1R – 427 - 43

REPORTS

DATE:

2-18-2004

FINAL

REPORT

RICE OPERATING COMPANY
JUNCTION BOX FINAL REPORT

BOX LOCATION

SWD SYSTEM	JUNCTION	UNIT	SECTION	TOWNSHIP	RANGE	COUNTY	BOX DIMENSIONS - FEET		
							Length	Width	Depth
EME	I-12	I	12	21S	35E	Lea	Moved 30 ft north		

LAND TYPE: BLM _____ STATE _____ FEE LANDOWNER Merchant Livestock Co. OTHER _____

Depth to Groundwater 133 feet NMOCD SITE ASSESSMENT RANKING SCORE: 0

Date Started 8/14/2003 Date Completed 10/17/2003 OCD Witness No

Soil Excavated 12 cubic yards Excavation Length 3 Width 8 Depth 14 feet

Soil Disposed 0 cubic yards Offsite Facility n/a Location n/a

FINAL ANALYTICAL RESULTS: **Sample Date** 9/18/2003 **Sample Depth** soil bores as stated

Chloride laboratory test results completed by using an approved lab and testing procedures pursuant to NMOCD guidelines.

Sample Location	Chloride mg/kg
Bore 14 ft South @ 42 ft	674
Bore 10 ft East @ 44 ft	603

CHLORIDE FIELD TESTS

LOCATION	DEPTH (ft)	ppm
Vertical	8	862
w/backhoe	10	1192
	12	1194
	13	1191
	14	879
Bore 14 ft South	20	1376
	26	1407
	28	1309
	34	969
	38	797
	42	842
Bore 10 ft East	20	1538
	24	1713
	28	803
	32	1199
	36	1039
	38	691
	42	713

General Description of Remedial Action: Vertical delineation with a backhoe at the old junction box site did not yield a sufficient decline in chloride concentrations. PID readings indicated minimal VOC's. The site was drilled and delineated for chloride impact. The bores indicated a conclusive decline in chloride concentrations well before groundwater was encountered (see graphs). A compacted clay barrier was installed at 6 ft bgs and the hole was backfilled with the excavated soil that was landfarmed on-site. The surface was leveled and contoured to the surrounding terrain. On 12/12/2003, the site was re-seeded with a seed blend of native vegetation and will be monitored for growth. This junction has been moved 30 ft north and a water-tight box has been built over it.

enclosed: lab results, chloride graphs, PID reading, photos, clay compaction test

I HEREBY CERTIFY THAT THE INFORMATION ABOVE IS TRUE AND COMPLETE TO THE BEST OF MY KNOWLEDGE AND BELIEF.

DATE 2/18/2004 PRINTED NAME Kristin Farris

SIGNATURE Kristin Farris TITLE Project Scientist

EME jct. I-12

Old junction site in foreground; new junction 30 ft north in background (backhoe) 8/5/2003

Beginning excavation & delineation at old junction box site 8/14/2003

Soil bore for chloride delineation 9/18/2003

Compaction & density test of clay barrier at 6 ft 10/2/2003

Identification plate marking clay barrier

Seeding disturbed surface 12/12/2003

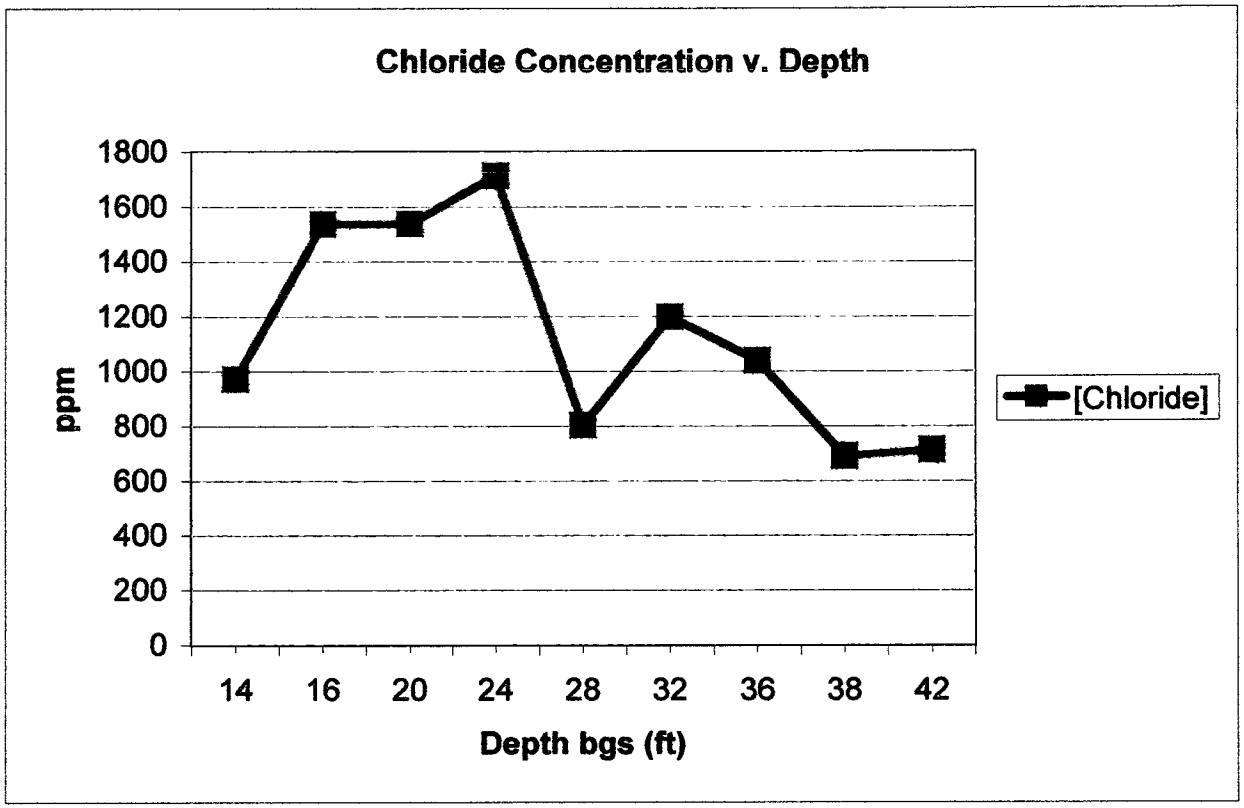
EME jct. I-12

T21S, R35E

10 ft East of Junction

Depth bgs (ft)	[Cl⁻] ppm
14	972
16	1536
20	1538
24	1713
28	803
32	1199
36	1039
38	691
42	713

Groundwater = 133 ft



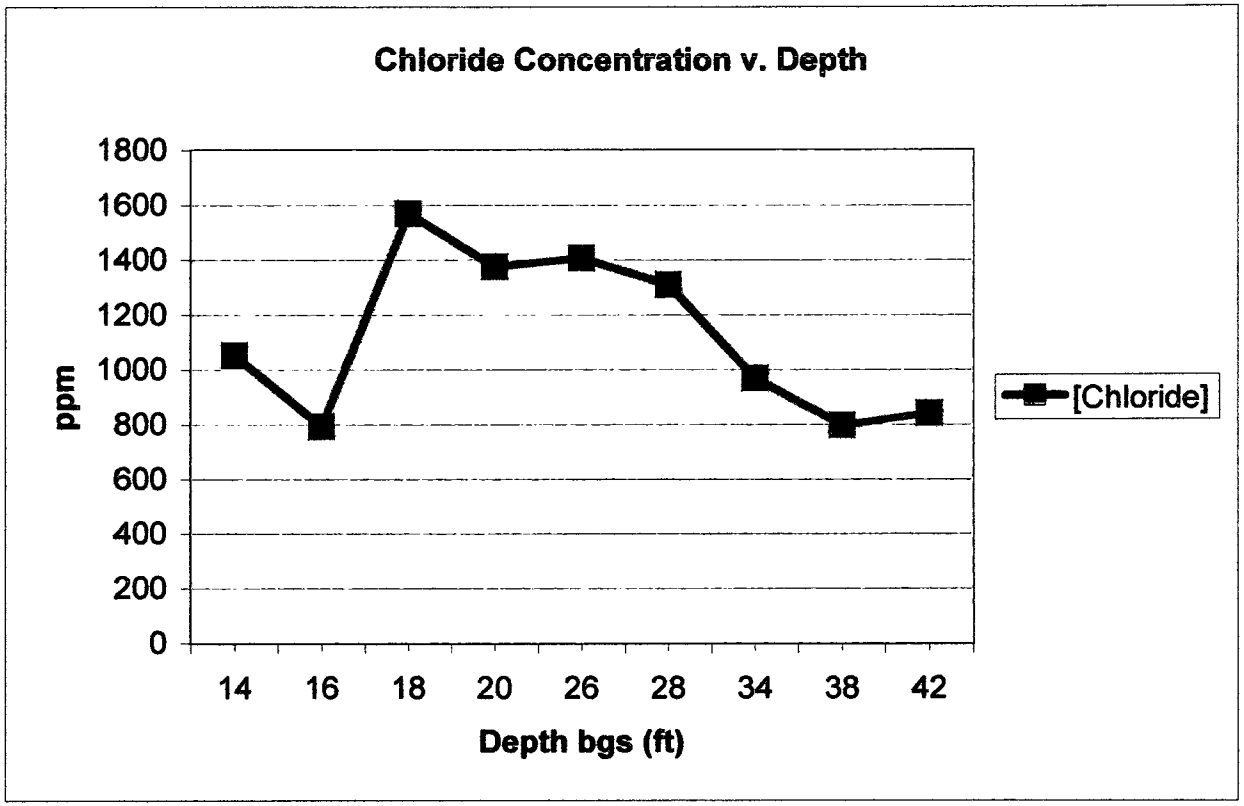
EME jct. I-12

T21S, R35E

14 ft South of Junction

Depth bgs (ft)	[Cl⁻] ppm
14	1053
16	793
18	1569
20	1376
26	1407
28	1309
34	969
38	797
42	842

Groundwater = 133 ft



ANALYTICAL REPORT

Prepared for:

Kristin Farris
Rice Operating
122 W. Taylor
Hobbs, NM 88240

Project:	EME I-12
PO#:	
Order#:	G0307651
Report Date:	10/08/2003

Certificates
US EPA Laboratory Code TX00158

ENVIRONMENTAL LAB OF TEXAS

SAMPLE WORK LIST

Rice Operating
122 W. Taylor
Hobbs, NM 88240
505-397-1471

Order#: G0307651
Project: Bore Samples
Project Name: EME I-12
Location: None Given

The samples listed below were submitted to Environmental Lab of Texas and were received under chain of custody. Environmental Lab of Texas makes no representation or certification as to the method of sample collection, sample identification, or transportation/handling procedures used prior to the receipt of samples by Environmental Lab of Texas, unless otherwise noted.

Lab ID:	Sample :	Matrix:	Date / Time Collected	Date / Time Received	Container	Preservative
0307651-01	Source @ 42'	SOIL	9/18/03 10:30	10/6/03 8:00	Plastic Bag	ice
	Lab Testing: Chloride	**Rejected:** No		**Temp:** 4.0 C		
0307651-02	10' E. Source @ 44'	SOIL	9/18/03 14:30	10/6/03 8:00	Plastic Bag	ice
	Lab Testing: Chloride	**Rejected:** No		**Temp:** 4.0 C		

ENVIRONMENTAL LAB OF TEXAS

ANALYTICAL REPORT

Kristin Farris		Order#:	G0307651
Rice Operating		Project:	Bore Samples
122 W. Taylor		Project Name:	EME I-12
Hobbs, NM 88240		Location:	None Given

Lab ID: 0307651-01
Sample ID: Source @ 42'

Test Parameters

Parameter	Result	Units	Dilution Factor	RL	Method	Date Analyzed	Analyst
Chloride	674	mg/kg	1	20	9253	10/7/03	SB

Lab ID: 0307651-02
Sample ID: 10' E. Source @ 44'

Test Parameters

Parameter	Result	Units	Dilution Factor	RL	Method	Date Analyzed	Analyst
Chloride	603	mg/kg	1	20	9253	10/7/03	SB

Approval: Celey D. Keene 10/9/03
Date

Raland K. Tuttle, Lab Director, QA Officer
Celey D. Keene, Org. Tech. Director
Jeanne McMurrey, Inorg. Tech. Director
Sandra Biezugbe, Lab Tech.
Sara Molina, Lab Tech.

RL = Reporting Limit N/A = Not Applicable

ENVIRONMENTAL LAB OF TEXAS I, LTD. 12600 West I-20 East, Odessa, TX 79765 Ph: 915-563-1800

ENVIRONMENTAL LAB OF TEXAS

QUALITY CONTROL REPORT

Test Parameters

Order#: G0307651

BLANK SOIL	LAB-ID #	Sample Concentr.	Spike Concentr.	QC Test Result	Pct (%) Recovery	RPD
Chloride-mg/kg	0007064-01			<20		
MS SOIL	**LAB-ID #**	**Sample Concentr.**	**Spike Concentr.**	**QC Test Result**	**Pct (%) Recovery**	**RPD**
Chloride-mg/kg	0307648-01	1030	500	1540	102.%	
MSD SOIL	**LAB-ID #**	**Sample Concentr.**	**Spike Concentr.**	**QC Test Result**	**Pct (%) Recovery**	**RPD**
Chloride-mg/kg	0307648-01	1030	500	1560	106.%	1.3%
SRM SOIL	**LAB-ID #**	**Sample Concentr.**	**Spike Concentr.**	**QC Test Result**	**Pct (%) Recovery**	**RPD**
Chloride-mg/kg	0007064-04		5000	4960	99.2%	

Environmental Lab of Texas, Inc.

12600 West I-20 East
Odessa, Texas 79763
Phone: 915-563-1800
Fax: 915-563-1713

CHAIN OF CUSTODY RECORD AND ANALYSIS REQUEST

Project Manager: KRISTIN FARRIS
Company Name: RICE OPER. Co.
Company Address: 122 W. TAYLOR
City/State/Zip: Hobbs, N.M. 88240
Telephone No: 505-393-9174 Fax No: 505-397-1471
Sampler Signature:

Project Name: EME I-12
Project #: BORE SAMPLES
Project Loc:
PO #:

Analyze For:

0307631 LAB # (lab use only)	FIELD CODE	Date Sampled	Time Sampled	No. of Containers	Preservative: Ice	Preservative: HNO_3	Preservative: HCl	Preservative: NaOH	Preservative: H_2SO_4	Preservative: None	Preservative: Other (Specify)	Matrix: Water	Matrix: Sludge	Matrix: Soil	Matrix: Other (specify):	TCLP: TDS / CL / SAR / EC	TCLP: TPH 418.1	TCLP: TPH TX 1005/1006	TCLP: TPH 8015M GRO/DRO	TCLP: Metals: As Ag Ba Cd Cr Pb Hg Se	TCLP: Volatiles	TCLP: Semivolatiles	TCLP: BTEX 8021B/5030	TOTAL: Cl-	RUSH TAT (Pre-Schedule)	Standard TAT
01	SOURCE @ 42'	9-18-03	1030	1	✓									✓										✓		
02	10' E. SOURCE @ 44'	9-18-03	230	1	✓									✓										✓		

Special Instructions:

Sample Containers Intact? Y N
Temperature Upon Receipt:
Laboratory Comments:
4°C Plastic bag

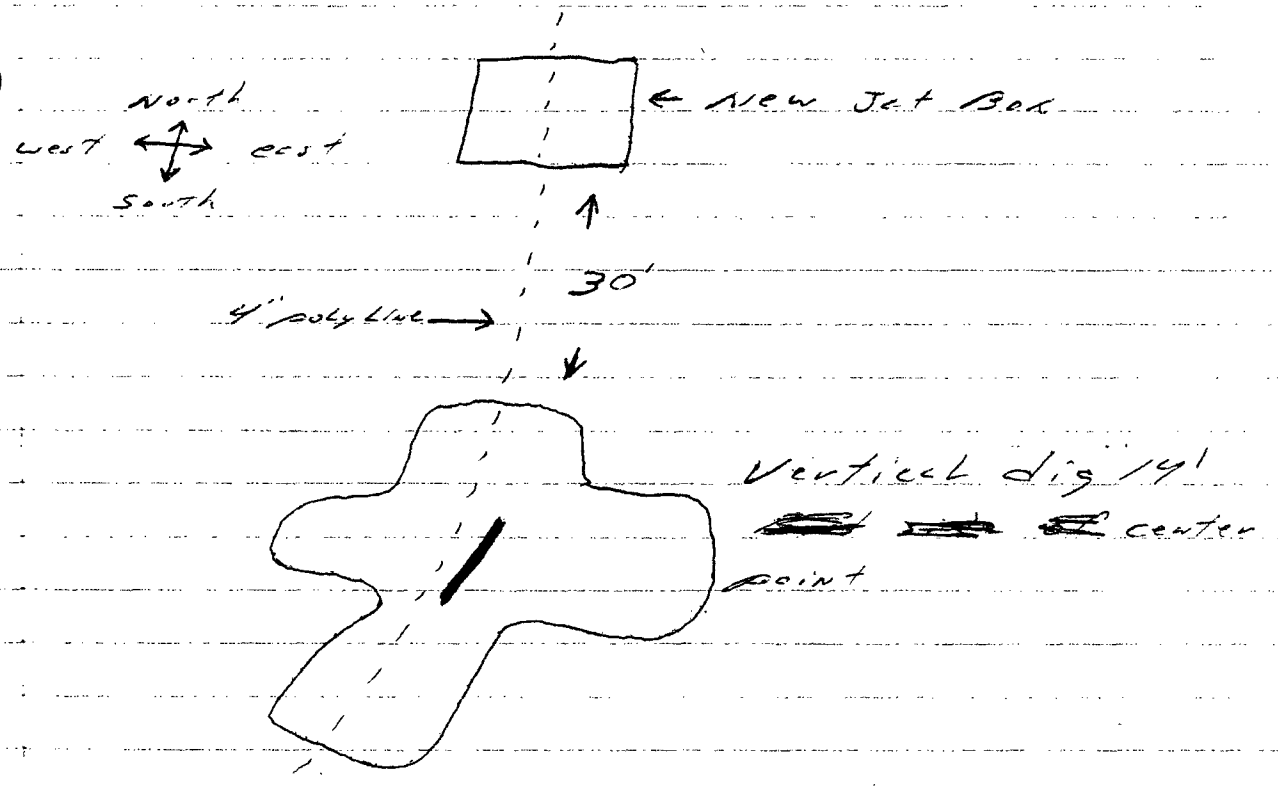
Relinquished by:	Date	Time	Received by:	Date	Time
Relinquished by:	Date	Time	Received by ELOT:	Date	Time
[signature]	10/3/03	19:42	[signature]	10/6/03	0802

8-14-03 ETGI

EME I-12

Vertical dig 14'

7'	651 ppm	Red clay
8'	862 ppm	Red clay Grey Sand
9'	908 ppm	Grey Sand
10'	1192 ppm	Grey Sand
11'	858 ppm	Grey Sand
12'	1194 ppm	Grey Sand
13'	1191 ppm	Grey Sand
14'	829 ppm	PID 93.4 Grey Sand



LABORATORY TEST REPORT

PETTIGREW and ASSOCIATES, P.A.

1110 N. GRIMES
HOBBS, NM 88240
(505) 393-9827

AASHTO R18

DEBRA P. HICKS, P.E./L.S.I.
WILLIAM M. HICKS. III, P.E./P.S.

To: Rice Operating Corporation
Attn: Carolyn Haynes
122 W. Taylor
Hobbs, NM 88240

Material: Red Clay

Test Method: ASTM: D 2922

Project: EME- I 12

Date of Test: October 2, 2003

Depth: Finished Subgrade

Test No.	Location	Dry Density % Maximum	% Moisture	Depth
SG-1	Pit - 10' N. & 5' W. of the SE Corner	103.0	18.4	

Control Density: 104.2
ASTM: D 698

Optimum Moisture: 23.1%

Required Compaction: 95%

Lab No.: 03 6230-6231

Copies To: Rice Operating

PETTIGREW and ASSOCIATES

BY: S.E.T.