



ENVIRONMENTAL  
SCIENCE CORP.

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

Ken Kreie  
Cordilleran Compliance - GJ, CO  
826 21 1/2 Road

Grand Junction, CO 81505

## Report Summary

Monday June 08, 2009

Report Number: L405366

Samples Received: 06/02/09

Client Project:

Description: Noble 1B Pit

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:

John D. Blackman, ESC Representative

### Laboratory Certification Numbers

A2LA - 1461-01, AIHA - 100789, AL - 40660, CA - I-2327, CT - PH-0197, FL - E87487  
GA - 923, IN - C-TN-01, KY - 90010, KYUST - 0016, NC - ENV375, DW21704, ND - R-140  
NJ - TN002, NJ NELAP - TN002, SC - 84004, TN - 2006, VA - 00109, WV - 233  
AZ - 0612, MN - 047-999-395, NY - 11742, WI - 998093910

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 Environmental Science Corp.

Where applicable, sampling conducted by ESC is performed per guidance provided in laboratory standard operating procedures: 060302, 060303, and 060304.



ENVIRONMENTAL  
SCIENCE CORP.

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

REPORT OF ANALYSIS

Ken Kreie  
Cordilleran Compliance - GJ, CO  
826 21 1/2 Road  
Grand Junction, CO 81505

June 08, 2009

Date Received : June 02, 2009  
Description : Noble 1B Pit

Sample ID : 1BNW15 15FT

Collected By : Ken Kreie  
Collection Date : 05/29/09 15:30

ESC Sample # : L405366-01

Site ID :

Project # :

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
pH	8.4		su	9045D	06/05/09	1
Sodium Adsorption Ratio	1.2			Calc.	06/06/09	104.4
Specific Conductance	1200		umhos/cm	9050AMod	06/03/09	1
Benzene	BDL	0.0025	mg/kg	8021/8015	06/05/09	5
Toluene	BDL	0.025	mg/kg	8021/8015	06/05/09	5
Ethylbenzene	BDL	0.0025	mg/kg	8021/8015	06/05/09	5
Total Xylene	BDL	0.0075	mg/kg	8021/8015	06/05/09	5
TPH (GC/FID) Low Fraction	BDL	0.50	mg/kg	GRO	06/05/09	5
Surrogate Recovery-%						
a,a,a-Trifluorotoluene(FID)	92.7		% Rec.	8021/8015	06/05/09	5
a,a,a-Trifluorotoluene(PID)	99.6		% Rec.	8021/8015	06/05/09	5
TPH (GC/FID) High Fraction	37.	4.0	mg/kg	3546/DRO	06/04/09	1
Surrogate recovery(%)						
o-Terphenyl	71.3		% Rec.	3546/DRO	06/04/09	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

Note:

The reported analytical results relate only to the sample submitted.

This report shall not be reproduced, except in full, without the written approval from ESC.

.

Reported: 06/08/09 16:40 Printed: 06/08/09 16:41

L405366-01 (PH) - 8.4@21.5c



ENVIRONMENTAL  
SCIENCE CORP.

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

REPORT OF ANALYSIS

Ken Kreie  
Cordilleran Compliance - GJ, CO  
826 21 1/2 Road  
Grand Junction, CO 81505

June 08, 2009

Date Received : June 02, 2009  
Description : Noble 1B Pit

Sample ID : 1BNW25 25FT

Collected By : Ken Kreie  
Collection Date : 05/29/09 16:00

ESC Sample # : L405366-02

Site ID :

Project # :

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
pH	8.0		su	9045D	06/05/09	1
Sodium Adsorption Ratio	0.95			Calc.	06/06/09	540.1
Specific Conductance	3.1		umhos/cm	9050AMod	06/03/09	1
Benzene	BDL	0.0025	mg/kg	8021/8015	06/05/09	5
Toluene	BDL	0.025	mg/kg	8021/8015	06/05/09	5
Ethylbenzene	BDL	0.0025	mg/kg	8021/8015	06/05/09	5
Total Xylene	BDL	0.0075	mg/kg	8021/8015	06/05/09	5
TPH (GC/FID) Low Fraction	BDL	0.50	mg/kg	GRO	06/05/09	5
Surrogate Recovery-%						
a,a,a-Trifluorotoluene(FID)	92.6		% Rec.	8021/8015	06/05/09	5
a,a,a-Trifluorotoluene(PID)	99.0		% Rec.	8021/8015	06/05/09	5
TPH (GC/FID) High Fraction	BDL	4.0	mg/kg	3546/DRO	06/04/09	1
Surrogate recovery(%)						
o-Terphenyl	156.		% Rec.	3546/DRO	06/04/09	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

Note:

The reported analytical results relate only to the sample submitted.

This report shall not be reproduced, except in full, without the written approval from ESC.

Reported: 06/08/09 16:40 Printed: 06/08/09 16:41

L405366-02 (PH) - 8.0@20.9c



ENVIRONMENTAL  
SCIENCE CORP.

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

REPORT OF ANALYSIS

Ken Kreie  
Cordilleran Compliance - GJ, CO  
826 21 1/2 Road  
Grand Junction, CO 81505

June 08, 2009

Date Received : June 02, 2009  
Description : Noble 1B Pit

Sample ID : 1BW15 15FT

Collected By : Ken Kreie  
Collection Date : 06/01/09 11:10

ESC Sample # : L405366-03

Site ID :

Project # :

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
pH	8.4		su	9045D	06/05/09	1
Sodium Adsorption Ratio	1.8			Calc.	06/06/09	156.1
Specific Conductance	930		umhos/cm	9050AMod	06/03/09	1
Benzene	BDL	0.0025	mg/kg	8021/8015	06/05/09	5
Toluene	BDL	0.025	mg/kg	8021/8015	06/05/09	5
Ethylbenzene	BDL	0.0025	mg/kg	8021/8015	06/05/09	5
Total Xylene	BDL	0.0075	mg/kg	8021/8015	06/05/09	5
TPH (GC/FID) Low Fraction	BDL	0.50	mg/kg	GRO	06/05/09	5
Surrogate Recovery-%						
a,a,a-Trifluorotoluene(FID)	92.2		% Rec.	8021/8015	06/05/09	5
a,a,a-Trifluorotoluene(PID)	98.9		% Rec.	8021/8015	06/05/09	5
TPH (GC/FID) High Fraction	BDL	4.0	mg/kg	3546/DRO	06/04/09	1
Surrogate recovery(%)						
o-Terphenyl	64.1		% Rec.	3546/DRO	06/04/09	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

Note:

The reported analytical results relate only to the sample submitted.

This report shall not be reproduced, except in full, without the written approval from ESC.

Reported: 06/08/09 16:40 Printed: 06/08/09 16:41  
L405366-03 (PH) - 8.4@20.8c



ENVIRONMENTAL  
SCIENCE CORP.

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

REPORT OF ANALYSIS

Ken Kreie  
Cordilleran Compliance - GJ, CO  
826 21 1/2 Road  
Grand Junction, CO 81505

June 08, 2009

Date Received : June 02, 2009  
Description : Noble 1B Pit

Sample ID : 1BW25 25FT

Collected By : Ken Kreie  
Collection Date : 06/01/09 11:35

ESC Sample # : L405366-04

Site ID :

Project # :

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
pH	7.8		su	9045D	06/05/09	1
Sodium Adsorption Ratio	1.9			Calc.	06/06/09	561.1
Specific Conductance	4200		umhos/cm	9050AMod	06/03/09	1
Benzene	BDL	0.0025	mg/kg	8021/8015	06/05/09	5
Toluene	BDL	0.025	mg/kg	8021/8015	06/05/09	5
Ethylbenzene	BDL	0.0025	mg/kg	8021/8015	06/05/09	5
Total Xylene	BDL	0.0075	mg/kg	8021/8015	06/05/09	5
TPH (GC/FID) Low Fraction	BDL	0.50	mg/kg	GRO	06/05/09	5
Surrogate Recovery-%						
a,a,a-Trifluorotoluene(FID)	92.9		% Rec.	8021/8015	06/05/09	5
a,a,a-Trifluorotoluene(PID)	101.		% Rec.	8021/8015	06/05/09	5
TPH (GC/FID) High Fraction	BDL	4.0	mg/kg	3546/DRO	06/04/09	1
Surrogate recovery(%)						
o-Terphenyl	84.0		% Rec.	3546/DRO	06/04/09	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

Note:

The reported analytical results relate only to the sample submitted.

This report shall not be reproduced, except in full, without the written approval from ESC.

.

Reported: 06/08/09 16:40 Printed: 06/08/09 16:41

L405366-04 (PH) - 7.8@20.6c



ENVIRONMENTAL  
SCIENCE CORP.

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

REPORT OF ANALYSIS

Ken Kreie  
Cordilleran Compliance - GJ, CO  
826 21 1/2 Road  
Grand Junction, CO 81505

June 08, 2009

Date Received : June 02, 2009  
Description : Noble 1B Pit

Sample ID : 1BSW15 15FT

Collected By : Ken Kreie  
Collection Date : 06/01/09 13:20

ESC Sample # : L405366-05

Site ID :

Project # :

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
pH	8.7		su	9045D	06/05/09	1
Sodium Adsorption Ratio	26.			Calc.	06/07/09	236.2
Specific Conductance	3700		umhos/cm	9050AMod	06/03/09	1
Benzene	BDL	0.0025	mg/kg	8021/8015	06/05/09	5
Toluene	BDL	0.025	mg/kg	8021/8015	06/05/09	5
Ethylbenzene	BDL	0.0025	mg/kg	8021/8015	06/05/09	5
Total Xylene	BDL	0.0075	mg/kg	8021/8015	06/05/09	5
TPH (GC/FID) Low Fraction	BDL	0.50	mg/kg	GRO	06/05/09	5
Surrogate Recovery-%						
a,a,a-Trifluorotoluene(FID)	93.2		% Rec.	8021/8015	06/05/09	5
a,a,a-Trifluorotoluene(PID)	100.		% Rec.	8021/8015	06/05/09	5
TPH (GC/FID) High Fraction	BDL	4.0	mg/kg	3546/DRO	06/04/09	1
Surrogate recovery(%)						
o-Terphenyl	78.7		% Rec.	3546/DRO	06/04/09	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

Note:

The reported analytical results relate only to the sample submitted.

This report shall not be reproduced, except in full, without the written approval from ESC.

Reported: 06/08/09 16:40 Printed: 06/08/09 16:41  
L405366-05 (PH) - 8.7@20.8c



ENVIRONMENTAL  
SCIENCE CORP.

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

REPORT OF ANALYSIS

Ken Kreie  
Cordilleran Compliance - GJ, CO  
826 21 1/2 Road  
Grand Junction, CO 81505

June 08, 2009

Date Received : June 02, 2009  
Description : Noble 1B Pit

Sample ID : 1BSW25 25FT

Collected By : Ken Kreie  
Collection Date : 06/01/09 14:00

ESC Sample # : L405366-06

Site ID :

Project # :

Parameter	Result	Det. Limit	Units	Method	Date	Dil.
pH	7.9		su	9045D	06/05/09	1
Sodium Adsorption Ratio	15.			Calc.	06/07/09	467.4
Specific Conductance	5300		umhos/cm	9050AMod	06/04/09	1
Benzene	BDL	0.0025	mg/kg	8021/8015	06/05/09	5
Toluene	BDL	0.025	mg/kg	8021/8015	06/05/09	5
Ethylbenzene	BDL	0.0025	mg/kg	8021/8015	06/05/09	5
Total Xylene	BDL	0.0075	mg/kg	8021/8015	06/05/09	5
TPH (GC/FID) Low Fraction	BDL	0.50	mg/kg	GRO	06/05/09	5
Surrogate Recovery-%						
a,a,a-Trifluorotoluene(FID)	93.5		% Rec.	8021/8015	06/05/09	5
a,a,a-Trifluorotoluene(PID)	101.		% Rec.	8021/8015	06/05/09	5
TPH (GC/FID) High Fraction	BDL	4.0	mg/kg	3546/DRO	06/04/09	1
Surrogate recovery(%)						
o-Terphenyl	85.3		% Rec.	3546/DRO	06/04/09	1

BDL - Below Detection Limit

Det. Limit - Practical Quantitation Limit(PQL)

Note:

The reported analytical results relate only to the sample submitted.

This report shall not be reproduced, except in full, without the written approval from ESC.

.

Reported: 06/08/09 16:40 Printed: 06/08/09 16:41

L405366-06 (PH) - 7.9@20.9c

Attachment A  
List of Analytes with QC Qualifiers

Sample Number	Work Group	Sample Type	Analyte	Run ID	Qualifier
L405366-02	WG424595	SAMP	o-Terphenyl	R770847	J1



Attachment B  
Explanation of QC Qualifier Codes

Qualifier	Meaning
J1	Surrogate recovery limits have been exceeded; values are outside upper control limits

Qualifier Report Information

ESC utilizes sample and result qualifiers as set forth by the EPA Contract Laboratory Program and as required by most certifying bodies including NELAC. In addition to the EPA qualifiers adopted by ESC, we have implemented ESC qualifiers to provide more information pertaining to our analytical results. Each qualifier is designated in the qualifier explanation as either EPA or ESC. Data qualifiers are intended to provide the ESC client with more detailed information concerning the potential bias of reported data. Because of the wide range of constituents and variety of matrices incorporated by most EPA methods, it is common for some compounds to fall outside of established ranges. These exceptions are evaluated and all reported data is valid and useable unless qualified as 'R' (Rejected).

Definitions

- Accuracy - The relationship of the observed value of a known sample to the true value of a known sample. Represented by percent recovery and relevant to samples such as: control samples, matrix spike recoveries, surrogate recoveries, etc.
- Precision - The agreement between a set of samples or between duplicate samples. Relates to how close together the results are and is represented by Relative Percent Difference.
- Surrogate - Organic compounds that are similar in chemical composition, extraction, and chromatography to analytes of interest. The surrogates are used to determine the probable response of the group of analytes that are chemically related to the surrogate compound. Surrogates are added to the sample and carried through all stages of preparation and analyses.
- TIC - Tentatively Identified Compound: Compounds detected in samples that are not target compounds, internal standards, system monitoring compounds, or surrogates.

Summary of Remarks For Samples Printed  
06/08/09 at 16:41:22

TSR Signing Reports: 151  
R5 - Desired TAT

cb-1/05;Run ALKs on separate dash, 1 day TAT, R3 priority; Client sends unpreserved vials for all projects; Run BTEXM by 8260 on separate dash.

Sample: L405366-01 Account: CORCOMGCO Received: 06/02/09 09:00 Due Date: 06/09/09 00:00 RPT Date: 06/08/09 16:40

Sample: L405366-02 Account: CORCOMGCO Received: 06/02/09 09:00 Due Date: 06/09/09 00:00 RPT Date: 06/08/09 16:40

Sample: L405366-03 Account: CORCOMGCO Received: 06/02/09 09:00 Due Date: 06/09/09 00:00 RPT Date: 06/08/09 16:40

Sample: L405366-04 Account: CORCOMGCO Received: 06/02/09 09:00 Due Date: 06/09/09 00:00 RPT Date: 06/08/09 16:40

Sample: L405366-05 Account: CORCOMGCO Received: 06/02/09 09:00 Due Date: 06/09/09 00:00 RPT Date: 06/08/09 16:40

Sample: L405366-06 Account: CORCOMGCO Received: 06/02/09 09:00 Due Date: 06/09/09 00:00 RPT Date: 06/08/09 16:40



# ENVIRONMENTAL SCIENCE CORP.

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

Cordilleran Compliance - GJ, CO  
Ken Kreie  
826 21 1/2 Road

## Quality Assurance Report Level II

Grand Junction, CO 81505

L405366

June 08, 2009

Analyte	Result	Laboratory Blank		Limit	Batch	Date Analyzed
		Units	% Rec			
Specific Conductance	1.10	umhos/cm			WG424605	06/03/09 16:29
TPH (GC/FID) High Fraction	< 4	ppm			WG424595	06/03/09 23:06
o-Terphenyl		% Rec.	90.45	50-150	WG424595	06/03/09 23:06
TPH (GC/FID) High Fraction	< 4	ppm			WG424641	06/04/09 01:48
o-Terphenyl		% Rec.	104.2	50-150	WG424641	06/04/09 01:48
Specific Conductance	2.10	umhos/cm			WG424835	06/04/09 16:01
Benzene	< .0005	mg/kg			WG425028	06/05/09 05:07
Ethylbenzene	< .0005	mg/kg			WG425028	06/05/09 05:07
Toluene	< .005	mg/kg			WG425028	06/05/09 05:07
TPH (GC/FID) Low Fraction	< .1	mg/kg			WG425028	06/05/09 05:07
a,a,a-Trifluorotoluene(FID)		% Rec.	93.80	59-128	WG425028	06/05/09 05:07
a,a,a-Trifluorotoluene(PID)		% Rec.	101.4	54-144	WG425028	06/05/09 05:07
pH	4.80	su			WG424878	06/05/09 11:30

Analyte	Units	Duplicate		RPD	Limit	Ref Samp	Batch
		Result	Duplicate				
Specific Conductance	umhos/cm	583.	580.	0.516	20	L404784-01	WG424605
Specific Conductance	umhos/cm	501.	510.	1.78	20	L405373-04	WG424605
Specific Conductance	umhos/cm	4930	5300	7.23	20	L405366-06	WG424835
Specific Conductance	umhos/cm	23.4	24.0	2.53	20	L405573-02	WG424835
pH	su	12.3	12.0	2.47	20	L404865-01	WG424878
pH	su	8.00	8.10	1.24	20	L405373-01	WG424878

Analyte	Units	Laboratory Control Sample		% Rec	Limit	Batch
		Known Val	Result			
Specific Conductance	umhos/cm	589	540.	91.7	85-115	WG424605
TPH (GC/FID) High Fraction	ppm	60	56.7	94.4	50-150	WG424595
o-Terphenyl				101.5	50-150	WG424595
TPH (GC/FID) High Fraction	ppm	60	57.5	95.8	50-150	WG424641
o-Terphenyl				108.0	50-150	WG424641
Specific Conductance	umhos/cm	589	540.	91.7	85-115	WG424835
Benzene	mg/kg	.05	0.0466	93.3	76-113	WG425028
Ethylbenzene	mg/kg	.05	0.0439	87.7	78-115	WG425028
Toluene	mg/kg	.05	0.0448	89.6	76-114	WG425028
a,a,a-Trifluorotoluene(PID)				101.9	54-144	WG425028

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

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



# ENVIRONMENTAL SCIENCE CORP.

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

Cordilleran Compliance - GJ, CO  
Ken Kreie  
826 21 1/2 Road

## Quality Assurance Report Level II

Grand Junction, CO 81505

L405366

June 08, 2009

Analyte	Units	Laboratory Control	Sample	% Rec	Limit	Batch
		Known Val	Result			
TPH (GC/FID) Low Fraction	mg/kg	5.5	4.49	81.6	67-135	WG425028
a,a,a-Trifluorotoluene(FID)				111.7	59-128	WG425028
pH	su	9.04	8.90	98.5	97.4-102.6	WG424878

Analyte	Units	Laboratory Control		Sample Duplicate	Limit	RPD	Limit	Batch
		Result	Ref	%Rec				
Specific Conductance	umhos/	540.	540.	92.0	85-115	0.00	20	WG424605
TPH (GC/FID) High Fraction o-Terphenyl	ppm	53.9	56.7	90.0	50-150	5.05	25	WG424595
				106.0	50-150			WG424595
TPH (GC/FID) High Fraction o-Terphenyl	ppm	53.1	57.5	89.0	50-150	7.84	25	WG424641
				98.93	50-150			WG424641
Specific Conductance	umhos/	540.	540.	92.0	85-115	0.00	20	WG424835
Benzene	mg/kg	0.0455	0.0466	91.0	76-113	2.49	20	WG425028
Ethylbenzene	mg/kg	0.0424	0.0439	85.0	78-115	3.32	20	WG425028
Toluene	mg/kg	0.0442	0.0448	88.0	76-114	1.42	20	WG425028
a,a,a-Trifluorotoluene(PID)	mg/kg	4.48	4.49	99.49	54-144	0.222	20	WG425028
TPH (GC/FID) Low Fraction				81.0	67-135			WG425028
a,a,a-Trifluorotoluene(FID)				111.2	59-128			WG425028
pH	su	8.90	8.90	98.0	97.4-102.6	0.00	20	WG424878

Analyte	Units	Matrix Spike			% Rec	Limit	Ref Samp	Batch
		MS Res	Ref Res	TV				
TPH (GC/FID) High Fraction	ppm	53.6	0.00	60	89.3	50-150	L405096-04	WG424595
o-Terphenyl					102.0	50-150		WG424595
TPH (GC/FID) High Fraction	ppm	45.1	0.00	60	75.1	50-150	L405366-06	WG424641
o-Terphenyl					85.00	50-150		WG424641
Benzene	mg/kg	0.218	0.00	.05	87.3	32-137	L405373-08	WG425028
Ethylbenzene	mg/kg	0.187	0.00	.05	74.7	10-150	L405373-08	WG425028
Toluene	mg/kg	0.206	0.00	.05	82.4	20-142	L405373-08	WG425028
a,a,a-Trifluorotoluene(PID)					101.7	54-144		WG425028
TPH (GC/FID) Low Fraction	mg/kg	20.2	0.00	5.5	73.5	55-109	L405373-08	WG425028
a,a,a-Trifluorotoluene(FID)					101.4	59-128		WG425028

Analyte	Units	Matrix Spike Duplicate			Limit	RPD	Limit	Ref Samp	Batch
		MSD	Ref	%Rec					
TPH (GC/FID) High Fraction	ppm	47.8	53.6	79.7	50-150	11.3	25	L405096-04	WG424595
o-Terphenyl				93.50	50-150				WG424595
TPH (GC/FID) High Fraction	ppm	50.6	45.1	84.4	50-150	11.6	25	L405366-06	WG424641

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

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



ENVIRONMENTAL  
SCIENCE CORP.

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

Cordilleran Compliance - GJ, CO  
Ken Kreie  
826 21 1/2 Road

Quality Assurance Report  
Level II

Grand Junction, CO 81505

L405366

June 08, 2009

Analyte	Units	MSD	Matrix Spike Duplicate		Limit	RPD	Limit	Ref	Samp	Batch
			Ref	%Rec						
o-Terphenyl				91.97	50-150					
Benzene	mg/kg	0.220	0.218	88.0	32-137	0.740	39	L405373-08		WG425028
Ethylbenzene	mg/kg	0.187	0.187	74.8	10-150	0.263	44	L405373-08		WG425028
Toluene	mg/kg	0.207	0.206	82.8	20-142	0.540	42	L405373-08		WG425028
a,a,a-Trifluorotoluene(PID)				99.79	54-144					WG425028
TPH (GC/FID) Low Fraction	mg/kg	19.2	20.2	69.8	55-109	5.24	20	L405373-08		WG425028
a,a,a-Trifluorotoluene(FID)				101.5	59-128					WG425028

Batch number /Run number / Sample number cross reference

WG424605: R770326: L405366-01 02 03 04 05  
WG424595: R770847: L405366-01 02 03 04 05  
WG424641: R771446: L405366-06  
WG424835: R772607: L405366-06  
WG425028: R774146: L405366-01 02 03 04 05 06  
WG424878: R774166: L405366-01 02 03 04 05 06  
WG425175: R776206: L405366-05 06  
WG424616: R776226: L405366-01 02 03 04

\* \* Calculations are performed prior to rounding of reported values .  
\* Performance of this Analyte is outside of established criteria.  
For additional information, please see Attachment A 'List of Analytes with QC Qualifiers.'



## ENVIRONMENTAL SCIENCE CORP.

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

Cordilleran Compliance - GJ, CO  
Ken Kreie  
826 21 1/2 Road

### Quality Assurance Report Level II

Grand Junction, CO 81505

L405366

June 08, 2009

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.