1R - 426-209

REPORTS

DATE:

1-20-09

BD Jct A-1-1

1R426-209

DISCLOSURE

RICE OPERATING COMPANY
JUNCTION BOX DISCLOSURE* REPORT

BOX LOCATION

SWD SYSTEM	JUNCTION	UNIT	SECTION	TOWNSHIP	RANGE	COUNTY	BOX DIMENSIONS - FEET		
							Length 9'	Width 7'	Depth 6'
Blinebry-Drinkard (BD)	Jct. A-1-1	A	1	22S	36E	Lea	eliminated		

LAND TYPE: BLM ___ STATE ___ FEE LANDOWNER Nymeyer Property OTHER ___

Depth to Groundwater 137 feet NMOCD SITE ASSESSMENT RANKING SCORE: 20

Date Started 12/4/2007 Date Completed 5/1/2008 OCD Witness no

Soil Excavated 389 cubic yards Excavation Length 35 Width 25 Depth 12 feet

Soil Disposed 108 cubic yards Offsite Facility Sundance Location Eunice, NM

FINAL ANALYTICAL RESULTS: **Sample Date** 12/19/2007, 4/30/2008 **Sample Depth** 12 ft, 120 ft

Procure 5-point composite sample of bottom and 4-point composite sample of sidewalls. TPH and Chloride laboratory test results completed by using an approved lab and testing procedures pursuant to NMOCD guidelines.

Sample Location	PID (field) ppm	GRO mg/kg	DRO mg/kg	Chlorides mg/kg
4-WALL COMP.	0.0	<10.0	<10.0	2,511
BOTTOM COMP.	0.4	<10.0	<10.0	1,584
BACKFILL COMP.	0.0	<10.0	19.6	1,855
SOIL BORING #1 25 ft grab				1,900
SOIL BORING #1 120 ft grab				288

CHLORIDE FIELD TESTS

LOCATION	DEPTH	mg/kg
4-wall comp.	n/a	1,530
bottom comp.	12'	1,130
backfill comp.	n/a	1,600
background	6"	140
SOIL BORING #1 at the former junction (source) 4/30/2008	15'	1,299
	20'	2,195
	25'	2,089
	30'	1,026
	35'	731
	40'	834
	45'	1,136
	50'	1,303
	55'	1,212
	60'	1,530
	65'	1,357
	70'	1,311
	75'	1,003
	80'	804
	85'	900
	90'	631
	95'	762
	100'	997
	105'	600
	110'	403
	115'	339
	120'	364

General Description of Remedial Action: This junction was eliminated during the pipeline replacement/upgrade program. After the former junction box was removed, an investigation was conducted using a backhoe to collect soil samples at regular intervals producing a 35x25x12-ft-deep excavation. Chloride field tests performed on each sample yielded elevated concentrations that did not relent with depth. Organic vapors were measured using a PID, which yielded low concentrations. Representative composite samples were sent to a commercial laboratory for analysis of chloride and TPH, which confirmed elevated chloride concentrations. The excavated soil was blended on site with clean imported soil and returned to the excavation up to 5 ft below ground surface (BGS). At 5-4 ft BGS, a 1-ft thick clay barrier was installed with a clay density tests performed on 12/27/2007. The remaining fill was returned to the excavation and clean, imported blow sand was used to top cap the site and to contour to the surrounding area. On 12/31/2007, the site was seeded with a blend of native vegetation and is expected to return to a productive capacity at a normal rate. To further investigate depth of chloride presence, two soil borings were initiated on 4/30/2008 and 5/1/2008 to a depth of 120 ft BGS for SB #1 an 40 ft BGS for SB #2. Soil samples were collected every 5 ft and tested for chlorides. The deepest sample and the highest chloride concentration from field tests were analyzed by a commercial laboratory for chlorides. Each borehole was plugged with bentonite to the ground surface. NMOCD was notified of potential groundwater impact on 1/7/2009.

ADDITIONAL EVALUATION IS HIGH PRIORITY

enclosures: photos, lab results, PID field screenings, cross-section, clay test, boring log

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

SITE SUPERVISOR Roy Rascon SIGNATURE not available COMPANY RICE OPERATING COMPANY

REPORT ASSEMBLED BY Katie Jones INITIAL KJ

PROJECT LEADER Larry Bruce Baker Jr. SIGNATURE Larry Bruce Baker Jr. DATE 1-20-09

*This site is a "DISCLOSURE." It will be placed on a prioritized list of similar sites for further consideration.

clay density test, facing north 12/27/2007

seeding backfilled site, facing south 12/31/2007

site complete with clay marker, facing east 12/31/2007

soil boring at the former junction box 4/30/2007

CARDINAL LABORATORIES

PHONE (575) 393-2326 • 101 E. MARLAND • HOBBS, NM 88240

ANALYTICAL RESULTS FOR
RICE OPERATING CO.
ATTN: ROY R. RASCON
122 W. TAYLOR
HOBBS, NM 88240
FAX TO: (575) 397-1471

COPY

Receiving Date: 12/20/07
Reporting Date: 12/21/07
Project Number: NOT GIVEN
Project Name: BD JCT A-1-1
Project Location: NOT GIVEN

Sampling Date: 12/19/07
Sample Type: SOIL
Sample Condition: COOL & INTACT
Sample Received By: KS
Analyzed By: CK/HM

LAB NUMBER	SAMPLE ID	GRO (C_6-C_{12}) (mg/kg)	DRO (>C_{12}-C_{28}) (mg/kg)	Cl* (mg/kg)
ANALYSIS DATE		12/20/07	12/20/07	12/21/07
H13956-1	5PT. BTTM. COMP. @ 12' BGS	<10.0	<10.0	1584
H13956-2	4 WALL COMP. @ 35X25	<10.0	<10.0	2511
H13956-3	5PT BLENDED BACKFILL	<10.0	19.6	1855
Quality Control		519	495	500
True Value QC		500	500	500
% Recovery		104	99.0	100
Relative Percent Difference		5.6	18.7	<0.1

METHODS: TPH GRO & DRO: EPA SW-846 8015 M; Std. Methods 4500-ClB
*Analyses performed on 1:4 w:v aqueous extracts.

DEC 26 2007

Chemist

12/21/07
Date

H13956TCL Rice

CARDINAL LABORATORIES

CHAIN-OF-CUSTODY AND ANALYSIS REQUEST

2111 Beechwood, Abilene, TX 79603 101 East Marland, Hobbs, NM 88240
(325) 673-7001 FAX (325)673-7020 (505) 393-2326 FAX (505) 393-2476

Company Name: RICE OPERATING CO.	BILL TO
Project Manager: ROY R. RASCON	P.O. #:
Address: 122 WEST TAYLOR	Company:
City: HOBBS State: NM Zip: 88240	Attn:
Phone #: (505) 393-9174 Fax #: (505) 397-1471	Address:
Project #: Project Owner:	City:
Project Name: BD JCT A-1-1	State: Zip:
Project Location:	Phone #:
Sampler Name: ROY R. RASCON	Fax #:

FOR LAB USE ONLY LAB ID #	SAMPLE I.D.	(G)RAB OR (C)OMP.	# CONTAINERS	MATRIX: GROUNDWATER	WASTEWATER	SOIL	OIL	SLUDGE	PRESERV: OTHER :	ACID/BASE:	ICE / COOL	OTHER :	SAMPLING: DATE	TIME	ANALYSIS REQUEST: TPH 8015 M	CL-	BTEX
H13256-1	5pt bttm comp @ 12'bgs	C	1			X					X		12/19/07	1130	X	X	
-2	4 wall comp @ 35X25	C	1			X					X		12/19/07	1530	X	X	
-3	5pt blended backfill	C	1			X					X		12/19/07	1600	X	X	

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PLEASE NOTE: Liability and Damages. Cardinal's liability and client's exclusive remedy for any claim arising whether based in contract or tort, shall be limited to the amount paid by the client for the analyses. All claims including those for negligence and any other cause whatsoever shall be deemed waived unless made in writing and received by Cardinal within 30 days after completion of the applicable service. In no event shall Cardinal be liable for incidental or consequental damages, including without limitation, business interruptions, loss of use, or loss of profits incurred by client, its subsidiaries, affiliates or successors arising out of or related to the performance of services hereunder by Cardinal, regardless of whether such claim is based upon any of the above stated reasons or otherwise.

Relinquished By: Roy R. Rascon	Date: 12-20-07 Time: 9:10	Received By: Kristin Dufresne	Phone Result: Yes No Add'l Phone #:
Relinquished By:	Date: Time:	Received By:	Fax Result: X Yes No Add'l Fax #:

Delivered By: (Circle One)
Sampler - UPS - Bus - Other:

Sample Condition: Cool: Yes / No Intact: Yes / No

CHECKED BY: (Initials) KS

REMARKS: Please e-mail results to jpurvis & rrascon @riceswd.com

† *Cardinal cannot accept verbal changes. Please fax written changes to 505-393-2476*

CARDINAL LABORATORIES

PHONE (575) 393-2326 • 101 E. MARLAND • HOBBS, NM 88240

ANALYTICAL RESULTS FOR
RICE OPERATING CO.
ATTN: KRISTIN FARRIS-POPE
122 WEST TAYLOR
HOBBS, NM 88240
FAX TO: (575) 397-1471

Receiving Date: 05/05/08
Reporting Date: 05/05/08
Project Number: NOT GIVEN
Project Name: BD JCT. A-1-1
Project Location: BD JCT. A-1-1

Analysis Date: 05/05/08
Sampling Date: 04/30/08 & 05/01/08
Sample Type: SOIL
Sample Condition: COOL & INTACT
Sample Received By: ML
Analyzed By: KS

LAB NO.	SAMPLE ID	Cl^- (mg/kg)
H14739-1	SB #1 @ 25'	1,900
H14739-2	SB #1 @ 120'	288
H14739-3	SB #2 @ 10'	1,330
H14739-4	SB #2 @ 40'	112
Quality Control		500
True Value QC		500
% Recovery		100
Relative Percent Difference		2.0

METHOD: Standard Methods	4500-ClB

Note: Analyses performed on 1:4 w:v aqueous extracts.

Kristin Farris-Pope
Chemist

05/06/08
Date

H14739 RICE

CARDINAL LABORATORIES

CHAIN-OF-CUSTODY AND ANALYSIS REQUEST

101 East Marland, Hobbs, NM 88240 2111 Beechwood, Abilene, TX 79603
(505) 393-2326 FAX (505) 393-2476 (325) 673-7001 FAX (325)673-7020

Company Name: Rice Operating Company	**BILL TO**
Project Manager: Kristin Pope	P.O. #:
Address: 122 West Taylor	Company:
City: Hobbs State: NM Zip: 88240	Attn:
Phone #: 393-9174 Fax #: 397-1471	Address:
Project #: Project Owner:	City:
Project Name: BD jct. A-1-1	State: Zip:
Project Location: BD jct. A-1-1	Phone #:
Sampler Name: Lara Weinheimer	Fax #:

FOR LAB USE ONLY				MATRIX						PRESERV.			SAMPLING		ANALYSIS REQUEST
Lab I.D.	Sample I.D.	(G)RAB OR (C)OMP.	# CONTAINERS	GROUNDWATER	WASTEWATER	SOIL	OIL	SLUDGE	OTHER :	ACID/BASE:	ICE / COOL	OTHER :	DATE	TIME	Chlorides
H14739-1	SB #1 @ 25'	G	1			✓					✓		4/30/08	09:13	✓
-2	SB #1 @ 120'	G	1			✓					✓		4/30/08	10:43	✓
-3	SB #2 @ 10'	G	1			✓					✓		5/1/08	02:44	✓
-4	SB #2 @ 40'	G	1			✓					✓		5/1/08	02:52	✓

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Relinquished By: L. Weinheimer	Date: 5-5-08 Time: 9:07	Received By:	Phone Result: ☐ Yes ☑ No Add'l Phone #:
Relinquished By:	Date: Time:	Received By:	Fax Result: ☐ Yes ☑ No Add'l Fax #:
Delivered By: (Circle One) Sampler - UPS - Bus - Other:	Sample Condition Cool ☐ Yes ☐ No Intact ☐ Yes ☐ No	CHECKED BY: (Initials)	REMARKS: email results kpope@riceswd.com; jpurvis@riceswd.com; Lweinheimer@rice.swd.com

† Cardinal cannot accept verbal changes. Please fax written changes to 505-393-2476

RICE OPERATING COMPANY

122 West Taylor Hobbs, NM 88240
PHONE: (505) 393-9174 FAX: (505) 397-1471
PID METER CALIBRATION & FIELD REPORT FORM

CK.	
MODEL	X
NO.	

MODEL: PGM 7600 SERIAL NO: 110-013676
MODEL: PGM 7600 SERIAL NO: 110-013744
MODEL: PGM 7600 SERIAL NO: 110-012383
MODEL: PGM 7600 SERIAL NO: 110-012920

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GAS COMPOSITION: ISOBUTYLENE 100PPM / AIR: BALANCE

LOT NO : 07-3353	EXPIRATION DATE: 4-4-09
FILL DATE: 10-4-07	METER READING ACCURACY: 100.0

ACCURACY : +/- 2%

SYSTEM	JUNCTION	UNIT	SECTION	TOWN SHIP	RANGE
BD	A-1-1	A	1	22S	36E

SAMPLE ID	PID	SAMPLE ID	PID
N WALL COMP	0.8		
S WALL COMP	0.2		
E WALL COMP	0.3		
W WALL COMP	0		
5 PT BOTTOM COMP @ 12'BGS	0.4		
4 WALL COMP @ 35' X 25'	0		
BLENDED BACKFILL COMP 5PT COMP	0		

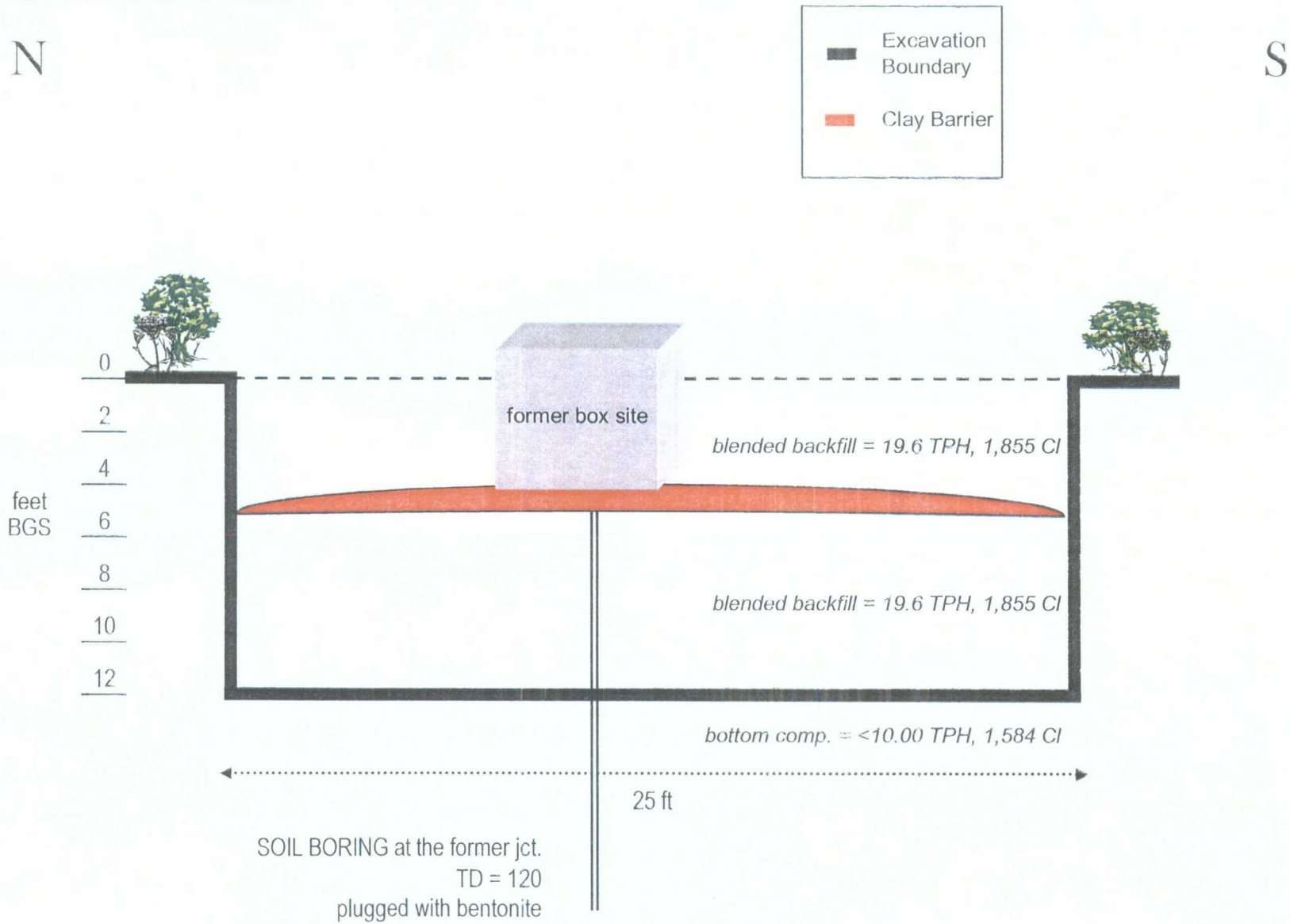
I verify that I have calibrated the above instrument in accordance to the manufacture operation manual.

SIGNATURE: Ray R. Preston

DATE: 12-19-07

BD Jct. A-1-1
Unit 'A', Sec. 1, T22S, R36E

Excavation Cross-Section



LABORATORY TEST REPORT

PETTIGREW & ASSOCIATES, P.A.
1110 N. GRIMES
HOBBS, NM 88240
(505) 393-9827

DEBRA P. PETTIGREW, P.E. #13
WILLIAM E. PARKS III, P.E. #15

To: Rice Operating
Attn: Hank Conder
122 W. Taylor
Hobbs, NM 88240

Material: Red Clay

Test Method: ASTM: D 2922

Project: General Information
Project No. 2007.1007

COPY

Date of Test: December 27, 2007

Depth: See Below

Depth of Probe: 6"

Test No.	Location	Dry Density % Max	% Moisture	Depth
SG 15	BD Jct. A1-1 Center of 35' x 25' Hole	95.2	19.1	FSG

Control Density: 104.4
ASTM: D 698

Optimum Moisture: 20.3%

Required Compaction: 90%

Densometer ID: 815

PETTIGREW & ASSOCIATES

Lab No.: 07 11019-11019a

Copies To: Rice Operating

BY: _____

BY: _____ P.E.

Logger:	Lara Weinheimer	**Client:** RICE Operating Company	**Well ID:**
Driller:	Harrison & Cooper Drilling		
Drilling Method:	Air rotary	**Project Name:** BD jct. A-1-1	
Start Date:	4-30-08		
End Date:	4-30-08	**Location:** BD SWD System unit 'A' Sec.1 T22S, R36E Lea County, NM	SB - 1
Comments: Located at the source of the former jct. box site TD = 120 ft GW = 124 ft			

Depth (feet)	chloride field tests	PID	Description	Lithology	Soil Bore Construction
			10 - 15 ft VERY FINE SAND some rock, light brown, dry		
15	1299				
			15 - 20 ft VERY FINE SAND some rock, light brown, dry		
20	2195				
			20 - 25 ft VERY FINE SAND some rock, light brown, dry		
25	2089				
Lab	1900		25 - 30 ft VERY FINE SAND some rock, reddish-brown, dry		
30	1026				
			30 - 45 ft VERY FINE SAND orangy-brown, slightly moist		
35	731				
40	834				
45	1136				
			45 - 50 ft VERY FINE SAND orangy-brown, dry		
50	1303				
			50 - 55 ft VERY FINE SAND some rock, reddish-orange, dry		
55	1212				
60	1530		55 - 65 ft VERY FINE SAND some rock, light brown, dry		
65	1357				
70	1311		65 - 80 ft VERY FINE SAND some rock, light brown, dry		bentonite
75	1003				
80	804				
85	900		80 - 85 ft VERY FINE SAND some rock, light brown, dry		
90	631		85 - 100 ft VERY FINE SAND		

			some rock, reddish-brown, dry
95	762		
100	997		
			100 - 105 ft VERY FINE SAND
105	600		sandstone rock, light brown, dry
			105 - 115 VERY FINE SAND *reddish-brown, dry*
110	403		
115	339		
			115 - 120 VERY FINE SAND
120	364		sandstone rock, light brown, slightly moist
Lab	288