	0.380	104	69-139			
o-Xylene	50.8	1.00	"	50.0	0.220	101	74-131			
Surrogate: 1,2-Dichloroethane-d4	64		"	62.5		103	84-121			
Surrogate: Toluene-d8	62		"	62.5		98.5	85-115			
Surrogate: 4-Bromofluorobenzene	61		"	62.5		97.1	84-114			

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**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 B8L1908 - EPA 5030B (Water)**

Matrix Spike Dup (B8L1908-MSD1)	Source: Y812274-06			Prepared: 12/19/2018 Analyzed: 12/19/2018						
Benzene	51.8	1.00	ug/L	50.0	0.100	104	74-130	5.06	20	
Toluene	51.9	1.00	"	50.0	0.130	103	73-131	2.70	20	
Ethylbenzene	51.0	1.00	"	50.0	0.130	102	76-132	0.372	20	
m,p-Xylene	104	2.00	"	100	0.380	103	69-139	0.528	20	
o-Xylene	50.5	1.00	"	50.0	0.220	100	74-131	0.691	20	
Surrogate: 1,2-Dichloroethane-d4	62		"	62.5		98.6	84-121			
Surrogate: Toluene-d8	63		"	62.5		101	85-115			
Surrogate: 4-Bromofluorobenzene	62		"	62.5		99.0	84-114			

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**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.

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Jen Pellegrini For Noelle Doyle Mathis, President