

AP - 67

**ANNUAL  
MONITORING REPORT**

**YEAR(S):**

2006

CERTIFIED MAIL  
RETURN RECEIPT NO. 7099 3400 0017 1737 2268



February 7, 2007

RECEIVED

Mr. Edward Hansen  
New Mexico Energy, Minerals, & Natural Resources  
Oil Conservation Division, Environmental Bureau  
1220 S. St. Francis Drive  
Santa Fe, New Mexico 87504

FEB - 9 2007  
Environmental Bureau  
Oil Conservation Division

RE: **2006 ANNUAL GROUNDWATER MONITORING REPORT  
EME D-1 JUNCTION BOX SITE  
T20S, R36E, SECTION 1, UNIT LETTER D  
Stage 1 Abatement Plan No.: AP-67**

Mr. Hansen:

Trident Environmental takes this opportunity to submit the 2006 Annual Monitoring Well Report for the EME D-1 junction box site located in the Eunice-Monument-Eumont (EME) Salt Water Disposal (SWD) System.

Identification of soil and ground water impacts at this site occurred during line replacement being performed as part of the approved Junction Box Upgrade Program in October 2004. Groundwater monitoring activities have been conducted quarterly since December 21, 2004. The Stage 1 Abatement Plan (AP-67) for this site was verbally approved by the NMOCD on March 30, 2006. One downgradient (MW-2) and upgradient (MW-3) monitoring well were installed at the site in April, however, based on subsequent findings from these wells (analytical results and groundwater flow), we installed an additional downgradient well (MW-4) on December 14, 2006. A Stage 1 Final Investigation Report will be forthcoming to incorporate the findings described above.

ROC is the service provider (agent) for the EME Salt Water Disposal System and has no ownership of any portion of pipeline, well, or facility. The EME SWD System is owned by a consortium of oil producers, System Partners, who provide all operating capital on a percentage ownership/usage basis.

Thank you for your consideration concerning this annual summary of groundwater monitoring information. If you have any questions, do not hesitate to contact me at (432) 638-8740 or Kristin Farris Pope at (505) 393-9174.

Sincerely,

A handwritten signature in black ink, appearing to read "Gilbert J. Van Deventer".

Gilbert J. Van Deventer, PG, REM

cc: CDH, KFP, file

enclosures: maps, table, graphs, and laboratory analytical reports.

# ATTACHMENT A

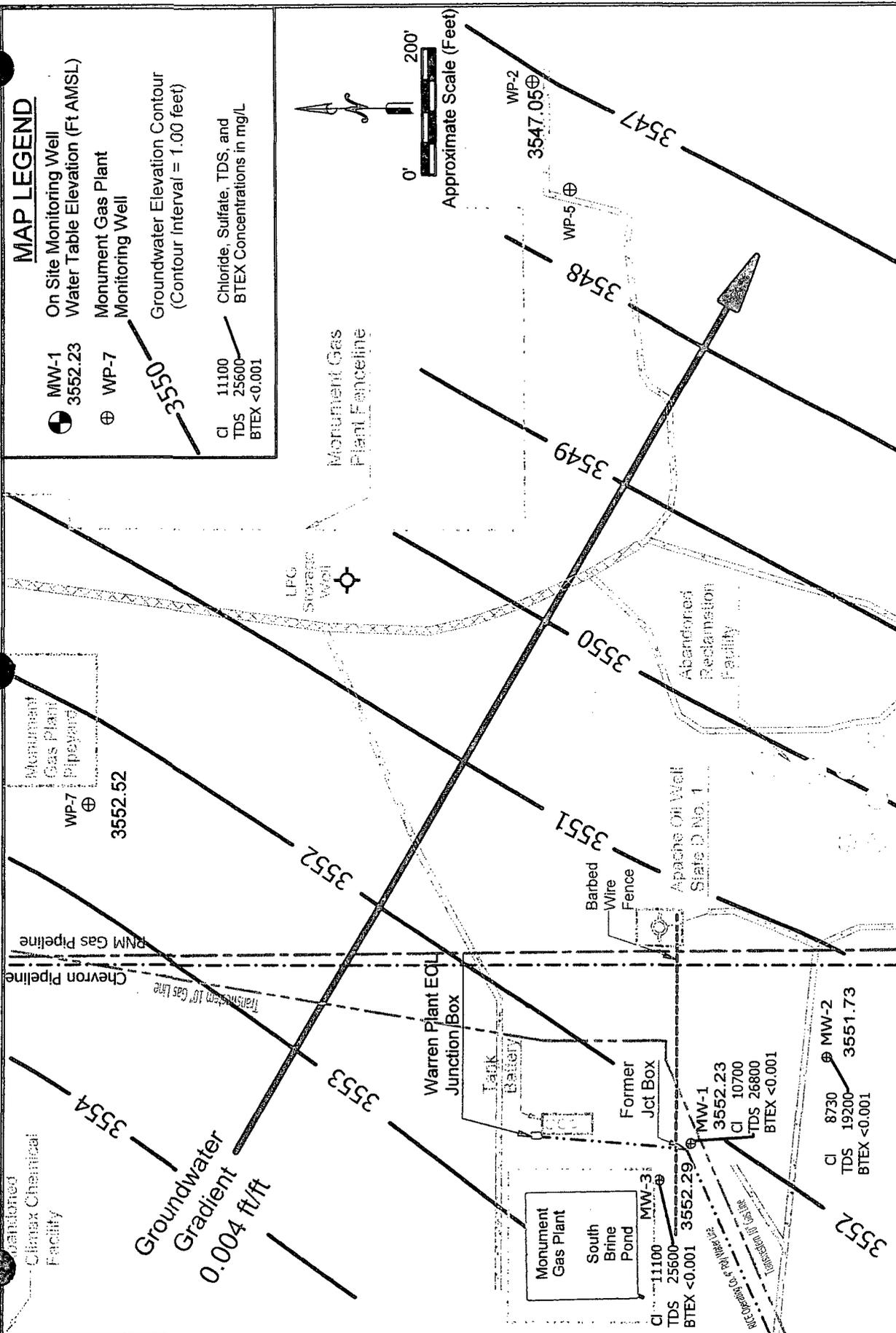
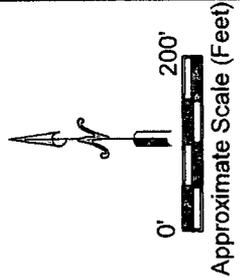
Site Maps

Table

Graphs

**MAP LEGEND**

- MW-1 3552.23 On Site Monitoring Well
- Water Table Elevation (Ft AMSL)
- WP-7 Monitoring Gas Plant
- Monitoring Well
- Groundwater Elevation Contour (Contour Interval = 1.00 feet)
- Chloride, Sulfate, TDS, and BTEX Concentrations in mg/L
- CI 11100
- TDS 25600
- BTEX <0.001



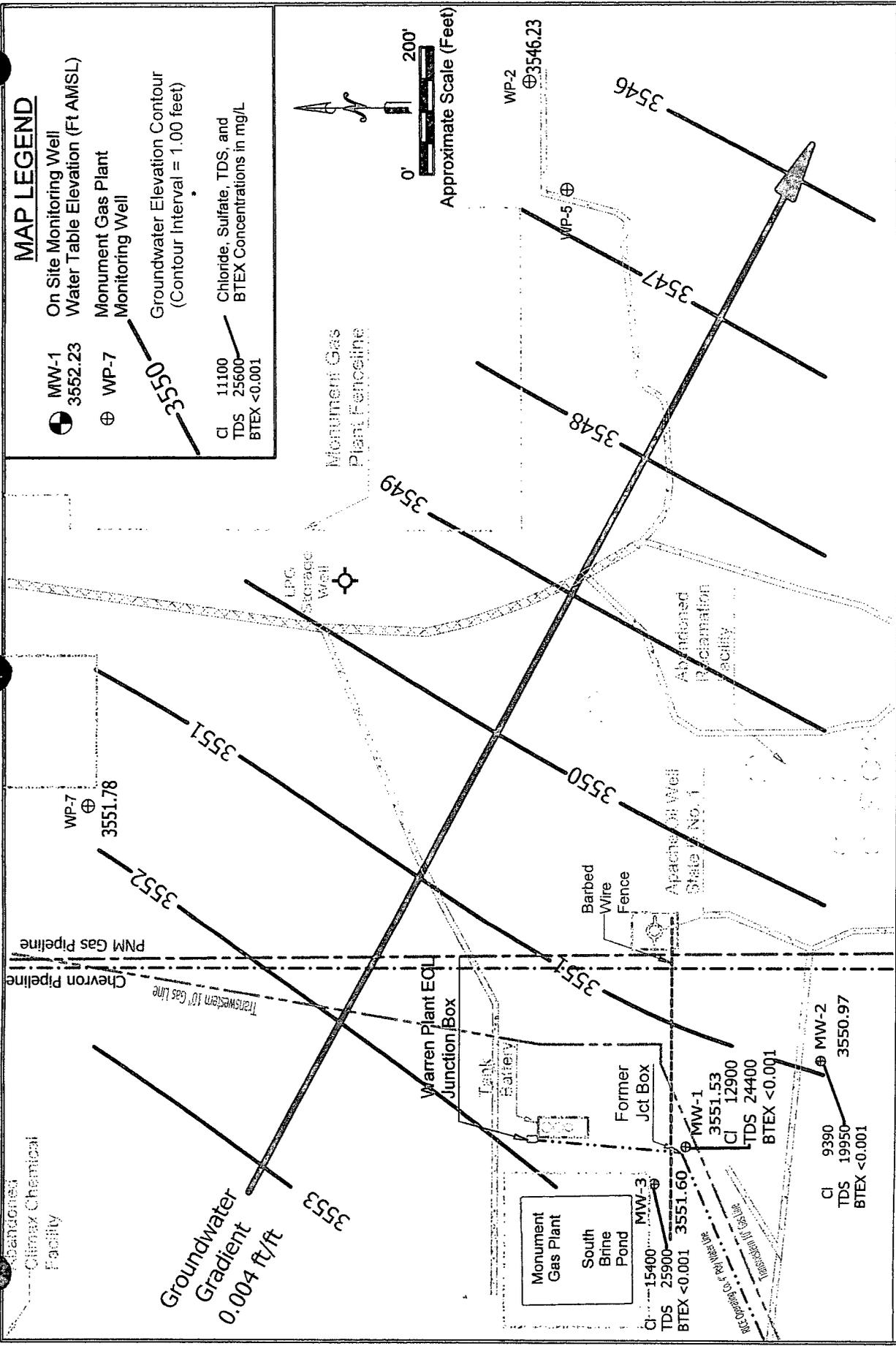
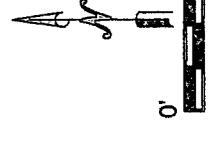
**GROUNDWATER ELEVATION AND CHLORIDE, TDS, & BTEX CONCENTRATION MAP**  
 APRIL 19, 2006

**EME D-1 JUNCTION BOX SITE**  
 T20S - R36E - Section 1 - Unit D  
 RICE Operating Company



**MAP LEGEND**

- MW-1  
3652.23
- WP-7  
3551.78
- Groundwater  
Elevation Contour  
(Contour Interval = 1.00 feet)
- Chloride, Sulfate, TDS, and  
BTEX Concentrations in mg/L
- CI 11100
- TDS 25600
- BTEX <0.001



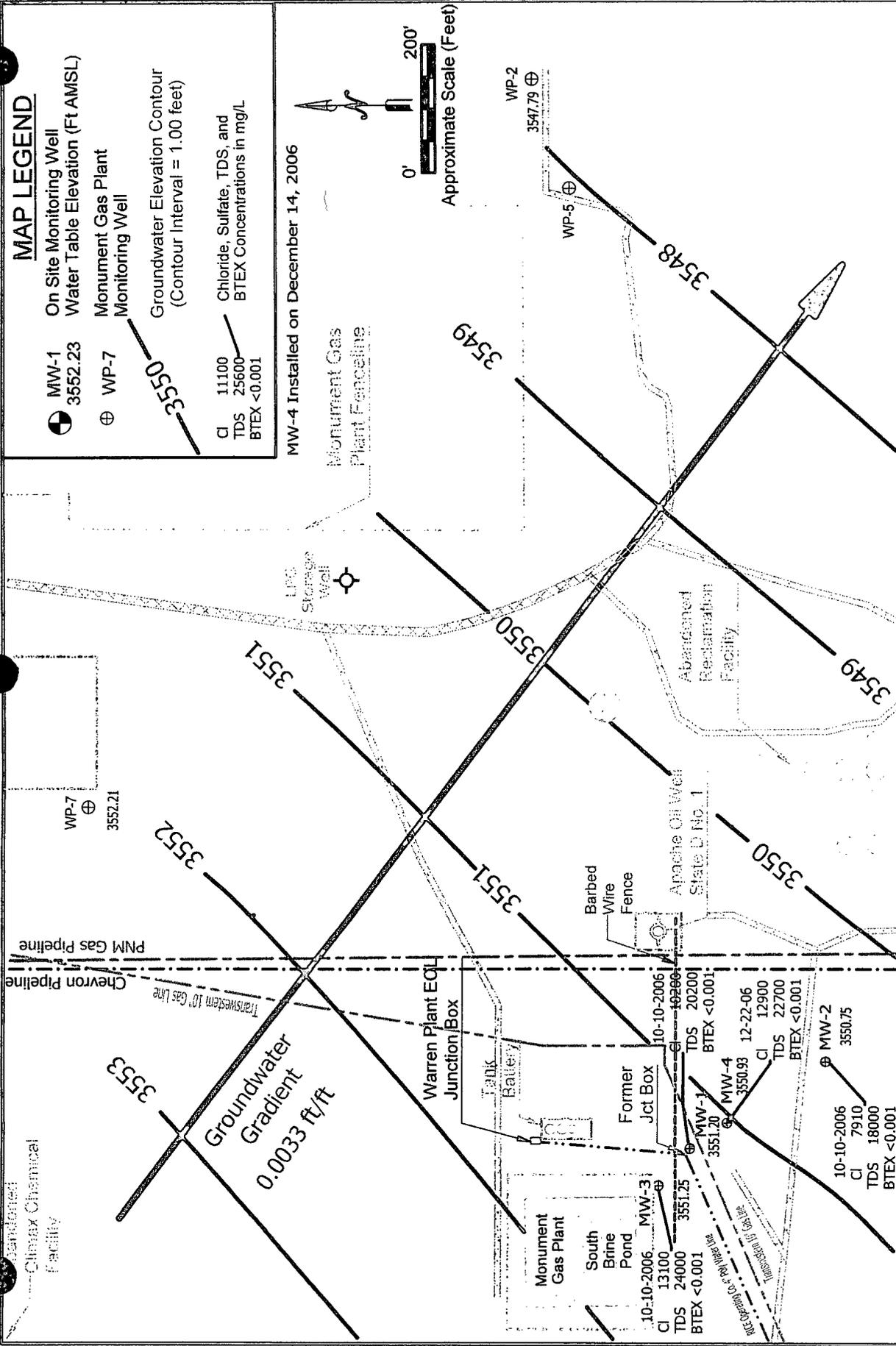
Groundwater  
Gradient  
0.004 ft/ft



EME D-1 JUNCTION BOX SITE  
T20S - R36E - Section 1 - Unit D

RICE Operating Company

GROUNDWATER ELEVATION AND  
CHLORIDE, TDS, & BTEX  
CONCENTRATION MAP  
JULY 18, 2006



**EME D-1 JUNCTION BOX SITE**  
**T20S - R36E - Section 1- Unit D**  
**RICE Operating Company**

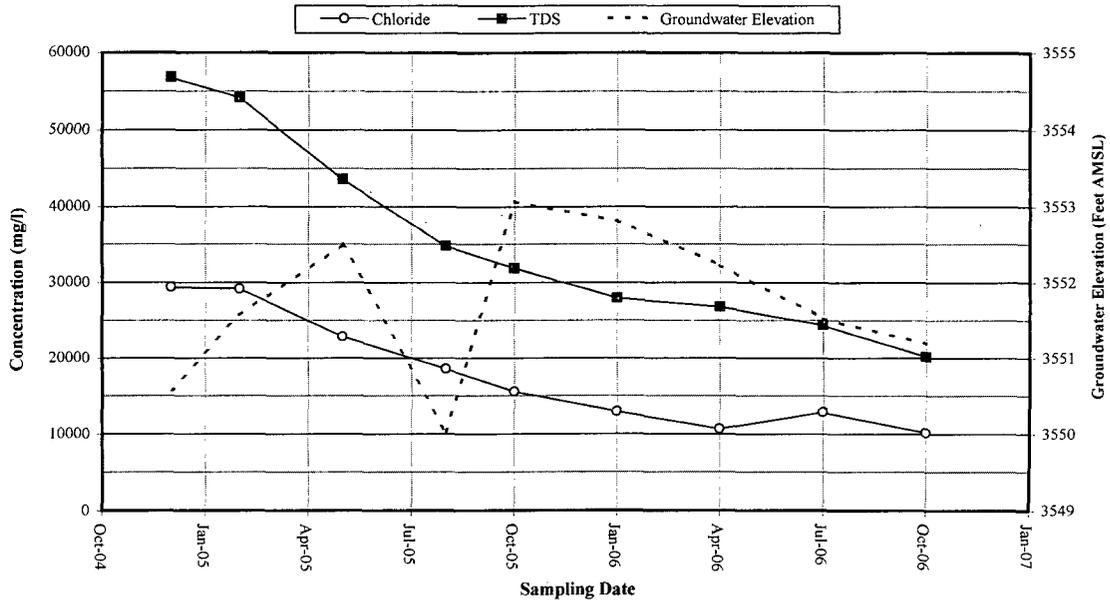
**GROUNDWATER ELEVATION AND CHLORIDE, TDS, & BTEX CONCENTRATION MAP**  
**OCTOBER 10, 2006 & DECEMBER 22, 2006**

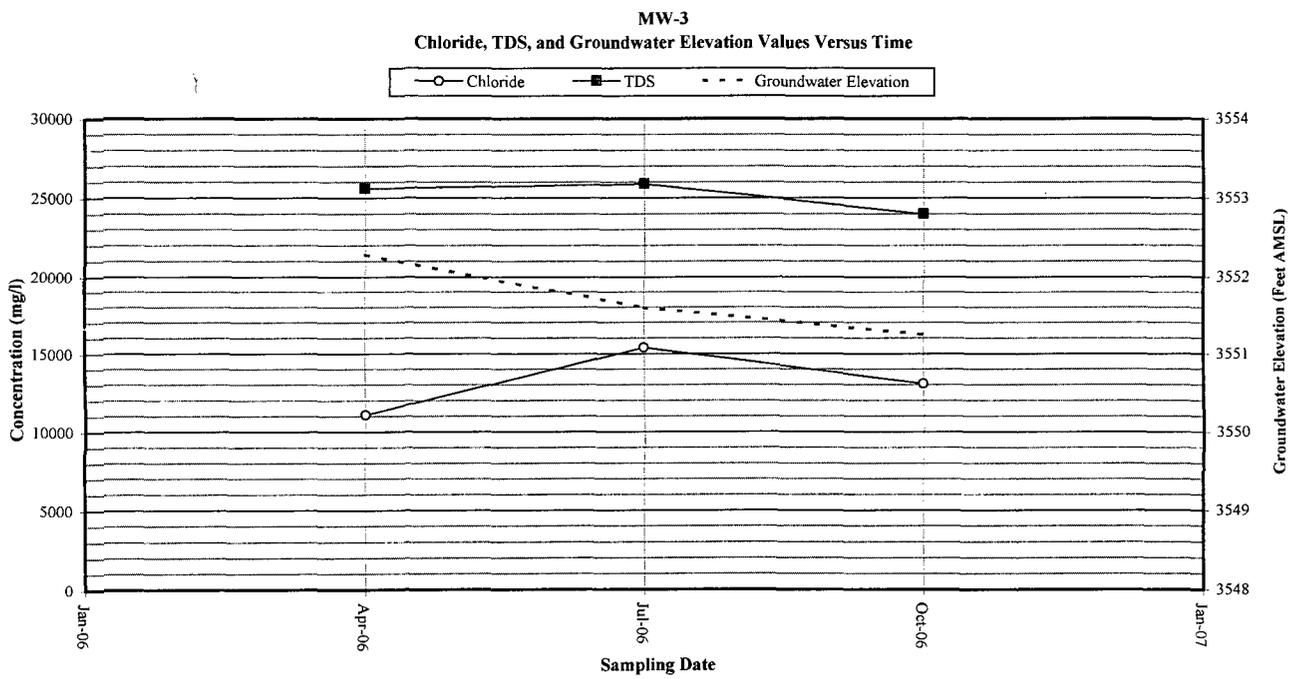
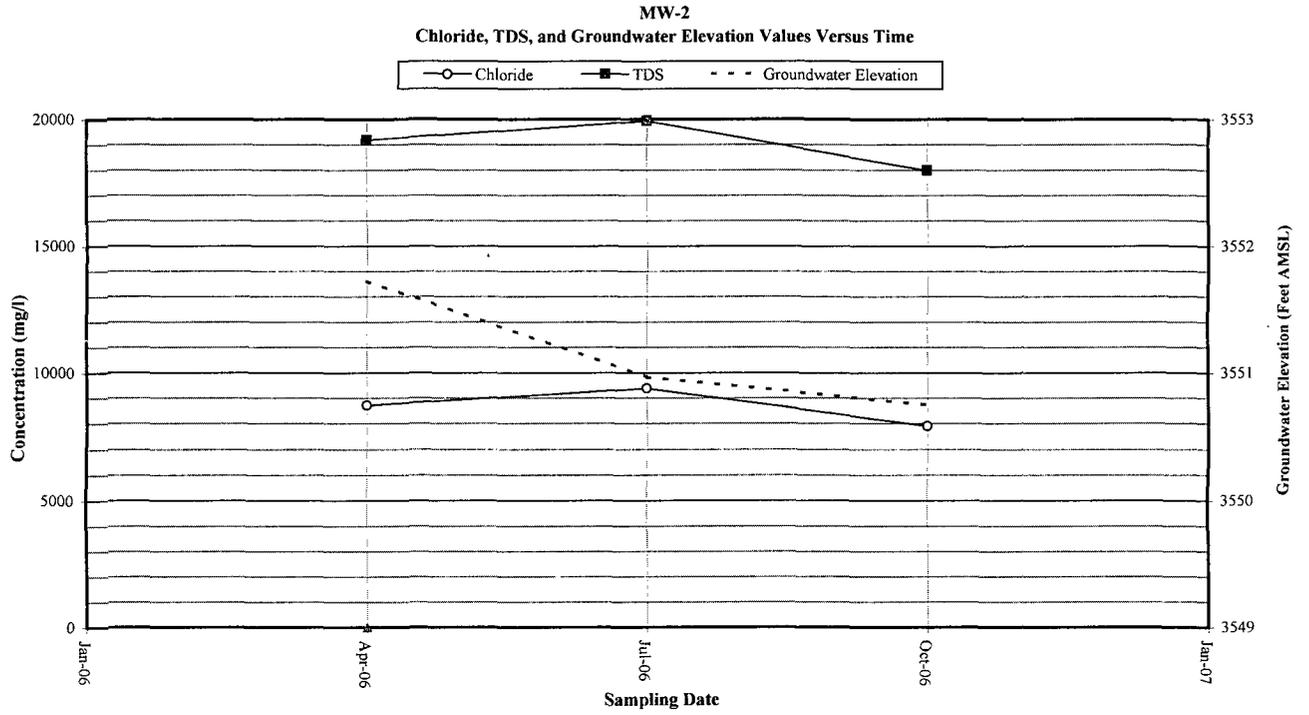
**Table 1**  
**Summary of Groundwater Sampling Results**

Monitoring Well	Sample Date	Depth to Groundwater (feet BTOC)	Groundwater Elevation (feet AMSL)	Chloride (mg/L)	TDS (mg/L)	Benzene (mg/L)	Toluene (mg/L)	Ethylbenzene (mg/L)	Xylene (mg/L)
MW-1	12/21/04	37.20	3550.57	<b>29,400</b>	<b>56,800</b>	< 0.001	< 0.001	< 0.001	< 0.001
	02/09/05	36.20	3551.57	<b>29,200</b>	<b>54,200</b>	< 0.001	< 0.001	< 0.001	< 0.001
	05/03/05	35.27	3552.50	<b>22,900</b>	<b>43,600</b>	< 0.001	< 0.001	< 0.001	< 0.001
	08/13/05	37.74	3550.03	<b>18,600</b>	<b>34,800</b>	< 0.001	< 0.001	< 0.001	< 0.001
	10/19/05	34.70	3553.07	<b>15,600</b>	<b>31,900</b>	< 0.001	< 0.001	< 0.001	< 0.001
	01/18/06	34.95	3552.82	<b>13,000</b>	<b>28,000</b>	< 0.001	< 0.001	< 0.001	< 0.001
	04/19/06	35.54	3552.23	<b>10,700</b>	<b>26,800</b>	< 0.001	< 0.001	< 0.001	< 0.001
	07/18/06	36.24	3551.53	<b>12,900</b>	<b>24,400</b>	< 0.001	< 0.001	< 0.001	< 0.001
	10/10/06	36.57	3551.20	<b>10,200</b>	<b>20,200</b>	< 0.001	< 0.001	< 0.001	< 0.001
MW-2	04/19/06	33.89	3551.73	<b>8,730</b>	<b>19,200</b>	< 0.001	< 0.001	< 0.001	< 0.001
	07/18/06	34.65	3550.97	<b>9,390</b>	<b>19,950</b>	< 0.001	< 0.001	< 0.001	< 0.001
	10/10/06	34.87	3550.75	<b>7,910</b>	<b>18,000</b>	< 0.001	< 0.001	< 0.001	< 0.001
MW-3	04/19/06	37.55	3552.29	<b>11,100</b>	<b>25,600</b>	< 0.001	< 0.001	< 0.001	< 0.001
	07/18/06	38.24	3551.60	<b>15,400</b>	<b>25,900</b>	< 0.001	< 0.001	< 0.001	< 0.001
	10/10/06	38.59	3551.25	<b>13,100</b>	<b>24,000</b>	< 0.001	< 0.001	< 0.001	< 0.001
MW-4	12/22/06	35.97	3550.93	<b>12,900</b>	<b>22,700</b>	< 0.001	< 0.001	< 0.001	< 0.001
WQCC Standards				250	1000	0.01	0.75	0.75	0.62

Total Dissolved Solids (TDS), chloride, and BTEX concentrations listed in milligrams per liter (mg/L)  
 Analyses performed by Cardinal Labs, Hobbs, NM (1995-1998) and Environmental Lab of Texas, Odessa, TX (1999-2003).  
 Values in boldface type indicate concentrations exceed New Mexico Water Quality Commission (WQCC) standards.  
 AMSL - Above Mean Sea Level; BTOC - Below Top of Casing  
 Elevations and state plane coordinates surveyed by Basin Surveys, Hobbs, NM.

**MW-1**  
**Chloride, TDS, and Groundwater Elevation Values Versus Time**





ATTACHMENT B

Laboratory Analytical Reports

And

Chain of Custody Documentation



12600 West I-20 East - Odessa, Texas 79765

## Analytical Report

**Prepared for:**

Kristin Farris-Pope

Rice Operating Co.

122 W. Taylor

Hobbs, NM 88240

Project: EME Jct. D-1 Leak

Project Number: None Given

Location: Lea County

Lab Order Number: 6A19007

Report Date: 02/02/06

Rice Operating Co.  
122 W. Taylor  
Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

**Reported:**  
02/02/06 08:29

**ANALYTICAL REPORT FOR SAMPLES**

Sample ID	Laboratory ID	Matrix	Date Sampled	Date Received
Monitor Well #1	6A19007-01	Water	01/18/06 09:10	01/19/06 11:10

Rice Operating Co.  
122 W. Taylor  
Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

Reported:  
02/02/06 08:29

**Organics by GC**  
**Environmental Lab of Texas**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
<b>Monitor Well #1 (6A19007-01) Water</b>									
Benzene	ND	0.00100	mg/L	1	EA62304	01/23/06	01/24/06	EPA 8021B	
Toluene	ND	0.00100	"	"	"	"	"	"	
Ethylbenzene	ND	0.00100	"	"	"	"	"	"	
Xylene (p/m)	ND	0.00100	"	"	"	"	"	"	
Xylene (o)	ND	0.00100	"	"	"	"	"	"	
<i>Surrogate: a,a,a-Trifluorotoluene</i>		87.0 %	80-120		"	"	"	"	
<i>Surrogate: 4-Bromofluorobenzene</i>		82.2 %	80-120		"	"	"	"	

Rice Operating Co.  
122 W. Taylor  
Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

Reported:  
02/02/06 08:29

**General Chemistry Parameters by EPA / Standard Methods**  
**Environmental Lab of Texas**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
<b>Monitor Well #1 (6A19007-01) Water</b>									
<b>Total Alkalinity</b>	<b>406</b>	2.00	mg/L	1	EA62406	01/26/06	01/26/06	EPA 310.1M	
<b>Chloride</b>	<b>13000</b>	250	"	500	EA62018	01/20/06	01/20/06	EPA 300.0	
<b>Total Dissolved Solids</b>	<b>28000</b>	5.00	"	1	EA62307	01/19/06	01/20/06	EPA 160.1	
<b>Sulfate</b>	<b>3580</b>	250	"	500	EA62018	01/20/06	01/20/06	EPA 300.0	

Rice Operating Co.  
122 W. Taylor  
Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

Reported:  
02/02/06 08:29

**Total Metals by EPA / Standard Methods**  
**Environmental Lab of Texas**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
<b>Monitor Well #1 (6A19007-01) Water</b>									
Calcium	965	5.00	mg/L	500	EA62615	01/26/06	01/26/06	EPA 6010B	
Magnesium	283	0.0500	"	50	"	"	"	"	
Potassium	251	2.50	"	"	"	"	"	"	
Sodium	10300	50.0	"	5000	"	"	"	"	

Rice Operating Co.  
122 W. Taylor  
Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

Reported:  
02/02/06 08:29

**Organics by GC - Quality Control**  
**Environmental Lab of Texas**

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

**Batch EA62304 - EPA 5030C (GC)**

**Blank (EA62304-BLK1)**

Prepared & Analyzed: 01/23/06

Benzene	ND	0.00100	mg/L							
Toluene	ND	0.00100	"							
Ethylbenzene	ND	0.00100	"							
Xylene (p/m)	ND	0.00100	"							
Xylene (o)	ND	0.00100	"							
Surrogate: a,a,a-Trifluorotoluene	37.5		ug/l	40.0		93.8	80-120			
Surrogate: 4-Bromofluorobenzene	32.6		"	40.0		81.5	80-120			

**LCS (EA62304-BS1)**

Prepared & Analyzed: 01/23/06

Benzene	0.0461	0.00100	mg/L	0.0500		92.2	80-120			
Toluene	0.0462	0.00100	"	0.0500		92.4	80-120			
Ethylbenzene	0.0427	0.00100	"	0.0500		85.4	80-120			
Xylene (p/m)	0.0846	0.00100	"	0.100		84.6	80-120			
Xylene (o)	0.0451	0.00100	"	0.0500		90.2	80-120			
Surrogate: a,a,a-Trifluorotoluene	38.5		ug/l	40.0		96.2	80-120			
Surrogate: 4-Bromofluorobenzene	37.9		"	40.0		94.8	80-120			

**Calibration Check (EA62304-CCV1)**

Prepared & Analyzed: 01/23/06

Benzene	44.4		ug/l	50.0		88.8	80-120			
Toluene	45.2		"	50.0		90.4	80-120			
Ethylbenzene	42.5		"	50.0		85.0	80-120			
Xylene (p/m)	83.1		"	100		83.1	80-120			
Xylene (o)	44.5		"	50.0		89.0	80-120			
Surrogate: a,a,a-Trifluorotoluene	35.8		"	40.0		89.5	80-120			
Surrogate: 4-Bromofluorobenzene	35.5		"	40.0		88.8	80-120			

**Matrix Spike (EA62304-MS1)**

Source: 6A20019-01

Prepared & Analyzed: 01/23/06

Benzene	0.0455	0.00100	mg/L	0.0500	ND	91.0	80-120			
Toluene	0.0452	0.00100	"	0.0500	ND	90.4	80-120			
Ethylbenzene	0.0417	0.00100	"	0.0500	ND	83.4	80-120			
Xylene (p/m)	0.0829	0.00100	"	0.100	ND	82.9	80-120			
Xylene (o)	0.0445	0.00100	"	0.0500	ND	89.0	80-120			
Surrogate: a,a,a-Trifluorotoluene	38.2		ug/l	40.0		95.5	80-120			
Surrogate: 4-Bromofluorobenzene	36.2		"	40.0		90.5	80-120			

Rice Operating Co.  
122 W. Taylor  
Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

Reported:  
02/02/06 08:29

**Organics by GC - Quality Control**  
**Environmental Lab of Texas**

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

**Batch EA62304 - EPA 5030C (GC)**

**Matrix Spike Dup (EA62304-MSD1)**

Source: 6A20019-01

Prepared & Analyzed: 01/23/06

Benzene	0.0427	0.00100	mg/L	0.0500	ND	85.4	80-120	6.35	20	
Toluene	0.0428	0.00100	"	0.0500	ND	85.6	80-120	5.45	20	
Ethylbenzene	0.0404	0.00100	"	0.0500	ND	80.8	80-120	3.17	20	
Xylene (p/m)	0.0802	0.00100	"	0.100	ND	80.2	80-120	3.31	20	
Xylene (o)	0.0427	0.00100	"	0.0500	ND	85.4	80-120	4.13	20	
Surrogate: <i>a,a,a</i> -Trifluorotoluene	37.2		ug/l	40.0		93.0	80-120			
Surrogate: <i>4</i> -Bromofluorobenzene	35.4		"	40.0		88.5	80-120			

Rice Operating Co.  
122 W. Taylor  
Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

Reported:  
02/02/06 08:29

**General Chemistry Parameters by EPA / Standard Methods - Quality Control**  
**Environmental Lab of Texas**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
<b>Batch EA62018 - General Preparation (WetChem)</b>										
<b>Blank (EA62018-BLK1)</b>				Prepared & Analyzed: 01/20/06						
Sulfate	ND	0.500	mg/L							
Chloride	ND	0.500	"							
<b>LCS (EA62018-BS1)</b>				Prepared & Analyzed: 01/20/06						
Chloride	8.74		mg/L	10.0		87.4	80-120			
Sulfate	9.62		"	10.0		96.2	80-120			
<b>Calibration Check (EA62018-CCV1)</b>				Prepared & Analyzed: 01/20/06						
Sulfate	9.77		mg/L	10.0		97.7	80-120			
Chloride	8.88		"	10.0		88.8	80-120			
<b>Duplicate (EA62018-DUP1)</b>		<b>Source: 6A19008-01</b>		Prepared & Analyzed: 01/20/06						
Sulfate	110	5.00	mg/L		111			0.905	20	
Chloride	61.5	5.00	"		62.2			1.13	20	
<b>Batch EA62307 - General Preparation (WetChem)</b>										
<b>Blank (EA62307-BLK1)</b>				Prepared: 01/19/06 Analyzed: 01/20/06						
Total Dissolved Solids	ND	5.00	mg/L							
<b>Duplicate (EA62307-DUP1)</b>		<b>Source: 6A19005-01</b>		Prepared: 01/19/06 Analyzed: 01/20/06						
Total Dissolved Solids	2400	5.00	mg/L		2480			3.28	5	
<b>Batch EA62406 - General Preparation (WetChem)</b>										
<b>Blank (EA62406-BLK1)</b>				Prepared & Analyzed: 01/26/06						
Total Alkalinity	ND	2.00	mg/L							

Rice Operating Co.  
122 W. Taylor  
Jobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

Reported:  
02/02/06 08:29

**General Chemistry Parameters by EPA / Standard Methods - Quality Control**  
**Environmental Lab of Texas**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
<b>Batch EA62406 - General Preparation (WetChem)</b>										
<b>LCS (EA62406-BS1)</b>										
					Prepared & Analyzed: 01/26/06					
Bicarbonate Alkalinity	220		mg/L	200		110	85-115			
<b>Duplicate (EA62406-DUP1)</b>										
					Source: 6A19005-01					
					Prepared & Analyzed: 01/26/06					
Total Alkalinity	258	2.00	mg/L		256			0.778	20	
<b>Reference (EA62406-SRM1)</b>										
					Prepared & Analyzed: 01/26/06					
Total Alkalinity	97.0		mg/L	100		97.0	90-110			

Rice Operating Co.  
122 W. Taylor  
Mobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

Reported:  
02/02/06 08:29

**Total Metals by EPA / Standard Methods - Quality Control**  
**Environmental Lab of Texas**

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

**Batch EA62615 - 6010B/No Digestion**

**Blank (EA62615-BLK1)**

Prepared & Analyzed: 01/26/06

Calcium	ND	0.0100	mg/L							
Magnesium	ND	0.00100	"							
Potassium	ND	0.0500	"							
Sodium	ND	0.0100	"							

**Calibration Check (EA62615-CCV1)**

Prepared & Analyzed: 01/26/06

Calcium	2.12		mg/L	2.00		106	85-115			
Magnesium	1.99		"	2.00		99.5	85-115			
Potassium	1.88		"	2.00		94.0	85-115			
Sodium	1.94		"	2.00		97.0	85-115			

**Duplicate (EA62615-DUP1)**

Source: 6A19005-01

Prepared & Analyzed: 01/26/06

Calcium	224	0.500	mg/L		222			0.897	20	
Magnesium	115	0.0500	"		120			4.26	20	
Potassium	14.6	0.500	"		15.2			4.03	20	
Sodium	306	0.500	"		313			2.26	20	

Rice Operating Co.  
122 W. Taylor  
Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

Reported:  
02/02/06 08:29

**Total Metals by EPA / Standard Methods - Quality Control**  
**Environmental Lab of Texas**

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

**Batch EA62615 - 6010B/No Digestion**

**Blank (EA62615-BLK1)**

Prepared & Analyzed: 01/26/06

Calcium	ND	0.0100	mg/L							
Magnesium	ND	0.00100	"							
Potassium	ND	0.0500	"							
Sodium	ND	0.0100	"							

**Calibration Check (EA62615-CCV1)**

Prepared & Analyzed: 01/26/06

Calcium	2.12		mg/L	2.00		106	85-115			
Magnesium	1.99		"	2.00		99.5	85-115			
Potassium	1.88		"	2.00		94.0	85-115			
Sodium	1.94		"	2.00		97.0	85-115			

**Duplicate (EA62615-DUP1)**

Source: 6A19005-01

Prepared & Analyzed: 01/26/06

Calcium	224	0.500	mg/L		222			0.897	20	
Magnesium	115	0.0500	"		120			4.26	20	
Potassium	14.6	0.500	"		15.2			4.03	20	
Sodium	306	0.500	"		313			2.26	20	

Rice Operating Co.  
122 W. Taylor  
Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471  
**Reported:**  
02/02/06 08:29

### Notes and Definitions

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  
RPD Relative Percent Difference  
LCS Laboratory Control Spike  
MS Matrix Spike  
Dup Duplicate

Report Approved By:

*Raland K. Tuttle*

Date: 2/2/2006

Raland K. Tuttle, Lab Manager  
Celey D. Keene, Lab Director, Org. Tech Director  
Peggy Allen, QA Officer

Jeanne Mc Murrey, Inorg. Tech Director  
LaTasha Cornish, Chemist  
Sandra Sanchez, Lab Tech.

This material is intended only for the use of the individual (s) or entity to whom it is addressed, and may contain information that is privileged and confidential.

If you have received this material in error, please notify us immediately at 432-563-1800.



**Environmental Lab of Texas**  
**Variance / Corrective Action Report – Sample Log-In**

Client: Eric Op.  
 Date/Time: 1/19/06 11:10  
 Order #: 6A19007  
 Initials: NK

**Sample Receipt Checklist**

Temperature of container/cooler?	Yes	No	-2.0 C
Shipping container/cooler in good condition?	Yes	No	
Custody Seals intact on shipping container/cooler?	Yes	No	Not present
Custody Seals intact on sample bottles?	Yes	No	Not present
Chain of custody present?	Yes	No	
Sample Instructions complete on Chain of Custody?	Yes	No	
Chain of Custody signed when relinquished and received?	Yes	No	
Chain of custody agrees with sample label(s)	Yes	No	
Container labels legible and intact?	Yes	No	
Sample Matrix and properties same as on chain of custody?	Yes	No	
Samples in proper container/bottle?	Yes	No	
Samples properly preserved?	Yes	No	
Sample bottles intact?	Yes	No	
Preservations documented on Chain of Custody?	Yes	No	
Containers documented on Chain of Custody?	Yes	No	
Sufficient sample amount for indicated test?	Yes	No	
All samples received within sufficient hold time?	Yes	No	
VOC samples have zero headspace?	Yes	No	Not Applicable

Other observations:

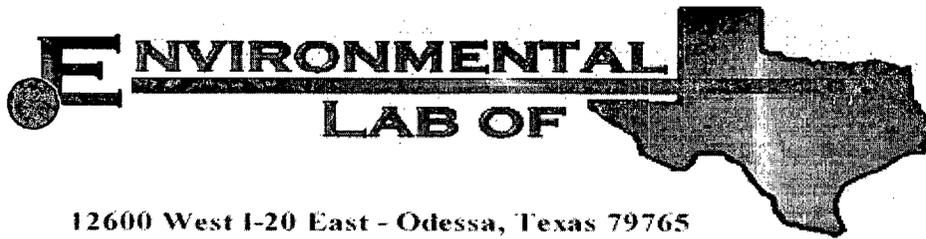
Samples not frozen

**Variance Documentation:**

Contact Person: - \_\_\_\_\_ Date/Time: \_\_\_\_\_ Contacted by: \_\_\_\_\_  
 Regarding: \_\_\_\_\_

Corrective Action Taken:

\_\_\_\_\_  
 \_\_\_\_\_  
 \_\_\_\_\_  
 \_\_\_\_\_  
 \_\_\_\_\_



12600 West I-20 East - Odessa, Texas 79765

## Analytical Report

**Prepared for:**

Kristin Farris-Pope

Rice Operating Co.

122 W. Taylor

Hobbs, NM 88240

Project: EME Jct. D-1 Leak

Project Number: None Given

Location: Lea County

Lab Order Number: 6D20008

Report Date: 05/03/06

Rice Operating Co.  
122 W. Taylor  
Jobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

**Reported:**  
05/03/06 11:49

**ANALYTICAL REPORT FOR SAMPLES**

Sample ID	Laboratory ID	Matrix	Date Sampled	Date Received
Monitor Well #1	6D20008-01	Water	04/19/06 10:35	04/20/06 15:05
Monitor Well #2	6D20008-02	Water	04/19/06 11:55	04/20/06 15:05
Monitor Well #3	6D20008-03	Water	04/19/06 09:05	04/20/06 15:05

Rice Operating Co.  
122 W. Taylor  
Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

Reported:  
05/03/06 11:49

**Organics by GC**  
**Environmental Lab of Texas**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
<b>Monitor Well #1 (6D20008-01) Water</b>									
Benzene	ND	0.00100	mg/L	1	ED62607	04/26/06	04/26/06	EPA 8021B	
Toluene	ND	0.00100	"	"	"	"	"	"	
Ethylbenzene	ND	0.00100	"	"	"	"	"	"	
Xylene (p/m)	ND	0.00100	"	"	"	"	"	"	
Xylene (o)	ND	0.00100	"	"	"	"	"	"	
<i>Surrogate: a,a,a-Trifluorotoluene</i>		103 %		80-120	"	"	"	"	
<i>Surrogate: 4-Bromofluorobenzene</i>		96.2 %		80-120	"	"	"	"	
<b>Monitor Well #2 (6D20008-02) Water</b>									
Benzene	ND	0.00100	mg/L	1	ED62607	04/26/06	04/26/06	EPA 8021B	
Toluene	ND	0.00100	"	"	"	"	"	"	
Ethylbenzene	ND	0.00100	"	"	"	"	"	"	
Xylene (p/m)	ND	0.00100	"	"	"	"	"	"	
Xylene (o)	ND	0.00100	"	"	"	"	"	"	
<i>Surrogate: a,a,a-Trifluorotoluene</i>		104 %		80-120	"	"	"	"	
<i>Surrogate: 4-Bromofluorobenzene</i>		97.8 %		80-120	"	"	"	"	
<b>Monitor Well #3 (6D20008-03) Water</b>									
Benzene	ND	0.00100	mg/L	1	ED62607	04/26/06	04/26/06	EPA 8021B	
Toluene	ND	0.00100	"	"	"	"	"	"	
Ethylbenzene	ND	0.00100	"	"	"	"	"	"	
Xylene (p/m)	ND	0.00100	"	"	"	"	"	"	
Xylene (o)	ND	0.00100	"	"	"	"	"	"	
<i>Surrogate: a,a,a-Trifluorotoluene</i>		92.2 %		80-120	"	"	"	"	
<i>Surrogate: 4-Bromofluorobenzene</i>		91.0 %		80-120	"	"	"	"	

Rice Operating Co.  
122 W. Taylor  
Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

Reported:  
05/03/06 11:49

**General Chemistry Parameters by EPA / Standard Methods**  
**Environmental Lab of Texas**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
<b>Monitor Well #1 (6D20008-01) Water</b>									
Total Alkalinity	448	2.00	mg/L	1	ED62402	04/25/06	04/25/06	EPA 310.1M	
Chloride	10700	250	"	500	ED62120	04/24/06	04/24/06	EPA 300.0	
Total Dissolved Solids	26800	5.00	"	1	ED62405	04/20/06	04/21/06	EPA 160.1	
Sulfate	3320	250	"	500	ED62120	04/24/06	04/24/06	EPA 300.0	
<b>Monitor Well #2 (6D20008-02) Water</b>									
Total Alkalinity	434	2.00	mg/L	1	ED62402	04/25/06	04/25/06	EPA 310.1M	
Chloride	8730	100	"	200	ED62120	04/24/06	04/24/06	EPA 300.0	
Total Dissolved Solids	19200	5.00	"	1	ED62405	04/20/06	04/21/06	EPA 160.1	
Sulfate	3840	100	"	200	ED62120	04/24/06	04/24/06	EPA 300.0	
<b>Monitor Well #3 (6D20008-03) Water</b>									
Total Alkalinity	474	2.00	mg/L	1	ED62402	04/25/06	04/25/06	EPA 310.1M	
Chloride	11100	250	"	500	ED62120	04/24/06	04/24/06	EPA 300.0	
Total Dissolved Solids	25600	5.00	"	1	ED62405	04/20/06	04/21/06	EPA 160.1	
Sulfate	3480	250	"	500	ED62120	04/24/06	04/24/06	EPA 300.0	

Rice Operating Co.  
122 W. Taylor  
Lubbock NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

Reported:  
05/03/06 11:49

**Total Metals by EPA / Standard Methods  
Environmental Lab of Texas**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
<b>Monitor Well #1 (6D20008-01) Water</b>									
Calcium	544	0.500	mg/L	50	ED62106	04/21/06	04/21/06	EPA 6010B	
Magnesium	252	0.0500	"	"	"	"	"	"	
Potassium	248	2.50	"	"	"	"	"	"	
Sodium	9370	25.0	"	2500	"	"	"	"	
<b>Monitor Well #2 (6D20008-02) Water</b>									
Calcium	382	0.500	mg/L	50	ED62106	04/21/06	04/21/06	EPA 6010B	
Magnesium	175	0.0500	"	"	"	"	"	"	
Potassium	146	2.50	"	"	"	"	"	"	
Sodium	8220	25.0	"	2500	"	"	"	"	
<b>Monitor Well #3 (6D20008-03) Water</b>									
Calcium	409	0.500	mg/L	50	ED62106	04/21/06	04/21/06	EPA 6010B	
Magnesium	230	0.0500	"	"	"	"	"	"	
Potassium	188	2.50	"	"	"	"	"	"	
Sodium	10400	25.0	"	2500	"	"	"	"	

Rice Operating Co.  
122 W. Taylor  
Jobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

Reported:  
05/03/06 11:49

**Organics by GC - Quality Control**  
**Environmental Lab of Texas**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
<b>Batch ED62607 - EPA 5030C (GC)</b>										
<b>Blank (ED62607-BLK1)</b> Prepared & Analyzed: 04/26/06										
Benzene	ND	0.00100	mg/L							
Toluene	ND	0.00100	"							
Ethylbenzene	ND	0.00100	"							
Xylene (p/m)	ND	0.00100	"							
Xylene (o)	ND	0.00100	"							
Surrogate: a,a,a-Trifluorotoluene	39.1		ug/l	40.0		97.8	80-120			
Surrogate: 4-Bromofluorobenzene	41.4		"	40.0		104	80-120			
<b>LCS (ED62607-BS1)</b> Prepared & Analyzed: 04/26/06										
Benzene	0.0503	0.00100	mg/L	0.0502		100	80-120			
Toluene	0.0550	0.00100	"	0.0502		110	80-120			
Ethylbenzene	0.0584	0.00100	"	0.0502		116	80-120			
Xylene (p/m)	0.120	0.00100	"	0.100		120	80-120			
Xylene (o)	0.0582	0.00100	"	0.0502		116	80-120			
Surrogate: a,a,a-Trifluorotoluene	42.9		ug/l	40.0		107	80-120			
Surrogate: 4-Bromofluorobenzene	47.2		"	40.0		118	80-120			
<b>Calibration Check (ED62607-CCV1)</b> Prepared: 04/26/06 Analyzed: 04/27/06										
Benzene	57.8		ug/l	50.0		116	80-120			
Toluene	56.3		"	50.0		113	80-120			
Ethylbenzene	58.2		"	50.0		116	80-120			
Xylene (p/m)	118		"	100		118	80-120			
Xylene (o)	58.8		"	50.0		118	80-120			
Surrogate: a,a,a-Trifluorotoluene	35.5		"	40.0		88.8	80-120			
Surrogate: 4-Bromofluorobenzene	36.6		"	40.0		91.5	80-120			
<b>Matrix Spike (ED62607-MS1)</b> Source: 6D20008-01 Prepared: 04/26/06 Analyzed: 04/27/06										
Benzene	0.0595	0.00100	mg/L	0.0502	ND	119	80-120			
Toluene	0.0573	0.00100	"	0.0502	ND	114	80-120			
Ethylbenzene	0.0559	0.00100	"	0.0502	ND	111	80-120			
Xylene (p/m)	0.120	0.00100	"	0.100	ND	120	80-120			
Xylene (o)	0.0582	0.00100	"	0.0502	ND	116	80-120			
Surrogate: a,a,a-Trifluorotoluene	37.1		ug/l	40.0		92.8	80-120			
Surrogate: 4-Bromofluorobenzene	40.0		"	40.0		100	80-120			

Rice Operating Co.  
122 W. Taylor  
Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

Reported:  
05/03/06 11:49

**Organics by GC - Quality Control**  
**Environmental Lab of Texas**

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

**Batch ED62607 - EPA 5030C (GC)**

**Matrix Spike Dup (ED62607-MSD1)**

Source: 6D20008-01

Prepared: 04/26/06 Analyzed: 04/27/06

Benzene	0.0600	0.00100	mg/L	0.0502	ND	120	80-120	0.837	20	
Toluene	0.0579	0.00100	"	0.0502	ND	115	80-120	0.873	20	
Ethylbenzene	0.0590	0.00100	"	0.0502	ND	118	80-120	6.11	20	
Xylene (p/m)	0.120	0.00100	"	0.100	ND	120	80-120	0.00	20	
Xylene (o)	0.0584	0.00100	"	0.0502	ND	116	80-120	0.00	20	
Surrogate: a,a,a-Trifluorotoluene	41.9		ug/l	40.0		105	80-120			
Surrogate: 4-Bromofluorobenzene	42.5		"	40.0		106	80-120			

Rice Operating Co.  
122 W. Taylor  
Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

Reported:  
05/03/06 11:49

**General Chemistry Parameters by EPA / Standard Methods - Quality Control**  
**Environmental Lab of Texas**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
<b>Batch ED62120 - General Preparation (WetChem)</b>										
<b>Blank (ED62120-BLK1)</b> Prepared & Analyzed: 04/24/06										
Sulfate	ND	0.500	mg/L							
Chloride	ND	0.500	"							
<b>LCS (ED62120-BS1)</b> Prepared & Analyzed: 04/24/06										
Sulfate	8.76		mg/L	10.0		87.6	80-120			
Chloride	9.01		"	10.0		90.1	80-120			
<b>Calibration Check (ED62120-CCV1)</b> Prepared & Analyzed: 04/24/06										
Sulfate	9.38		mg/L	10.0		93.8	80-120			
Chloride	9.40		"	10.0		94.0	80-120			
<b>Duplicate (ED62120-DUP1)</b> Source: 6D20005-01 Prepared & Analyzed: 04/24/06										
Sulfate	86.7	5.00	mg/L		86.4			0.347	20	
Chloride	56.7	5.00	"		55.9			1.42	20	
<b>Batch ED62402 - General Preparation (WetChem)</b>										
<b>Blank (ED62402-BLK1)</b> Prepared & Analyzed: 04/25/06										
Total Alkalinity	ND	2.00	mg/L							
<b>LCS (ED62402-BS1)</b> Prepared & Analyzed: 04/25/06										
Bicarbonate Alkalinity	214	2.00	mg/L	200		107	85-115			
<b>Duplicate (ED62402-DUP1)</b> Source: 6D20005-01 Prepared & Analyzed: 04/25/06										
Total Alkalinity	197	2.00	mg/L		198			0.506	20	
<b>Reference (ED62402-SRM1)</b> Prepared & Analyzed: 04/25/06										
Total Alkalinity	97.0		mg/L	100		97.0	90-110			

Rice Operating Co.  
122 W. Taylor  
Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

Reported:  
05/03/06 11:49

**General Chemistry Parameters by EPA / Standard Methods - Quality Control**  
**Environmental Lab of Texas**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
<b>Batch ED62405 - Filtration Preparation</b>										
<b>Blank (ED62405-BLK1)</b>										
					Prepared: 04/20/06 Analyzed: 04/21/06					
Total Dissolved Solids	ND	5.00	mg/L							
<b>Duplicate (ED62405-DUP1)</b>										
					Source: 6D20006-01 Prepared: 04/20/06 Analyzed: 04/21/06					
Total Dissolved Solids	2390	5.00	mg/L		2290			4.27	5	

Rice Operating Co.  
122 W. Taylor  
Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471  
**Reported:**  
05/03/06 11:49

**Total Metals by EPA / Standard Methods - Quality Control**  
**Environmental Lab of Texas**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
<b>Batch ED62106 - 6010B/No Digestion</b>										
<b>Blank (ED62106-BLK1)</b>				Prepared & Analyzed: 04/21/06						
Calcium	ND	0.0100	mg/L							
Magnesium	ND	0.00100	"							
Potassium	ND	0.0500	"							
Sodium	ND	0.0100	"							
<b>Calibration Check (ED62106-CCV1)</b>				Prepared & Analyzed: 04/21/06						
Calcium	1.98		mg/L	2.00		99.0	85-115			
Magnesium	2.10		"	2.00		105	85-115			
Potassium	2.06		"	2.00		103	85-115			
Sodium	2.06		"	2.00		103	85-115			
<b>Duplicate (ED62106-DUP1)</b>		<b>Source: 6D20005-01</b>		Prepared & Analyzed: 04/21/06						
Calcium	25.1	0.100	mg/L		28.8			13.7	20	
Magnesium	15.9	0.0100	"		13.4			17.1	20	
Potassium	8.87	0.500	"		10.0			12.0	20	
Sodium	122	0.500	"		122			0.00	20	

Rice Operating Co.  
122 W. Taylor  
Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

Reported:  
05/03/06 11:49

### Notes and Definitions

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  
RPD Relative Percent Difference  
LCS Laboratory Control Spike  
MS Matrix Spike  
Dup Duplicate

Report Approved By:

*Raland K Tuttle*

Date: 5/3/2006

Raland K. Tuttle, Lab Manager  
Celey D. Keene, Lab Director, Org. Tech Director  
Peggy Allen, QA Officer

Jeanne Mc Murrey, Inorg. Tech Director  
LaTasha Cornish, Chemist  
Sandra Sanchez, Lab Tech.

This material is intended only for the use of the individual (s) or entity to whom it is addressed, and may contain information that is privileged and confidential.

If you have received this material in error, please notify us immediately at 432-563-1800.



**Environmental Lab of Texas**  
**Variance / Corrective Action Report – Sample Log-In**

Site: Rice Op.  
 Date/Time: 4/10/08 15:05  
 Order #: 16D20008  
 Initials: CR

**Sample Receipt Checklist**

	Yes	No	215	C
Temperature of container/cooler?				
Shipping container/cooler in good condition?	<input checked="" type="checkbox"/>	No		
Primary Seals intact on shipping container/cooler?	<input checked="" type="checkbox"/>	No	Not present	
Primary Seals intact on sample bottles?	<input checked="" type="checkbox"/>	No	Not present	
Chain of custody present?	<input checked="" type="checkbox"/>	No		
Sample Instructions complete on Chain of Custody?	<input checked="" type="checkbox"/>	No		
Chain of Custody signed when relinquished and received?	<input checked="" type="checkbox"/>	No		
Chain of custody agrees with sample label(s)	<input checked="" type="checkbox"/>	No		
Container labels legible and intact?	<input checked="" type="checkbox"/>	No		
Sample Matrix and properties same as on chain of custody?	<input checked="" type="checkbox"/>	No		
Samples in proper container/bottle?	<input checked="" type="checkbox"/>	No		
Samples properly preserved?	<input checked="" type="checkbox"/>	No		
Sample bottles intact?	<input checked="" type="checkbox"/>	No		
Observations documented on Chain of Custody?	<input checked="" type="checkbox"/>	No		
Containers documented on Chain of Custody?	<input checked="" type="checkbox"/>	No		
Sufficient sample amount for indicated test?	<input checked="" type="checkbox"/>	No		
Initials received within sufficient hold time?	<input checked="" type="checkbox"/>	No		
GC samples have zero headspace?	<input checked="" type="checkbox"/>	No	Not Applicable	

Other observations:  
 \_\_\_\_\_  
 \_\_\_\_\_  
 \_\_\_\_\_

**Variance Documentation:**

Contact Person: - \_\_\_\_\_ Date/Time: \_\_\_\_\_ Contacted by: \_\_\_\_\_  
 Regarding: \_\_\_\_\_  
 \_\_\_\_\_  
 \_\_\_\_\_

Corrective Action Taken:  
 \_\_\_\_\_  
 \_\_\_\_\_  
 \_\_\_\_\_  
 \_\_\_\_\_  
 \_\_\_\_\_  
 \_\_\_\_\_



6701 Aberdeen Avenue, Suite 9    Lubbock, Texas 79424    800•378•1296    806•794•1296    FAX 806•794•1298  
 155 McCutcheon, Suite H    El Paso, Texas 79932    888•588•3443    915•585•3443    FAX 915•585•4944  
 E-Mail lab@traceanalysis.com

## Analytical and Quality Control Report

Kristen Farris-Pope  
 Rice Operating Company  
 122 W Taylor Street  
 Hobbs, NM, 88240

Report Date: August 17, 2006

Work Order: 6072142



Project Location: Lea County, NM  
 Project Name: EME D-1 Leak  
 Project Number: EME D-1 Leak

Enclosed are the Analytical Report and Quality Control Report for the following sample(s) submitted to TraceAnalysis, Inc.

Sample	Description	Matrix	Date Taken	Time Taken	Date Received
96137	Monitor Well #1	water	2006-07-18	11:00	2006-07-21
96138	Monitor Well #2	water	2006-07-18	09:25	2006-07-21
96139	Monitor Well #3	water	2006-07-18	08:05	2006-07-21

These results represent only the samples received in the laboratory. The Quality Control Report is generated on a batch basis. All information contained in this report is for the analytical batch(es) in which your sample(s) were analyzed.

This report consists of a total of 17 pages and shall not be reproduced except in its entirety, without written approval of TraceAnalysis, Inc.

Dr. Blair Leftwich, Director

## Analytical Report

**Sample: 96137 - Monitor Well #1**

Analysis: Alkalinity	Analytical Method: SM 2320B	Prep Method: N/A
QC Batch: 28340	Date Analyzed: 2006-07-26	Analyzed By: LJ
Prep Batch: 24777	Sample Preparation: 2006-07-25	Prepared By: LJ

Parameter	Flag	RL Result	Units	Dilution	RL
Hydroxide Alkalinity		<1.00	mg/L as CaCo3	1	1.00
Carbonate Alkalinity		<1.00	mg/L as CaCo3	1	1.00
Bicarbonate Alkalinity		<b>494</b>	mg/L as CaCo3	1	4.00
Total Alkalinity		<b>494</b>	mg/L as CaCo3	1	4.00

**Sample: 96137 - Monitor Well #1**

Analysis: BTEX	Analytical Method: S 8021B	Prep Method: S 5030B
QC Batch: 28277	Date Analyzed: 2006-07-24	Analyzed By: MT
Prep Batch: 24759	Sample Preparation: 2006-07-24	Prepared By: MT

Parameter	Flag	RL Result	Units	Dilution	RL
Benzene		<0.00100	mg/L	1	0.00100
Toluene		<0.00100	mg/L	1	0.00100
Ethylbenzene		<0.00100	mg/L	1	0.00100
Xylene		<0.00100	mg/L	1	0.00100

Surrogate	Flag	Result	Units	Dilution	Spike Amount	Percent Recovery	Recovery Limits
Trifluorotoluene (TFT)		0.0963	mg/L	1	0.100	96	66.2 - 127.7
4-Bromofluorobenzene (4-BFB)	1	0.0699	mg/L	1	0.100	70	70.6 - 129.2

**Sample: 96137 - Monitor Well #1**

Analysis: Cations	Analytical Method: S 6010B	Prep Method: S 3005A
QC Batch: 28356	Date Analyzed: 2006-07-26	Analyzed By: TP
Prep Batch: 24749	Sample Preparation: 2006-07-24	Prepared By: TS

Parameter	Flag	RL Result	Units	Dilution	RL
Dissolved Calcium		<b>572</b>	mg/L	10	0.500
Dissolved Potassium		<b>249</b>	mg/L	10	1.00
Dissolved Magnesium		<b>299</b>	mg/L	10	1.00
Dissolved Sodium		<b>7270</b>	mg/L	100	1.00

**Sample: 96137 - Monitor Well #1**

Analysis: Ion Chromatography	Analytical Method: E 300.0	Prep Method: N/A
QC Batch: 28927	Date Analyzed: 2006-08-15	Analyzed By: WB
Prep Batch: 25286	Sample Preparation: 2006-08-11	Prepared By: WB

<sup>1</sup> BFB surrogate recovery outside normal limits. ICV/CCV and TFT surrogate recovery show the method to be in control.



**Sample: 96138 - Monitor Well #2**

Analysis: Cations	Analytical Method: S 6010B	Prep Method: S 3005A
QC Batch: 28356	Date Analyzed: 2006-07-26	Analyzed By: TP
Prep Batch: 24749	Sample Preparation: 2006-07-24	Prepared By: TS

Parameter	Flag	RL Result	Units	Dilution	RL
Dissolved Calcium		379	mg/L	10	0.500
Dissolved Potassium		155	mg/L	10	1.00
Dissolved Magnesium		203	mg/L	10	1.00
Dissolved Sodium		6300	mg/L	100	1.00

**Sample: 96138 - Monitor Well #2**

Analysis: Ion Chromatography	Analytical Method: E 300.0	Prep Method: N/A
QC Batch: 28782	Date Analyzed: 2006-08-02	Analyzed By: WB
Prep Batch: 25167	Sample Preparation: 2006-08-02	Prepared By: WB

Parameter	Flag	RL Result	Units	Dilution	RL
Chloride		9390	mg/L	1000	0.500
Sulfate		5240	mg/L	1000	0.500

**Sample: 96138 - Monitor Well #2**

Analysis: TDS	Analytical Method: SM 2540C	Prep Method: N/A
QC Batch: 28406	Date Analyzed: 2006-07-27	Analyzed By: SM
Prep Batch: 24850	Sample Preparation: 2009-07-26	Prepared By: SM

Parameter	Flag	RL Result	Units	Dilution	RL
Total Dissolved Solids		19950	mg/L	50	10.00

**Sample: 96139 - Monitor Well #3**

Analysis: Alkalinity	Analytical Method: SM 2320B	Prep Method: N/A
QC Batch: 28340	Date Analyzed: 2006-07-26	Analyzed By: LJ
Prep Batch: 24777	Sample Preparation: 2006-07-25	Prepared By: LJ

Parameter	Flag	RL Result	Units	Dilution	RL
Hydroxide Alkalinity		<1.00	mg/L as CaCo3	1	1.00
Carbonate Alkalinity		<1.00	mg/L as CaCo3	1	1.00
Bicarbonate Alkalinity		544	mg/L as CaCo3	1	4.00
Total Alkalinity		544	mg/L as CaCo3	1	4.00

**Sample: 96139 - Monitor Well #3**

Analysis: BTEX	Analytical Method: S 8021B	Prep Method: S 5030B
QC Batch: 28277	Date Analyzed: 2006-07-24	Analyzed By: MT
Prep Batch: 24759	Sample Preparation: 2006-07-24	Prepared By: MT

Parameter	Flag	RL Result	Units	Dilution	RL
Benzene		<0.00100	mg/L	1	0.00100
Toluene		<0.00100	mg/L	1	0.00100
Ethylbenzene		<0.00100	mg/L	1	0.00100
Xylene		<0.00100	mg/L	1	0.00100

Surrogate	Flag	Result	Units	Dilution	Spike Amount	Percent Recovery	Recovery Limits
Trifluorotoluene (TFT)		0.0972	mg/L	1	0.100	97	66.2 - 127.7
4-Bromofluorobenzene (4-BFB)	4	0.0699	mg/L	1	0.100	70	70.6 - 129.2

**Sample: 96139 - Monitor Well #3**

Analysis: Cations	Analytical Method: S 6010B	Prep Method: S 3005A
QC Batch: 28356	Date Analyzed: 2006-07-26	Analyzed By: TP
Prep Batch: 24749	Sample Preparation: 2006-07-24	Prepared By: TS

Parameter	Flag	RL Result	Units	Dilution	RL
Dissolved Calcium		581	mg/L	10	0.500
Dissolved Potassium		268	mg/L	10	1.00
Dissolved Magnesium		379	mg/L	10	1.00
Dissolved Sodium		7990	mg/L	100	1.00

**Sample: 96139 - Monitor Well #3**

Analysis: Ion Chromatography	Analytical Method: E 300.0	Prep Method: N/A
QC Batch: 28782	Date Analyzed: 2006-08-02	Analyzed By: WB
Prep Batch: 25167	Sample Preparation: 2006-08-02	Prepared By: WB

Parameter	Flag	RL Result	Units	Dilution	RL
Chloride		15400	mg/L	1000	0.500
Sulfate		4770	mg/L	100	0.500

**Sample: 96139 - Monitor Well #3**

Analysis: TDS	Analytical Method: SM 2540C	Prep Method: N/A
QC Batch: 28406	Date Analyzed: 2006-07-27	Analyzed By: SM
Prep Batch: 24850	Sample Preparation: 2009-07-26	Prepared By: SM

*continued...*

<sup>4</sup>BFB surrogate recovery outside normal limits. ICV/CCV and TFT surrogate recovery show the method to be in control.

sample 96139 continued ...

Parameter	Flag	RL Result	Units	Dilution	RL
Parameter	Flag	RL Result	Units	Dilution	RL
Total Dissolved Solids		<b>25900</b>	mg/L	50	10.00

**Method Blank (1)** QC Batch: 28277

QC Batch: 28277                      Date Analyzed: 2006-07-24                      Analyzed By: MT  
 Prep Batch: 24759                      QC Preparation: 2006-07-24                      Prepared By: MT

Parameter	Flag	MDL Result	Units	RL
Benzene		<0.000255	mg/L	0.001
Toluene		<0.000210	mg/L	0.001
Ethylbenzene		<0.000317	mg/L	0.001
Xylene		<0.000603	mg/L	0.001

Surrogate	Flag	Result	Units	Dilution	Spike Amount	Percent Recovery	Recovery Limits
Trifluorotoluene (TFT)		0.0949	mg/L	1	0.100	95	76.1 - 117
4-Bromofluorobenzene (4-BFB)		0.0633	mg/L	1	0.100	63	58.5 - 118

**Method Blank (1)** QC Batch: 28340

QC Batch: 28340                      Date Analyzed: 2006-07-26                      Analyzed By: LJ  
 Prep Batch: 24777                      QC Preparation: 2006-07-25                      Prepared By: LJ

Parameter	Flag	MDL Result	Units	RL
Hydroxide Alkalinity		<1.00	mg/L as CaCo3	1
Carbonate Alkalinity		<1.00	mg/L as CaCo3	1
Bicarbonate Alkalinity		<4.00	mg/L as CaCo3	4
Total Alkalinity		<4.00	mg/L as CaCo3	4

**Method Blank (1)** QC Batch: 28356

QC Batch: 28356                      Date Analyzed: 2006-07-26                      Analyzed By: TP  
 Prep Batch: 24749                      QC Preparation: 2006-07-24                      Prepared By: TS

Parameter	Flag	MDL Result	Units	RL
Dissolved Calcium		0.132	mg/L	0.5
Dissolved Potassium		1.08	mg/L	1
Dissolved Magnesium		<0.704	mg/L	1
Dissolved Sodium		0.836	mg/L	1





**Laboratory Control Spike (LCS-1)**

QC Batch: 28356  
 Prep Batch: 24749

Date Analyzed: 2006-07-26  
 QC Preparation: 2006-07-24

Analyzed By: TP  
 Prepared By: TS

Param	LCS Result	Units	Dil.	Spike Amount	Matrix Result	Rec.	Rec. Limit
Dissolved Calcium	51.7	mg/L	1	50.0	<0.0950	103	85 - 115
Dissolved Potassium	50.8	mg/L	1	50.0	<0.377	102	85 - 113
Dissolved Magnesium	51.5	mg/L	1	50.0	<0.704	103	85 - 113
Dissolved Sodium	50.5	mg/L	1	50.0	<0.261	101	85 - 111

Percent recovery is based on the spike result. RPD is based on the spike and spike duplicate result.

Param	LCSD Result	Units	Dil.	Spike Amount	Matrix Result	Rec.	Rec. Limit	RPD	RPD Limit
Dissolved Calcium	51.7	mg/L	1	50.0	<0.0950	103	85 - 115	0	20
Dissolved Potassium	49.3	mg/L	1	50.0	<0.377	102	85 - 113	3	20
Dissolved Magnesium	49.8	mg/L	1	50.0	<0.704	103	85 - 113	3	20
Dissolved Sodium	48.6	mg/L	1	50.0	<0.261	101	85 - 111	4	20

Percent recovery is based on the spike result. RPD is based on the spike and spike duplicate result.

**Laboratory Control Spike (LCS-1)**

QC Batch: 28782  
 Prep Batch: 25167

Date Analyzed: 2006-08-02  
 QC Preparation: 2006-08-02

Analyzed By: WB  
 Prepared By: WB

Param	LCS Result	Units	Dil.	Spike Amount	Matrix Result	Rec.	Rec. Limit
Chloride	12.2	mg/L	1	12.5	<0.0181	98	90 - 110
Sulfate	12.5	mg/L	1	12.5	<0.0485	100	90 - 110

Percent recovery is based on the spike result. RPD is based on the spike and spike duplicate result.

Param	LCSD Result	Units	Dil.	Spike Amount	Matrix Result	Rec.	Rec. Limit	RPD	RPD Limit
Chloride	12.3	mg/L	1	12.5	<0.0181	98	90 - 110	1	20
Sulfate	12.5	mg/L	1	12.5	<0.0485	100	90 - 110	0	20

Percent recovery is based on the spike result. RPD is based on the spike and spike duplicate result.

**Laboratory Control Spike (LCS-1)**

QC Batch: 28927  
 Prep Batch: 25286

Date Analyzed: 2006-08-15  
 QC Preparation: 2006-08-11

Analyzed By: WB  
 Prepared By: WB

Param	LCS Result	Units	Dil.	Spike Amount	Matrix Result	Rec.	Rec. Limit
Chloride	12.3	mg/L	1	12.5	<0.0181	98	90 - 110
Sulfate	12.1	mg/L	1	12.5	<0.0485	97	90 - 110

Percent recovery is based on the spike result. RPD is based on the spike and spike duplicate result.

Param	LCSD Result	Units	Dil.	Spike Amount	Matrix Result	Rec.	Rec. Limit	RPD	RPD Limit
Chloride	12.4	mg/L	1	12.5	<0.0181	98	90 - 110	1	20
Sulfate	12.2	mg/L	1	12.5	<0.0485	97	90 - 110	1	20

Percent recovery is based on the spike result. RPD is based on the spike and spike duplicate result.

**Matrix Spike (MS-1) Spiked Sample: 96149**

QC Batch: 28277  
 Prep Batch: 24759

Date Analyzed: 2006-07-24  
 QC Preparation: 2006-07-24

Analyzed By: MT  
 Prepared By: MT

Param	MS Result	Units	Dil.	Spike Amount	Matrix Result	Rec.	Rec. Limit
Benzene	0.107	mg/L	1	0.100	<0.000255	107	70.9 - 126
Toluene	0.105	mg/L	1	0.100	<0.000210	105	70.8 - 125
Ethylbenzene	0.106	mg/L	1	0.100	<0.000317	106	74.8 - 125
Xylene	0.311	mg/L	1	0.300	<0.000603	104	75.7 - 126

Percent recovery is based on the spike result. RPD is based on the spike and spike duplicate result.

Param	MSD Result	Units	Dil.	Spike Amount	Matrix Result	Rec.	Rec. Limit	RPD	RPD Limit
Benzene	<sup>5</sup> NA	mg/L	1	0.100	<0.000255	0	70.9 - 126	200	20
Toluene	<sup>6</sup> NA	mg/L	1	0.100	<0.000210	0	70.8 - 125	200	20
Ethylbenzene	<sup>7</sup> NA	mg/L	1	0.100	<0.000317	0	74.8 - 125	200	20
Xylene	<sup>8</sup> NA	mg/L	1	0.300	<0.000603	0	75.7 - 126	200	20

Percent recovery is based on the spike result. RPD is based on the spike and spike duplicate result.

Surrogate	MS Result	MSD Result	Units	Dil.	Spike Amount	MS Rec.	MSD Rec.	Rec. Limit
Trifluorotoluene (TFT)	<sup>9</sup> 0.101	NA	mg/L	1	0.1	101	0	73.6 - 121
4-Bromofluorobenzene (4-BFB)	<sup>10</sup> 0.110	NA	mg/L	1	0.1	110	0	81.8 - 114

**Matrix Spike (MS-1) Spiked Sample: 96124**

QC Batch: 28356  
 Prep Batch: 24749

Date Analyzed: 2006-07-26  
 QC Preparation: 2006-07-24

Analyzed By: TP  
 Prepared By: TS

Param	MS Result	Units	Dil.	Spike Amount	Matrix Result	Rec.	Rec. Limit
Dissolved Calcium	416	mg/L	1	50.0	361	110	68.4 - 138
Dissolved Potassium	73.8	mg/L	1	50.0	22	104	82 - 129
Dissolved Magnesium	208	mg/L	1	50.0	147	122	61.2 - 135
Dissolved Sodium	633	mg/L	1	50.0	578	110	81.8 - 125

Percent recovery is based on the spike result. RPD is based on the spike and spike duplicate result.

<sup>5</sup>RPD is out of range because a matrix spike duplicate was not prepared.  
<sup>6</sup>RPD is out of range because a matrix spike duplicate was not prepared.  
<sup>7</sup>RPD is out of range because a matrix spike duplicate was not prepared.  
<sup>8</sup>RPD is out of range because a matrix spike duplicate was not prepared.  
<sup>9</sup>RPD is out of range because a matrix spike duplicate was not prepared.  
<sup>10</sup>RPD is out of range because a matrix spike duplicate was not prepared.

Param	MSD Result	Units	Dil.	Spike Amount	Matrix Result	Rec.	Rec. Limit	RPD	RPD Limit
Dissolved Calcium	406	mg/L	1	50.0	361	90	68.4 - 138	2	20
Dissolved Potassium	81.3	mg/L	1	50.0	22	119	82 - 129	10	20
Dissolved Magnesium	194	mg/L	1	50.0	147	94	61.2 - 135	7	20
Dissolved Sodium	637	mg/L	1	50.0	578	118	81.8 - 125	1	20

Percent recovery is based on the spike result. RPD is based on the spike and spike duplicate result.

**Matrix Spike (MS-1)** Spiked Sample: 96141

QC Batch: 28782  
 Prep Batch: 25167

Date Analyzed: 2006-08-02  
 QC Preparation: 2006-08-02

Analyzed By: WB  
 Prepared By: WB

Param	MS Result	Units	Dil.	Spike Amount	Matrix Result	Rec.	Rec. Limit
Chloride	2210	mg/L	100	12.5	988	98	25.4 - 171
Sulfate	1580	mg/L	100	12.5	298	102	0 - 677

Percent recovery is based on the spike result. RPD is based on the spike and spike duplicate result.

Param	MSD Result	Units	Dil.	Spike Amount	Matrix Result	Rec.	Rec. Limit	RPD	RPD Limit
Chloride	2200	mg/L	100	12.5	988	97	25.4 - 171	0	20
Sulfate	1550	mg/L	100	12.5	298	100	0 - 677	2	20

Percent recovery is based on the spike result. RPD is based on the spike and spike duplicate result.

**Matrix Spike (MS-1)** Spiked Sample: 97976

QC Batch: 28927  
 Prep Batch: 25286

Date Analyzed: 2006-08-15  
 QC Preparation: 2006-08-11

Analyzed By: WB  
 Prepared By: WB

Param	MS Result	Units	Dil.	Spike Amount	Matrix Result	Rec.	Rec. Limit
Chloride	69.2	mg/L	5	12.5	9.24	96	25.4 - 171
Sulfate	63.7	mg/L	5	12.5	5.29	93	0 - 677

Percent recovery is based on the spike result. RPD is based on the spike and spike duplicate result.

Param	MSD Result	Units	Dil.	Spike Amount	Matrix Result	Rec.	Rec. Limit	RPD	RPD Limit
Chloride	69.7	mg/L	5	12.5	9.24	97	25.4 - 171	1	20
Sulfate	65.0	mg/L	5	12.5	5.29	96	0 - 677	2	20

Percent recovery is based on the spike result. RPD is based on the spike and spike duplicate result.

**Standard (ICV-1)**

QC Batch: 28277

Date Analyzed: 2006-07-24

Analyzed By: MT

Param	Flag	Units	ICVs True Conc.	ICVs Found Conc.	ICVs Percent Recovery	Percent Recovery Limits	Date Analyzed
Benzene		mg/L	0.100	0.104	104	85 - 115	2006-07-24
Toluene		mg/L	0.100	0.104	104	85 - 115	2006-07-24
Ethylbenzene		mg/L	0.100	0.104	104	85 - 115	2006-07-24
Xylene		mg/L	0.300	0.314	105	85 - 115	2006-07-24

**Standard (CCV-1)**

QC Batch: 28277

Date Analyzed: 2006-07-24

Analyzed By: MT

Param	Flag	Units	CCVs True Conc.	CCVs Found Conc.	CCVs Percent Recovery	Percent Recovery Limits	Date Analyzed
Benzene		mg/L	0.100	0.107	107	85 - 115	2006-07-24
Toluene		mg/L	0.100	0.105	105	85 - 115	2006-07-24
Ethylbenzene		mg/L	0.100	0.106	106	85 - 115	2006-07-24
Xylene		mg/L	0.300	0.311	104	85 - 115	2006-07-24

**Standard (ICV-1)**

QC Batch: 28340

Date Analyzed: 2006-07-26

Analyzed By: LJ

Param	Flag	Units	ICVs True Conc.	ICVs Found Conc.	ICVs Percent Recovery	Percent Recovery Limits	Date Analyzed
Total Alkalinity		mg/L as CaCo3	250	240	96	90 - 110	2006-07-26

**Standard (CCV-1)**

QC Batch: 28340

Date Analyzed: 2006-07-26

Analyzed By: LJ

Param	Flag	Units	CCVs True Conc.	CCVs Found Conc.	CCVs Percent Recovery	Percent Recovery Limits	Date Analyzed
Total Alkalinity		mg/L as CaCo3	250	240	96	90 - 110	2006-07-26

**Standard (ICV-1)**

QC Batch: 28356

Date Analyzed: 2006-07-26

Analyzed By: TP

Param	Flag	Units	ICVs True Conc.	ICVs Found Conc.	ICVs Percent Recovery	Percent Recovery Limits	Date Analyzed
Dissolved Calcium		mg/L	50.0	50.7	101	90 - 110	2006-07-26
Dissolved Potassium		mg/L	50.0	52.0	104	90 - 110	2006-07-26
Dissolved Magnesium		mg/L	50.0	49.6	99	90 - 110	2006-07-26
Dissolved Sodium		mg/L	50.0	50.9	102	90 - 110	2006-07-26





**TraceAnalysis, Inc.**  
6707 Anderson Ave, Ste 9  
Lubbock, Texas 79424  
Tel (806) 794-1296  
Fax (806) 794-1298  
1 (800) 378-1296

155 McCutcheon Way, Suite H  
El Paso, Texas 79932  
Tel (915) 585-3443  
Fax (915) 585-4844

**CHAIN-OF-CUSTODY AND ANALYSIS REQUEST**  
LAB Order ID # 6072142

**ANALYSIS REQUEST**  
(Circle or Specify Method No.)

Hold	
Turn Around Time if different from standard	
Total Dissolved Solids	X
Anions (Cl, SSSSO4, CO3, HCO3)	X
Cations (Ca, Mg, Na, K)	X
Moisture Content	
BOD, TSS, pH	
Pesticides 8081A/608	
PCBs 8082/608	
GC/MS Seml. Vol. 8270C/625	
GC/MS Vol. 8260B/624	
RCI	
TCLP Pesticides	
TCLP Semi Volatiles	
TCLP Volatiles	
TCLP Metals Ag As Ba Cd Cr Pb Se Hg	
Total Metals Ag As Ba Cd Cr Pb Se Hg 6010B/200.7	
PAH 8270C	
TPH 418.1/TX1005 / TX1005 Extended (C35)	
BTEX 8021B/602	X
MTBE 8021B/602	

**LAB USE ONLY**

Intact  Y/N

Headspace  Y/N

Temp 40 °C

Log-in Review  Y/N

Carrier # BWA 611 1690177159

**REMARKS:**

LAB # (LAB USE ONLY)	FIELD CODE	# CONTAINERS	Volume/Amount	MATRIX		PRESERVATIVE METHOD						SAMPLING			
				WATER	SOIL	AIR	SLUDGE	HCL	HNO3	NaHSO4	H2SO4	ICE	NONE	DATE 2006	TIME
94137	Monitor Well #1	2	40 ml	X		X								7-18	11:00
	Monitor Well #1	1	1L	X		X								7-18	11:00
38	Monitor Well #2	2	40 ml	X		X								7-18	9:25
	Monitor Well #2	1	1L	X		X								7-18	9:25
39	Monitor Well #3	2	40 ml	X		X								7-18	8:05
	Monitor Well #3	1	1L	X		X								7-18	8:05

Received by: \_\_\_\_\_ Date: \_\_\_\_\_ Time: \_\_\_\_\_

Received by: \_\_\_\_\_ Date: \_\_\_\_\_ Time: \_\_\_\_\_

Received at Laboratory by: Meghan McLeod Date: 7-21-06 Time: 11:05

Relinquished by: \_\_\_\_\_ Date: \_\_\_\_\_ Time: \_\_\_\_\_

Relinquished by: \_\_\_\_\_ Date: 7-20-06 Time: 8:00

Relinquished by: \_\_\_\_\_ Date: \_\_\_\_\_ Time: \_\_\_\_\_

Project Name: EME D-1 Leak

Project Location: Lea County - New Mexico

Contact Person: Kristin Farris - Pope, Project Scientist

Phone #: (505)393-9174

Fax #: (505)397-1471

Address: 122 W Taylor Street - Hobbs, New Mexico 88240

Company Name: RICE Operating Company

Address: (Street, City, Zip)

Project #: \_\_\_\_\_

Project Location: Lea County - New Mexico

Project Name: EME D-1 Leak

Sampler Signatures: Rozanne Johnson (505)831-8510  
rozanne@valonnet.com

Company Name: TraceAnalysis, Inc.

Address: 6707 Anderson Ave, Ste 9, Lubbock, Texas 79424

Phone #: (806) 794-1296

Fax #: (806) 794-1298

1 (800) 378-1296

Submission of samples constitutes agreement to Terms and Conditions listed on reverse side of COC

**Cation-Anion Balance Sheet**

DATE: 8/16/2006

Sample #	Calcium ppm	Magnesium ppm	Sodium ppm	Potassium ppm	Alkalinity ppm	Sulfate ppm	Chloride ppm	Nitrate ppm	Fluoride ppm	TDS ppm	EC µMHOs/cm
96137	572	299	7270	249	494	5480	13000			24400	
96138	379	203	6300	155	484	5240	9690			20000	
96139	581	379	7990	268	564	4770	15400			25900	

Sample #	Calcium in meq/L	Magnesium in meq/L	Sodium in meq/L	Potassium in meq/L	Alkalinity in meq/L	Sulfate in meq/L	Chloride in meq/L	Nitrate in meq/L	Fluoride in meq/L	Total Cations in meq/L	Total Anions in meq/L	Percentage Error
96137	26.54	24.60	316.25	6.37	9.88	114.09	366.73			375.76	490.70	26.5
96138	16.91	16.70	274.05	3.96	9.66	109.10	273.35			313.63	392.13	22.2
96139	28.99	31.19	347.57	6.86	11.68	99.31	434.43			414.60	545.43	27.3

	EC/Cation	EC/Anion
96137		
96138		
96139		

range 0 to 0  
 range 0 to 0  
 range 0 to 0

TDS/EC	TDS/Cat	TDS/Anion
0.65	0.50	needs to be 0.55-0.77
0.64	0.51	needs to be 0.55-0.77
0.62	0.47	needs to be 0.55-0.77

**Cation-Anion Balance Sheet**

DATE: 8/16/2006

Sample #	Calcium ppm	Magnesium ppm	Sodium ppm	Potassium ppm	Alkalinity ppm	Sulfate ppm	Chloride ppm	Nitrate ppm	Fluoride ppm	TDS ppm	EC $\mu$ MHOS/cm
96137	572	299	7270	249	494	4730	12900			24400	
96138	379	203	6300	155	484	5240	9390			20000	
96139	581	379	7980	268	584	4770	15400			25900	

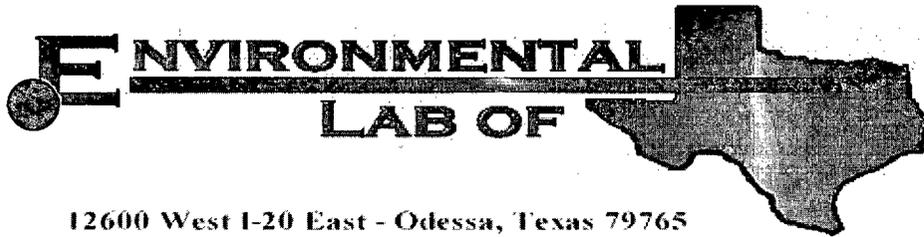
Sample #	Calcium		Magnesium		Sodium		Potassium		Alkalinity		Sulfate		Chloride		Nitrate		Fluoride		TDS		EC		Percentage Error
	in meq/L	ppm	in meq/L	ppm	in meq/L	ppm	in meq/L	ppm	in meq/L	ppm	in meq/L	ppm	in meq/L	ppm	in meq/L	ppm	in meq/L	ppm	in meq/L	ppm	$\mu$ MHOS/cm		
96137	28.54	24.60	316.25	6.37	9.88	98.48	363.91													375.76	472.27	22.8	
96138	18.91	16.70	274.05	3.96	9.68	109.10	264.89													313.63	383.67	20.1	
96139	28.99	31.19	347.57	6.86	11.88	99.31	434.43													414.60	545.43	27.3	

Sample #	EC/Cation	EC/Anion
96137		
96138		
96139		

Sample #	TDS/EC	TDS/Cat	TDS/Anion
96137		0.65	0.52
96138		0.64	0.52
96139		0.62	0.47

needs to be 0.55-0.77  
 needs to be 0.55-0.77  
 needs to be 0.55-0.77

range  
 range  
 range



12600 West I-20 East - Odessa, Texas 79765

## Analytical Report

**Prepared for:**

Kristin Farris-Pope

Rice Operating Co.

122 W. Taylor

Hobbs, NM 88240

Project: EME Jct. D-1 Leak

Project Number: None Given

Location: T20S-R36E-Sec.1D, Lea County, NM

Lab Order Number: 6J12013

Report Date: 10/24/06

Rice Operating Co.  
122 W. Taylor  
Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

**ANALYTICAL REPORT FOR SAMPLES**

Sample ID	Laboratory ID	Matrix	Date Sampled	Date Received
Monitor Well #1	6J12013-01	Water	10/10/06 11:00	10-12-2006 16:00
Monitor Well #2	6J12013-02	Water	10/10/06 09:25	10-12-2006 16:00
Monitor Well #3	6J12013-03	Water	10/10/06 08:05	10-12-2006 16:00

Rice Operating Co.  
122 W. Taylor  
Lubbock NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

**Organics by GC**  
**Environmental Lab of Texas**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
<b>Monitor Well #1 (6J12013-01) Water</b>									
Benzene	ND	0.00100	mg/L	1	EJ61407	10/14/06	10/16/06	EPA 8021B	
Toluene	ND	0.00100	"	"	"	"	"	"	
Ethylbenzene	ND	0.00100	"	"	"	"	"	"	
Xylene (p/m)	ND	0.00100	"	"	"	"	"	"	
Xylene (o)	ND	0.00100	"	"	"	"	"	"	
<i>Surrogate: a,a,a-Trifluorotoluene</i>		81.5 %	80-120		"	"	"	"	
<i>Surrogate: 4-Bromofluorobenzene</i>		93.5 %	80-120		"	"	"	"	
<b>Monitor Well #2 (6J12013-02) Water</b>									
Benzene	ND	0.00100	mg/L	1	EJ61407	10/14/06	10/16/06	EPA 8021B	
Toluene	ND	0.00100	"	"	"	"	"	"	
Ethylbenzene	ND	0.00100	"	"	"	"	"	"	
Xylene (p/m)	ND	0.00100	"	"	"	"	"	"	
Xylene (o)	ND	0.00100	"	"	"	"	"	"	
<i>Surrogate: a,a,a-Trifluorotoluene</i>		88.5 %	80-120		"	"	"	"	
<i>Surrogate: 4-Bromofluorobenzene</i>		119 %	80-120		"	"	"	"	
<b>Monitor Well #3 (6J12013-03) Water</b>									
Benzene	ND	0.00100	mg/L	1	EJ61407	10/14/06	10/16/06	EPA 8021B	
Toluene	ND	0.00100	"	"	"	"	"	"	
Ethylbenzene	ND	0.00100	"	"	"	"	"	"	
Xylene (p/m)	ND	0.00100	"	"	"	"	"	"	
Xylene (o)	ND	0.00100	"	"	"	"	"	"	
<i>Surrogate: a,a,a-Trifluorotoluene</i>		84.8 %	80-120		"	"	"	"	
<i>Surrogate: 4-Bromofluorobenzene</i>		87.5 %	80-120		"	"	"	"	

Rice Operating Co.  
122 W. Taylor  
Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

**General Chemistry Parameters by EPA / Standard Methods**  
**Environmental Lab of Texas**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
<b>Monitor Well #1 (6J12013-01) Water</b>									
Total Alkalinity	488	2.00	mg/L	1	EJ61311	10/13/06	10/13/06	EPA 310.1M	
Chloride	10200	250	"	500	EJ61403	10/19/06	10/19/06	EPA 300.0	
Total Dissolved Solids	20200	10.0	"	1	EJ61404	10/14/06	10/15/06	EPA 160.1	
Sulfate	4570	250	"	500	EJ61403	10/19/06	10/19/06	EPA 300.0	
<b>Monitor Well #2 (6J12013-02) Water</b>									
Total Alkalinity	472	2.00	mg/L	1	EJ61311	10/13/06	10/13/06	EPA 310.1M	
Chloride	7910	250	"	500	EJ61403	10/19/06	10/19/06	EPA 300.0	
Total Dissolved Solids	18000	10.0	"	1	EJ61404	10/14/06	10/15/06	EPA 160.1	
Sulfate	4790	250	"	500	EJ61403	10/19/06	10/19/06	EPA 300.0	
<b>Monitor Well #3 (6J12013-03) Water</b>									
Total Alkalinity	556	2.00	mg/L	1	EJ61311	10/13/06	10/13/06	EPA 310.1M	
Chloride	13100	250	"	500	EJ61403	10/19/06	10/19/06	EPA 300.0	
Total Dissolved Solids	24000	10.0	"	1	EJ61404	10/14/06	10/15/06	EPA 160.1	
Sulfate	4570	250	"	500	EJ61403	10/19/06	10/19/06	EPA 300.0	

Rice Operating Co.  
122 W. Taylor  
Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

**Total Metals by EPA / Standard Methods**  
**Environmental Lab of Texas**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
<b>Monitor Well #1 (6J12013-01) Water</b>									
Calcium	495	4.05	mg/L	50	EJ61604	10/13/06	10/16/06	EPA 6010B	
Magnesium	233	1.80	"	"	"	"	"	"	
Potassium	275	3.00	"	"	"	"	"	"	
Sodium	7390	43.0	"	1000	"	"	"	"	
<b>Monitor Well #2 (6J12013-02) Water</b>									
Calcium	370	4.05	mg/L	50	EJ61604	10/13/06	10/16/06	EPA 6010B	
Magnesium	184	1.80	"	"	"	"	"	"	
Potassium	179	3.00	"	"	"	"	"	"	
Sodium	6410	43.0	"	1000	"	"	"	"	
<b>Monitor Well #3 (6J12013-03) Water</b>									
Calcium	595	4.05	mg/L	50	EJ61604	10/13/06	10/16/06	EPA 6010B	
Magnesium	328	1.80	"	"	"	"	"	"	
Potassium	360	3.00	"	"	"	"	"	"	
Sodium	9300	43.0	"	1000	"	"	"	"	

Rice Operating Co.  
122 W. Taylor  
Jobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

**Organics by GC - Quality Control**  
**Environmental Lab of Texas**

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

**Batch EJ61407 - EPA 5030C (GC)**

**Blank (EJ61407-BLK1)**

Prepared: 10/14/06 Analyzed: 10/15/06

Benzene	ND	0.00100	mg/L							
Toluene	ND	0.00100	"							
Ethylbenzene	ND	0.00100	"							
Xylene (p/m)	ND	0.00100	"							
Xylene (o)	ND	0.00100	"							
Surrogate: a,a,a-Trifluorotoluene	33.5		ug/l	40.0		83.8	80-120			
Surrogate: 4-Bromofluorobenzene	35.0		"	40.0		87.5	80-120			

**LCS (EJ61407-BS1)**

Prepared: 10/14/06 Analyzed: 10/15/06

Benzene	0.0451	0.00100	mg/L	0.0500		90.2	80-120			
Toluene	0.0430	0.00100	"	0.0500		86.0	80-120			
Ethylbenzene	0.0513	0.00100	"	0.0500		103	80-120			
Xylene (p/m)	0.0929	0.00100	"	0.100		92.9	80-120			
Xylene (o)	0.0423	0.00100	"	0.0500		84.6	80-120			
Surrogate: a,a,a-Trifluorotoluene	34.4		ug/l	40.0		86.0	80-120			
Surrogate: 4-Bromofluorobenzene	43.8		"	40.0		110	80-120			

**Vibration Check (EJ61407-CCV1)**

Prepared: 10/14/06 Analyzed: 10/17/06

Benzene	49.9		ug/l	50.0		99.8	80-120			
Toluene	43.1		"	50.0		86.2	80-120			
Ethylbenzene	42.0		"	50.0		84.0	80-120			
Xylene (p/m)	83.7		"	100		83.7	80-120			
Xylene (o)	41.2		"	50.0		82.4	80-120			
Surrogate: a,a,a-Trifluorotoluene	36.1		"	40.0		90.2	80-120			
Surrogate: 4-Bromofluorobenzene	34.3		"	40.0		85.8	80-120			

**Matrix Spike (EJ61407-MS1)**

Source: 6J12015-01

Prepared: 10/14/06 Analyzed: 10/17/06

Benzene	0.0501	0.00100	mg/L	0.0500	ND	100	80-120			
Toluene	0.0440	0.00100	"	0.0500	ND	88.0	80-120			
Ethylbenzene	0.0416	0.00100	"	0.0500	ND	83.2	80-120			
Xylene (p/m)	0.0914	0.00100	"	0.100	ND	91.4	80-120			
Xylene (o)	0.0427	0.00100	"	0.0500	ND	85.4	80-120			
Surrogate: a,a,a-Trifluorotoluene	35.5		ug/l	40.0		88.8	80-120			
Surrogate: 4-Bromofluorobenzene	40.2		"	40.0		100	80-120			

Rice Operating Co.  
 122 W. Taylor  
 Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
 Project Number: None Given  
 Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

**Organics by GC - Quality Control**  
**Environmental Lab of Texas**

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

**Batch EJ61407 - EPA 5030C (GC)**

**Matrix Spike Dup (EJ61407-MSD1)**

**Source: 6J12015-01**

Prepared: 10/14/06 Analyzed: 10/17/06

Benzene	0.0502	0.00100	mg/L	0.0500	ND	100	80-120	0.00	20	
Toluene	0.0442	0.00100	"	0.0500	ND	88.4	80-120	0.454	20	
Ethylbenzene	0.0412	0.00100	"	0.0500	ND	82.4	80-120	0.966	20	
Xylene (p/m)	0.0913	0.00100	"	0.100	ND	91.3	80-120	0.109	20	
Xylene (o)	0.0437	0.00100	"	0.0500	ND	87.4	80-120	2.31	20	
Surrogate: <i>a,a,a</i> -Trifluorotoluene	35.4		ug/l	40.0		88.5	80-120			
Surrogate: 4-Bromofluorobenzene	41.0		"	40.0		102	80-120			

Rice Operating Co.  
122 W. Taylor  
Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

**General Chemistry Parameters by EPA / Standard Methods - Quality Control**  
**Environmental Lab of Texas**

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

**Batch EJ61311 - General Preparation (WetChem)**

<b>Blank (EJ61311-BLK1)</b>										
Prepared & Analyzed: 10/13/06										
Total Alkalinity	ND	2.00	mg/L							
Carbonate Alkalinity	ND	0.100	"							
Bicarbonate Alkalinity	ND	2.00	"							
Hydroxide Alkalinity	ND	0.100	"							

<b>LCS (EJ61311-BS1)</b>										
Prepared: 10/13/06 Analyzed: 10/20/06										
Bicarbonate Alkalinity	196	2.00	mg/L	200		98.0	85-115			

<b>Duplicate (EJ61311-DUP1)</b>										
<b>Source: 6J12011-01</b> Prepared & Analyzed: 10/13/06										
Total Alkalinity	238	2.00	mg/L		242			1.67	20	

<b>Reference (EJ61311-SRM1)</b>										
Prepared & Analyzed: 10/13/06										
Total Alkalinity	250		mg/L	250		100	90-110			

**Batch EJ61403 - General Preparation (WetChem)**

<b>Blank (EJ61403-BLK1)</b>										
Prepared & Analyzed: 10/19/06										
Sulfate	ND	0.500	mg/L							
Chloride	ND	0.500	"							

<b>S (EJ61403-BS1)</b>										
Prepared & Analyzed: 10/19/06										
Sulfate	9.55	0.500	mg/L	10.0		95.5	80-120			
Chloride	9.62	0.500	"	10.0		96.2	80-120			

<b>Calibration Check (EJ61403-CCV1)</b>										
Prepared & Analyzed: 10/19/06										
Chloride	10.5		mg/L	10.0		105	80-120			
Sulfate	10.1		"	10.0		101	80-120			

Rice Operating Co.  
122 W. Taylor  
Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

**General Chemistry Parameters by EPA / Standard Methods - Quality Control**  
**Environmental Lab of Texas**

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

**Batch EJ61403 - General Preparation (WetChem)**

<b>Duplicate (EJ61403-DUP1)</b>		<b>Source: 6J12011-01</b>			Prepared & Analyzed: 10/19/06					
Chloride	1430	25.0	mg/L		1430			0.00	20	
Sulfate	291	25.0	"		308			5.68	20	
<b>Duplicate (EJ61403-DUP2)</b>		<b>Source: 6J12016-02</b>			Prepared & Analyzed: 10/19/06					
Chloride	690	12.5	mg/L		692			0.289	20	
Sulfate	236	12.5	"		237			0.423	20	
<b>Matrix Spike (EJ61403-MS1)</b>		<b>Source: 6J12011-01</b>			Prepared & Analyzed: 10/19/06					
Sulfate	781	25.0	mg/L	500	308	94.6	80-120			
Chloride	2040	25.0	"	500	1430	122	80-120			S-07
<b>Matrix Spike (EJ61403-MS2)</b>		<b>Source: 6J12016-02</b>			Prepared & Analyzed: 10/19/06					
Chloride	979	12.5	mg/L	250	692	115	80-120			
Sulfate	476	12.5	"	250	237	95.6	80-120			

**Batch EJ61404 - Filtration Preparation**

<b>Blank (EJ61404-BLK1)</b>					Prepared: 10/14/06 Analyzed: 10/15/06					
Total Dissolved Solids	ND	10.0	mg/L							
<b>Duplicate (EJ61404-DUP1)</b>		<b>Source: 6J12011-01</b>			Prepared: 10/14/06 Analyzed: 10/15/06					
Total Dissolved Solids	3380	10.0	mg/L		3260			3.61	5	
<b>Duplicate (EJ61404-DUP2)</b>		<b>Source: 6J12016-02</b>			Prepared: 10/14/06 Analyzed: 10/15/06					
Total Dissolved Solids	1850	10.0	mg/L		1900			2.67	5	

Rice Operating Co.  
 122 W. Taylor  
 Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
 Project Number: None Given  
 Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

**Total Metals by EPA / Standard Methods - Quality Control**  
**Environmental Lab of Texas**

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

**Batch EJ61604 - 6010B/No Digestion**

**Blank (EJ61604-BLK1)**

Prepared: 10/13/06 Analyzed: 10/16/06

Calcium	ND	0.0810	mg/L							
Magnesium	ND	0.0360	"							
Potassium	ND	0.0600	"							
Sodium	ND	0.0430	"							

**Calibration Check (EJ61604-CCV1)**

Prepared: 10/13/06 Analyzed: 10/16/06

Calcium	1.99		mg/L	2.00		99.5	85-115			
Magnesium	2.20		"	2.00		110	85-115			
Potassium	1.94		"	2.00		97.0	85-115			
Sodium	1.79		"	2.00		89.5	85-115			

**Duplicate (EJ61604-DUP1)**

Source: 6J12001-04

Prepared: 10/13/06 Analyzed: 10/16/06

Calcium	0.426	0.0810	mg/L		0.427			0.234	20	
Magnesium	0.432	0.0360	"		0.422			2.34	20	
Potassium	0.596	0.0600	"		0.582			2.38	20	
Sodium	0.890	0.0430	"		0.866			2.73	20	

Rice Operating Co.  
122 W. Taylor  
Jobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

### Notes and Definitions

S-07 Recovery outside Laboratory historical or method prescribed limits.  
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  
RPD Relative Percent Difference  
LCS Laboratory Control Spike  
MS Matrix Spike  
Dup Duplicate

Report Approved By:

*Raland K Tuttle*

Date: 10/24/2006

Raland K. Tuttle, Lab Manager  
Celey D. Keene, Lab Director, Org. Tech Director  
Peggy Allen, QA Officer

Jeanne Mc Murrey, Inorg. Tech Director  
LaTasha Cornish, Chemist  
Sandra Sanchez, Lab Tech.

This material is intended only for the use of the individual (s) or entity to whom it is addressed, and may contain information that is privileged and confidential.

If you have received this material in error, please notify us immediately at 432-563-1800.



**Environmental Lab of Texas**  
 Variance/ Corrective Action Report- Sample Log-In

Client: Rice Dr.  
 Date/Time: 10/12/06 4:00  
 Sample ID #: 65120/3  
 Details: OK

**Sample Receipt Checklist**

	Yes	No	Client Initials
Temperature of container/ cooler?			2.0 °C
Shipping container in good condition?	<del>Yes</del>	No	
Custody Seals intact on shipping container/ cooler?	<del>Yes</del>	No	Not Present
Custody Seals intact on sample bottles/ container?	<del>Yes</del>	No	Not Present
Chain of Custody present?	<del>Yes</del>	No	
Sample instructions complete of Chain of Custody?	<del>Yes</del>	No	
Chain of Custody signed when relinquished/ received?	<del>Yes</del>	No	
Chain of Custody agrees with sample label(s)?	<del>Yes</del>	No	ID written on Cont./ Lid
Container label(s) legible and intact?	<del>Yes</del>	No	Not Applicable
Sample matrix/ properties agree with Chain of Custody?	<del>Yes</del>	No	
Containers supplied by ELOT?	<del>Yes</del>	No	
Samples in proper container/ bottle?	<del>Yes</del>	No	See Below
Samples properly preserved?	<del>Yes</del>	No	See Below
Sample bottles intact?	<del>Yes</del>	No	
Preservations documented on Chain of Custody?	<del>Yes</del>	No	
Containers documented on Chain of Custody?	<del>Yes</del>	No	
Sufficient sample amount for indicated test(s)?	<del>Yes</del>	No	See Below
All samples received within sufficient hold time?	<del>Yes</del>	No	See Below
VOC samples have zero headspace?	<del>Yes</del>	No	Not Applicable

**Variance Documentation**

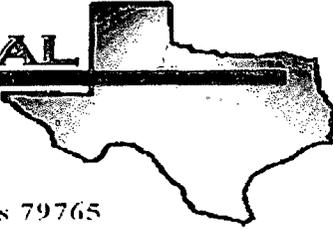
Contact: \_\_\_\_\_ Contacted by: \_\_\_\_\_ Date/ Time: \_\_\_\_\_

Regarding: \_\_\_\_\_

Corrective Action Taken: \_\_\_\_\_  
 \_\_\_\_\_  
 \_\_\_\_\_

- Check all that Apply:
- See attached e-mail/ fax
  - Client understands and would like to proceed with analysis
  - Cooling process had begun shortly after sampling event

**E** NVIRONMENTAL  
LAB OF



12600 West I-20 East - Odessa, Texas 79765

## Analytical Report

**Prepared for:**

Kristin Farris-Pope

Rice Operating Co.

122 W. Taylor

Hobbs, NM 88240

Project: EME Jct. D-1 Leak

Project Number: None Given

Location: T20S-R36E-SecD 1, Lea County NM

Lab Order Number: 6L27020

Report Date: 01/05/07

Rice Operating Co.  
122 W. Taylor  
Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

**ANALYTICAL REPORT FOR SAMPLES**

Sample ID	Laboratory ID	Matrix	Date Sampled	Date Received
MW-# 4	6L27020-01	Water	12/22/06 09:10	12-27-2006 15:45

Rice Operating Co.  
122 W. Taylor  
Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

**Organics by GC**  
**Environmental Lab of Texas**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
<b>MW-# 4 (6L27020-01) Water</b>									
Benzene	ND	0.00100	mg/L	1	EL63102	12/31/06	01/02/07	EPA 8021B	
Toluene	ND	0.00100	"	"	"	"	"	"	
Ethylbenzene	ND	0.00100	"	"	"	"	"	"	
Xylene (p/m)	ND	0.00100	"	"	"	"	"	"	
Xylene (o)	ND	0.00100	"	"	"	"	"	"	
Surrogate: <i>a,a,a</i> -Trifluorotoluene		102 %	80-120		"	"	"	"	
Surrogate: 4-Bromofluorobenzene		88.0 %	80-120		"	"	"	"	

Rice Operating Co.  
122 W. Taylor  
Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

**General Chemistry Parameters by EPA / Standard Methods**  
**Environmental Lab of Texas**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
<b>MW-# 4 (6L27020-01) Water</b>									
<b>Total Alkalinity</b>	<b>480</b>	20.0	mg/L	10	EL62804	12/28/06	12/28/06	EPA 310.1M	B
<b>Chloride</b>	<b>12900</b>	250	"	500	EL62904	12/29/06	12/29/06	EPA 300.0	
<b>Total Dissolved Solids</b>	<b>22700</b>	10.0	"	1	EL62801	12/28/06	12/29/06	EPA 160.1	
<b>Sulfate</b>	<b>4440</b>	250	"	500	EL62904	12/29/06	12/29/06	EPA 300.0	

Rice Operating Co.  
122 W. Taylor  
Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

**Total Metals by EPA / Standard Methods**  
**Environmental Lab of Texas**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
<b>MW-# 4 (6L27020-01) Water</b>									
Calcium	472	20.2	mg/L	250	EL62806	12/28/06	12/28/06	EPA 6010B	
Magnesium	279	9.00	"	"	"	"	"	"	
Potassium	210	3.00	"	50	"	"	"	"	
Sodium	10200	215	"	5000	"	"	"	"	

Rice Operating Co.  
122 W. Taylor  
Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

**Organics by GC - Quality Control**  
**Environmental Lab of Texas**

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

**Batch EL63102 - EPA 5030C (GC)**

**Blank (EL63102-BLK1)**

Prepared: 12/31/06 Analyzed: 01/01/07

Benzene	ND	0.00100	mg/L							
Toluene	ND	0.00100	"							
Ethylbenzene	ND	0.00100	"							
Xylene (p/m)	ND	0.00100	"							
Xylene (o)	ND	0.00100	"							
Surrogate: a,a,a-Trifluorotoluene	32.5		ug/l	40.0		81.2	80-120			
Surrogate: 4-Bromofluorobenzene	35.2		"	40.0		88.0	80-120			

**LCS (EL63102-BS1)**

Prepared: 12/31/06 Analyzed: 01/01/07

Benzene	0.0421	0.00100	mg/L	0.0500		84.2	80-120			
Toluene	0.0413	0.00100	"	0.0500		82.6	80-120			
Ethylbenzene	0.0424	0.00100	"	0.0500		84.8	80-120			
Xylene (p/m)	0.0832	0.00100	"	0.100		83.2	80-120			
Xylene (o)	0.0410	0.00100	"	0.0500		82.0	80-120			
Surrogate: a,a,a-Trifluorotoluene	32.0		ug/l	40.0		80.0	80-120			
Surrogate: 4-Bromofluorobenzene	44.0		"	40.0		110	80-120			

**Calibration Check (EL63102-CCV1)**

Prepared: 12/31/06 Analyzed: 01/02/07

Benzene	46.4		ug/l	50.0		92.8	80-120			
Toluene	47.2		"	50.0		94.4	80-120			
Ethylbenzene	47.9		"	50.0		95.8	80-120			
Xylene (p/m)	91.8		"	100		91.8	80-120			
Xylene (o)	45.2		"	50.0		90.4	80-120			
Surrogate: a,a,a-Trifluorotoluene	43.2		"	40.0		108	80-120			
Surrogate: 4-Bromofluorobenzene	33.1		"	40.0		82.8	80-120			

**Matrix Spike (EL63102-MS1)**

Source: 6L22002-44

Prepared: 12/31/06 Analyzed: 01/02/07

Benzene	0.0468	0.00100	mg/L	0.0500	ND	93.6	80-120			
Toluene	0.0489	0.00100	"	0.0500	ND	97.8	80-120			
Ethylbenzene	0.0468	0.00100	"	0.0500	ND	93.6	80-120			
Xylene (p/m)	0.108	0.00100	"	0.100	ND	108	80-120			
Xylene (o)	0.0517	0.00100	"	0.0500	ND	103	80-120			
Surrogate: a,a,a-Trifluorotoluene	44.1		ug/l	40.0		110	80-120			
Surrogate: 4-Bromofluorobenzene	39.0		"	40.0		97.5	80-120			

Environmental Lab of Texas

*The results in this report apply to the samples analyzed in accordance with the samples received in the laboratory. This analytical report must be reproduced in its entirety, with written approval of Environmental Lab of Texas.*

Page 5 of 10

Rice Operating Co.  
 122 W. Taylor  
 Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
 Project Number: None Given  
 Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

**Organics by GC - Quality Control**  
**Environmental Lab of Texas**

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

**Batch EL63102 - EPA 5030C (GC)**

**Matrix Spike Dup (EL63102-MSD1)**

**Source: 6L22002-44**

Prepared: 12/31/06 Analyzed: 01/02/07

Benzene	0.0587	0.00100	mg/L	0.0500	ND	117	80-120	22.2	20	R
Toluene	0.0598	0.00100	"	0.0500	ND	120	80-120	20.4	20	R
Ethylbenzene	0.0579	0.00100	"	0.0500	ND	116	80-120	21.4	20	R
Xylene (p/m)	0.120	0.00100	"	0.100	ND	120	80-120	10.5	20	
Xylene (o)	0.0596	0.00100	"	0.0500	ND	119	80-120	14.4	20	
Surrogate: a,a,a-Trifluorotoluene	46.9		ug/l	40.0		117	80-120			
Surrogate: 4-Bromofluorobenzene	46.7		"	40.0		117	80-120			

Rice Operating Co.  
122 W. Taylor  
Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

**General Chemistry Parameters by EPA / Standard Methods - Quality Control**  
**Environmental Lab of Texas**

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

**Batch EL62801 - Filtration Preparation**

**Blank (EL62801-BLK1)** Prepared: 12/28/06 Analyzed: 12/29/06

Total Dissolved Solids ND 10.0 mg/L

**Duplicate (EL62801-DUP1)** Source: 6L27020-01 Prepared: 12/28/06 Analyzed: 12/29/06

Total Dissolved Solids 26600 10.0 mg/L 22700 15.8 20

**Batch EL62804 - General Preparation (WetChem)**

**Blank (EL62804-BLK1)** Prepared & Analyzed: 12/28/06

Total Alkalinity 6.00 4.00 mg/L B

**LCS (EL62804-BS1)** Prepared & Analyzed: 12/28/06

Total Alkalinity 180 4.00 mg/L 200 90.0 85-115 B

Bicarbonate Alkalinity 180 4.00 " 200 90.0 85-115 B

**Duplicate (EL62804-DUP1)** Source: 6L27020-01 Prepared & Analyzed: 12/28/06

Total Alkalinity 510 20.0 mg/L 480 6.06 20 B

**Reference (EL62804-SRM1)** Prepared & Analyzed: 12/28/06

Total Alkalinity 244 4.00 mg/L 250 97.6 90-110 B

**Batch EL62904 - General Preparation (WetChem)**

**Blank (EL62904-BLK1)** Prepared & Analyzed: 12/29/06

Chloride ND 0.500 mg/L

Sulfate ND 0.500 "

Rice Operating Co.  
122 W. Taylor  
Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

**General Chemistry Parameters by EPA / Standard Methods - Quality Control**  
**Environmental Lab of Texas**

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
<b>Batch EL62904 - General Preparation (WetChem)</b>										
<b>LCS (EL62904-BS1)</b>				Prepared & Analyzed: 12/29/06						
Sulfate	10.1	0.500	mg/L	10.0		101	80-120			
Chloride	10.0	0.500	"	10.0		100	80-120			
<b>Calibration Check (EL62904-CCV1)</b>				Prepared & Analyzed: 12/29/06						
Sulfate	12.0		mg/L	10.0		120	80-120			
Chloride	9.07		"	10.0		90.7	80-120			
<b>Duplicate (EL62904-DUP1)</b>		<b>Source: 6L27006-01</b>		Prepared & Analyzed: 12/29/06						
Sulfate	241	25.0	mg/L		234			2.95	20	
Chloride	750	25.0	"		730			2.70	20	
<b>Duplicate (EL62904-DUP2)</b>		<b>Source: 6L27017-09</b>		Prepared & Analyzed: 12/29/06						
Chloride	66.0	5.00	mg/L		68.0			2.99	20	
Sulfate	76.7	5.00	"		77.7			1.30	20	
<b>Matrix Spike (EL62904-MS1)</b>		<b>Source: 6L27006-01</b>		Prepared & Analyzed: 12/29/06						
Chloride	1320	25.0	mg/L	500	730	118	80-120			
Sulfate	765	25.0	"	500	234	106	80-120			
<b>Matrix Spike (EL62904-MS2)</b>		<b>Source: 6L27017-09</b>		Prepared & Analyzed: 12/29/06						
Chloride	175	5.00	mg/L	100	68.0	107	80-120			
Sulfate	178	5.00	"	100	77.7	100	80-120			

Rice Operating Co.  
 122 W. Taylor  
 Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
 Project Number: None Given  
 Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

**Total Metals by EPA / Standard Methods - Quality Control**  
**Environmental Lab of Texas**

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

**Batch EL62806 - 6010B/No Digestion**

**Blank (EL62806-BLK1)**

Prepared & Analyzed: 12/28/06

Calcium	ND	0.0810	mg/L							
Magnesium	ND	0.0360	"							
Potassium	ND	0.0600	"							
Sodium	ND	0.0430	"							

**Calibration Check (EL62806-CCV1)**

Prepared & Analyzed: 12/28/06

Calcium	2.00		mg/L	2.00		100	85-115			
Magnesium	2.11		"	2.00		106	85-115			
Potassium	1.72		"	2.00		86.0	85-115			
Sodium	1.89		"	2.00		94.5	85-115			

**Duplicate (EL62806-DUP1)**

Source: 6L27020-01

Prepared & Analyzed: 12/28/06

Calcium	515	20.2	mg/L	472				8.71	20	
Magnesium	302	9.00	"	279				7.92	20	
Potassium	238	3.00	"	210				12.5	20	
Sodium	13100	215	"	10200				24.9	20	

Environmental Lab of Texas

*The results in this report apply to the samples analyzed in accordance with the samples received in the laboratory. This analytical report must be reproduced in its entirety, with written approval of Environmental Lab of Texas.*

Page 9 of 10

Rice Operating Co.  
122 W. Taylor  
Hobbs NM, 88240

Project: EME Jct. D-1 Leak  
Project Number: None Given  
Project Manager: Kristin Farris-Pope

Fax: (505) 397-1471

### Notes and Definitions

R The RPD exceeded the method control limit. The individual analyte QA/QC recoveries, however, were within acceptance limits.

B Analyte is found in the associated blank as well as in the sample (CLP B-flag).

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

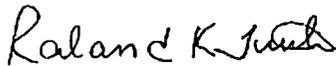
RPD Relative Percent Difference

LCS Laboratory Control Spike

MS Matrix Spike

Dup Duplicate

Report Approved By:



Date: 1/5/2007

Raland K. Tuttle, Lab Manager  
Celey D. Keene, Lab Director, Org. Tech Director  
Peggy Allen, QA Officer

Jeanne Mc Murrey, Inorg. Tech Director  
LaTasha Cornish, Chemist  
Sandra Sanchez, Lab Tech.

This material is intended only for the use of the individual (s) or entity to whom it is addressed, and may contain information that is privileged and confidential.

If you have received this material in error, please notify us immediately at 432-563-1800.



**Environmental Lab of Texas**  
 Variance/ Corrective Action Report- Sample Log-In

Client: Rice Operating  
 Date/ Time: 12-27-06 / 1545  
 Lab ID #: GL 27020 -  
 Initials: MT

**Sample Receipt Checklist**

				Client Initials
#1	Temperature of container/ cooler?	<input checked="" type="radio"/> Yes	<input type="radio"/> No	2.0 °C
#2	Shipping container in good condition?	<input checked="" type="radio"/> Yes	<input type="radio"/> No	
#3	Custody Seals intact on shipping container/ cooler?	<input checked="" type="radio"/> Yes	<input type="radio"/> No	Not Present
#4	Custody Seals intact on sample bottles/ container?	<input checked="" type="radio"/> Yes	<input type="radio"/> No	Not Present
#5	Chain of Custody present?	<input checked="" type="radio"/> Yes	<input type="radio"/> No	
#6	Sample instructions complete of Chain of Custody?	<input checked="" type="radio"/> Yes	<input type="radio"/> No	
#7	Chain of Custody signed when relinquished/ received?	<input checked="" type="radio"/> Yes	<input type="radio"/> No	
#8	Chain of Custody agrees with sample label(s)?	<input checked="" type="radio"/> Yes	<input type="radio"/> No	ID written on Cont./ Lid
#9	Container label(s) legible and intact?	<input checked="" type="radio"/> Yes	<input type="radio"/> No	Not Applicable
#10	Sample matrix/ properties agree with Chain of Custody?	<input checked="" type="radio"/> Yes	<input type="radio"/> No	
#11	Containers supplied by ELOT?	<input checked="" type="radio"/> Yes	<input type="radio"/> No	
#12	Samples in proper container/ bottle?	<input checked="" type="radio"/> Yes	<input type="radio"/> No	See Below
#13	Samples properly preserved?	<input checked="" type="radio"/> Yes	<input type="radio"/> No	See Below
#14	Sample bottles intact?	<input checked="" type="radio"/> Yes	<input type="radio"/> No	
#15	Preservations documented on Chain of Custody?	<input checked="" type="radio"/> Yes	<input type="radio"/> No	
#16	Containers documented on Chain of Custody?	<input checked="" type="radio"/> Yes	<input type="radio"/> No	
#17	Sufficient sample amount for indicated test(s)?	<input checked="" type="radio"/> Yes	<input type="radio"/> No	See Below
#18	All samples received within sufficient hold time?	<input checked="" type="radio"/> Yes	<input type="radio"/> No	See Below
#19	Subcontract of sample(s)?	<input checked="" type="radio"/> Yes	<input type="radio"/> No	Not Applicable
#20	VOC samples have zero headspace?	<input checked="" type="radio"/> Yes	<input type="radio"/> No	Not Applicable

**Variance Documentation**

Contact: \_\_\_\_\_ Contacted by: \_\_\_\_\_ Date/ Time: \_\_\_\_\_

Regarding: \_\_\_\_\_

Corrective Action Taken: \_\_\_\_\_

- Check all that Apply:
- See attached e-mail/ fax
  - Client understands and would like to proceed with analysis
  - Cooling process had begun shortly after sampling event