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April 1, 2020

Bradford Billings

Environmental Bureau, Oil Conservation Division New Mexico Energy, Minerals, & Natural Resources Department 1220 S. St. Francis Drive Santa Fe, New Mexico 87505

> RE: 2019 Annual Groundwater Report Rice Operating Company – BD SWD System BD Santa Rita EOL Release Site (AP-58): UL/A, Sec. 27, T22S, R37E

Mr. Billings:

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

The site is located approximately 4.5 miles southeast of Eunice, New Mexico at UL/A, Sec. 27, T22S, R37E as shown on the Geographic Location Map. Groundwater sampling at the site indicated that the depth to groundwater is located at approximately 54 feet below ground surface (bgs).

On November 22nd, 2003, ROC discovered a leak from a 2-inch PVC compression coupling. After initial backhoe characterization, the site was disclosed to NMOCD as a potential groundwater impact site on January 6th, 2004. Since groundwater impact was suspected, MW-1 was installed on August 30th, 2005. On October 30th, 2007, an up gradient well, MW-2, and a down gradient well, MW-3, were installed to fully delineate groundwater. NMOCD approved the Amended Stage 2 Abatement Plan on February 4th, 2009. As a result, MW-1 was plugged and abandoned on February 27th, 2009, and the excavation for liner installation commenced on March 24th, 2009. Two, 1 ft thick clay liners, one with dimensions of 40x20 ft at 30 ft bgs and one with dimensions of 40x50 ft at 12 ft bgs, were installed and a 20-mil plastic liner of equal size was placed above both clay layers. Each plastic liner was padded with a foot of blow sand. The site was backfilled with clean soil, contoured to the surrounding location, and seeded with a native vegetative mix. On June 16th and 17th, 2009, MW-4 and RW-1 were installed at the site. On October 10th, 2012, ROC submitted a Soil Closure Request which was approved by NMOCD on the same day.

Groundwater recovery began on June 22nd, 2010 from RW-1. Since that time, approximately 53,651 barrels of groundwater have been removed (6,040 barrels were removed in 2019). Based on the most recent sampling event, this equates to approximately 3,583 Kg of chlorides removed from the site (403 Kg were removed in 2019). Since pumping efforts began, quarterly groundwater sampling results for chloride have decreased in the down gradient wells (RW-1,

MW-3, and MW-4). This indicates that the pumping program at the site has been effective in reducing the chloride load in the groundwater.

Due to the current climate, and in the interest of safety, ROC proposes to reduce groundwater monitoring from quarterly to semi-annually beginning this year. In addition, ROC is proposing to suspend groundwater recovery for this year. These proposals are only temporary and regularly scheduled groundwater monitoring and recovery will commence as soon as possible.

Attached is the Appendix, which contains:

- 1. A Geographic Location Map.
- 2. A map showing well locations.
- 3. A table presenting all laboratory results and depth to groundwater for each well at the site, and a graph showing recent laboratory results.
- 4. The laboratory analytical results for 2019.

Rice Operating Company appreciates the opportunity to work with you on this project. Please contact me at (575) 393-9174 or Edward Hansen at (505) 920-4965 if you have any questions or wish to further discuss this site. Thank you for your time and consideration.

Sincerely,

Katie Davis

Environmental Manager

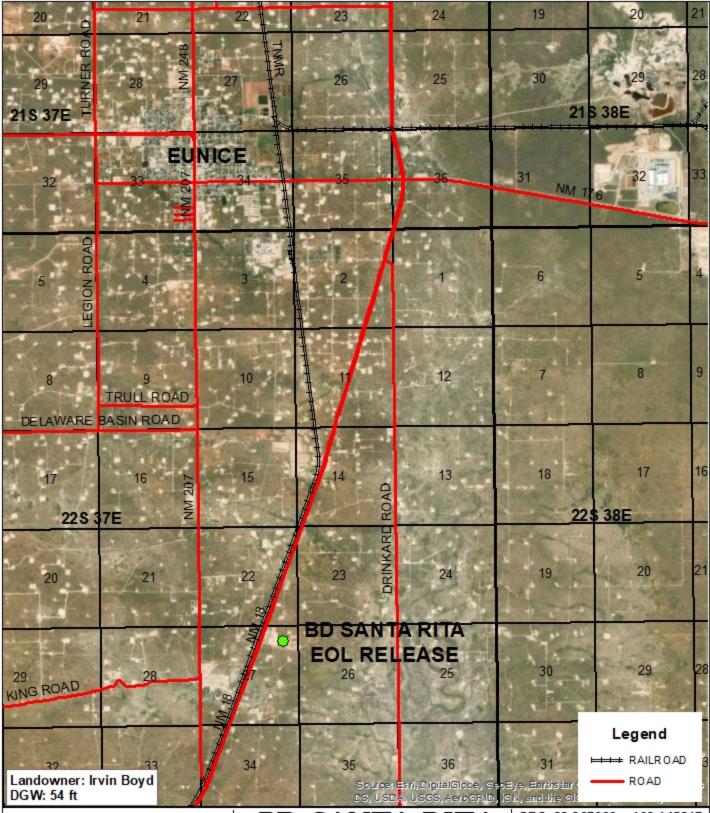
Katy Davis

RICE Operating Company (ROC)

Cc – Edward J. Hansen (ROC)

appendix

Geographic Location Map

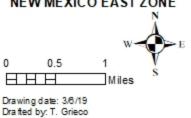




BD SANTA RITA EOL RELEASE

AP-58

UL A SECTION 27 T22S, R37E LEA COUNTY, NM GPS: 32.367966 -103.145217 NAD 83 STATE PLANE PROJ. NEW MEXICO EAST ZONE



Site Map



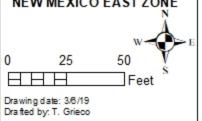


BD SANTA RITA EOL RELEASE

AP-58

UL A SECTION 27 T22S, R37E LEA COUNTY, NM





ROC - BD Santa Rita EOL (AP-58) Unit Letter A, Section 27, T22S, R37E

MW	Depth to	Total	Well	Volume	Sample	Cl	TDS	Benzene	Toluene	Ethyl	Total	Culfata	Comments
IVIVV	Water	Depth	Volume	Purged	Date	C	נטו	Бепдепе	Toluelle	Benzene	Xylenes	Sunate	Comments
1	54.04	63.58	1.53	4.752	9/2/2005	4,480	7,600	<0.001	<0.001	<0.001	<0.001	1,380	red & silty
1	53.85	63.58	1.6	5	10/24/2005	7,170	16,400	<0.001	<0.001	<0.001	<0.001	726	red & silty
1	53.98	63.58	1.5	5	1/23/2006	7,450	14,300	<0.001	<0.001	<0.001	<0.001	723	red & silty
1	54.07	63.58	1.5	6	4/24/2006	7,100	14,300	<0.001	<0.001	<0.001	<0.001	675	
1	54.08	63.58	1.5	10	7/19/2006	6,180	14,000	<0.001	<0.001	<0.001	<0.001	583	
1	53.99	63.58	1.5	15	10/11/2006	2,100	4,560	<0.001	<0.001	<0.001	<0.001	408	Clear
1	54.1	63.58	1.5	5	1/25/2007	2,740	4,560	<0.001	< 0.001	<0.001	<0.001	449	
1	54.11	63.58	1.5	5.5	4/4/2007	2,610	5,720	<0.001	<0.001	<0.001	<0.003	314	Clear No odor
1	53.8	63.58	1.6	6	7/9/2007	363	1,470	<0.001	<0.001	<0.001	<0.003	267	Clear No odor
1	53.87	63.58	1.6	6	11/12/2007	356	1,398	<0.001	< 0.001	<0.001	<0.003	331	Clear No odor
1	53.88	63.58	1.6	6	1/15/2008	408	1,499	<0.001	<0.001	<0.001	<0.003	232	Clear No odor
1	53.98	63.58	1.5	6	4/7/2008	420	1,460	<0.001	< 0.001	<0.001	<0.003	346	Sand to clear No odor
1	54.06	63.58	1.5	6	7/22/2008	440	1,460	<0.002	<0.002	<0.002	<0.006	271	Sand to clear No odor
1	54.11	63.58	1.5	6	10/2/2008	392	1,390	<0.001	<0.001	<0.001	<0.003	281	Sand to clear No odor
1	54.08	63.2	1.5	6	1/14/2009	352	1,250	<0.001	<0.001	<0.001	<0.003	250	Sand to clear No odor
			•			M۱	N-1 Plug	ged 2/27/2	2009			•	

MW	Depth to Water	Total Depth	Well Volume	Volume Purged	Sample Date	Cl	TDS	Benzene	Toluene	Ethyl Benzene	Total Xylenes	Sulfate	Comments
2	54.55	62.58	1.3	6	11/12/2007	160	930	<0.001	<0.001	<0.001	<0.003	257	Clear No odor
2	54.57	63.7	1.5	6	1/15/2008	128	1,001	<0.001	<0.001	<0.001	<0.003	340	Clear No odor
2	54.65	63.7	1.4	6	4/7/2008	100	982	<0.001	<0.001	<0.001	<0.003	411	Sand to clear No odor
2	54.74	63.7	1.4	6	7/22/2008	92	931	<0.002	<0.002	<0.002	<0.006	377	Sand to clear No odor
2	54.81	63.7	1.4	6	10/2/2008	88	902	<0.001	<0.001	<0.001	<0.003	333	Sand to clear No odor
2	54.78	64.2	1.5	6	1/14/2009	84	850	<0.001	<0.001	<0.001	<0.003	309	Sand to clear No odor
2	54.82	64.2	1.5	6	4/14/2009	80	858	<0.001	<0.001	<0.001	<0.003	319	Sand to clear No odor
2	54.79	64.43	1.5	6	7/13/2009	76	802	<0.001	<0.001	<0.001	<0.003	279	Sand to clear No odor
2	54.79	64.43	1.5	6	10/8/2009	64	776	<0.001	<0.001	<0.001	<0.003	244	Sand to clear No odor

ROC - BD Santa Rita EOL (AP-58) Unit Letter A, Section 27, T22S, R37E

D 4147	Depth to	Total	Well	Volume	Sample	Cl	TDC	D	Talmana	Ethyl	Total	Culfata	Caramanta
MW	Water	Depth	Volume	Purged	Date	Cl	TDS	Benzene	Toluene	Benzene	Xylenes	Sulfate	Comments
2	54.83	64.42	1.5	6	1/6/2010	60	726	<0.001	<0.001	<0.001	<0.003	268	Sand to clear No odor
2	54.85	64.42	1.5	6	4/9/2010	52	710	<0.001	<0.001	<0.001	<0.003	250	Sand to clear No odor
2	55.1	64.42	1.5	6	7/9/2010	52	644	<0.001	<0.001	<0.001	<0.003	201	Sand to clear No odor
2	55.05	64.42	1.5	6	10/6/2010	40	530	<0.001	<0.001	<0.001	<0.003	115	Sand to clear No odor
2	54.82	64.42	1.5	6	2/11/2011	88	601	<0.001	<0.001	<0.001	<0.003	123	Sand to clear No odor
2	54.92	64.42	1.5	6	4/12/2011	40	470	<0.001	<0.001	<0.001	<0.003	117	Sand to clear No odor
2	55.23	64.42	1.5	6	7/18/2011	36	491	<0.001	<0.001	<0.001	<0.003	106	Sand to clear No odor
2	55.33	64.42	1.5	6	10/13/2011	44	496	<0.001	<0.001	<0.001	<0.003	121	Sand to clear No odor
2	54.98	64.42	1.5	6	1/18/2012	40	414	<0.001	<0.001	<0.001	<0.003	116	Sand to clear No odor
2	55.34	64.42	1.5	6	4/17/2012	32	458	<0.001	<0.001	<0.001	<0.003	94.6	Sand to clear No odor
2	55.06	64.42	1.5	6	7/16/2012	80	613	<0.001	<0.001	<0.001	<0.003	327	Sand to clear No odor
2	55.33	64.42	1.5	6	10/5/2012	40	510	<0.001	<0.001	<0.001	<0.003	108	Sand to clear No odor
2	55.03	64.42	1.5	6	1/8/2013	40	456	<0.001	<0.001	<0.001	<0.003	94	Sand to clear No odor
2	55.03	64.42	1.5	6	4/19/2013	44	428	<0.001	<0.001	<0.001	<0.003	83	Sand to clear No odor
2	55.07	64.42	1.5	6	7/16/2013	44	424	<0.001	<0.001	<0.001	<0.003	99	Sand to clear No odor
2	55.14	64.42	1.5	6	10/17/2013	40	437	<0.001	<0.001	<0.001	<0.003	85.2	Sand to clear No odor
2	54.92	64.42	1.5	6	1/17/2014	36	406	<0.001	<0.001	<0.001	<0.003	82.3	Sand to clear No odor
2	55.02	64.42	1.5	6	4/7/2014	44	456	<0.001	<0.001	<0.001	<0.003	111	Sand to clear No odor
2	55.05	64.42	1.5	6	7/16/2014	40	472	<0.001	<0.001	<0.001	<0.003	77.4	Sand to clear No odor
2	54.01	64.42	1.7	6	10/23/2014	52	454	<0.001	<0.001	<0.001	<0.003	116	Sand to clear No odor
2	53.83	64.42	1.7	6	2/2/2015	56	438	<0.001	<0.001	<0.001	<0.003	117	Sand to clear No odor
2	54.05	64.42	1.7	6	4/21/2015	40	434	<0.001	<0.001	<0.001	<0.003	89.7	Sand to clear No odor
2	54.32	64.42	1.62	6	7/21/2015	60	480	<0.001	<0.001	<0.001	<0.003	83	Sand to clear No odor
2	54.34	64.42	1.61	6	11/18/2015	76	626	<0.001	<0.001	<0.001	<0.003	135	Sand to clear No odor
2	53.84	64.42	1.7	6	1/28/2016	68	608	<0.001	<0.001	<0.001	<0.003	161	Sand to clear No odor
2	54.15	64.42	1.6	6	4/21/2016	112	518	<0.001	<0.001	<0.001	<0.003	95.8	Sand to clear No odor
2	54.21	64.42	1.6	6	7/21/2016	60	652	<0.001	<0.001	<0.001	<0.003	172	Sand to clear No odor
2	53.64	64.42	1.7	6	10/21/2016	68	658	<0.001	<0.001	<0.001	<0.003	184	Sand to clear No odor
2	53.72	64.42	1.7	6	2/3/2017	60	572	<0.001	<0.001	<0.001	<0.003	139	Sand to clear No odor

ROC - BD Santa Rita EOL (AP-58) Unit Letter A, Section 27, T22S, R37E

MW	Depth to Water	Total Depth	Well Volume	Volume Purged	Sample Date	Cl	TDS	Benzene	Toluene	Ethyl Benzene	Total Xylenes	Sulfate	Comments
2	53.91	64.42	1.7	6	4/6/2017	52	534	< 0.001	<0.001	<0.001	<0.003	128	Sand to clear No odor
2	53.82	64.42	1.7	6	7/28/2017	48	538	<0.001	<0.001	<0.001	<0.003	103	Sand to clear No odor
2	53.74	64.42	1.7	6	10/20/2017	44	532	<0.001	<0.001	<0.001	<0.003	118	Sand to clear No odor
2	53.7	64.42	1.7	6	1/16/2018	36	436	<0.001	<0.001	< 0.001	<0.003	108	Sand to clear No odor
2	53.78	64.42	1.7	6	4/26/2018	44	464	<0.001	<0.001	<0.001	<0.003	121	Sand to clear No odor
2	54.05	64.42	1.7	6	8/2/2018	56	474	<0.001	<0.001	< 0.001	<0.003	96.8	Sand to clear No odor
2	54.07	64.42	1.7	6	10/30/2018	48	476	<0.001	<0.001	<0.001	<0.003	102	Sand to clear No odor
2	53.68	64.42	1.7	6	2/4/2019	52	460	<0.001	<0.001	<0.001	<0.003	98	Sand to clear No odor
2	53.78	64.42	1.7	6	4/22/2019	44	360	<0.001	<0.001	<0.001	<0.003	88	Sand to clear No odor
2	54.1	64.42	1.7	6	7/19/2019	48	444	<0.001	<0.001	<0.001	<0.003	101	Sand to clear No odor
2	53.94	64.42	1.7	6	10/23/2019	40	416	<0.001	<0.001	<0.001	<0.003	87	Sand to clear No odor

D 4) A /	Depth to	Total	Well	Volume	Sample	Cl	TDS	Donzono	Taluana	Ethyl	Total	Culfata	Comments
MW	Water	Depth	Volume	Purged	Date	CI	נטו	Benzene	Toluene	Benzene	Xylenes	Sulfate	Comments
3	53.86	65.44	1.9	6	10/2/2008	1,020	2,830	<0.001	<0.001	<0.001	<0.003	280	Sand to clear No odor
3	53.83	65.42	1.9	6	1/14/2009	1,050	2,670	<0.001	<0.001	<0.001	<0.003	280	Sand to clear No odor
3	53.9	65.42	1.8	6	4/14/2009	960	2,200	<0.001	<0.001	<0.001	<0.003	294	Sand to clear No odor
3	53.88	65.45	1.9	6	7/13/2009	900	2,080	<0.001	<0.001	<0.001	<0.003	270	Sand to clear No odor
3	53.85	65.45	1.9	6	10/8/2009	900	2,340	<0.001	<0.001	<0.001	<0.003	254	Sand to clear No odor
3	54.04	65.45	1.8	6	1/6/2010	910	2,170	<0.001	<0.001	<0.001	<0.003	254	Sand to clear No odor
3	53.94	65.45	1.8	6	4/9/2010	1,110	2,150	<0.001	<0.001	<0.001	<0.003	181	Sand to clear No odor
3	54.94	65.45	1.7	6	7/9/2010	780	1,840	<0.001	<0.001	<0.001	<0.003	276	Sand to clear No odor
3	54.98	65.45	1.7	6	10/6/2010	1,000	2,360	<0.001	<0.001	<0.001	<0.003	266	Sand to clear No odor
3	54.38	65.43	1.8	6	2/11/2011	780	1,560	<0.001	<0.001	<0.001	<0.003	192	Sand to clear No odor
3	55.03	65.43	1.7	6	4/12/2011	1,080	2,350	<0.001	<0.001	<0.001	<0.003	274	Sand to clear No odor
3	54.61	65.43	1.7	6	7/18/2011	720	1,740	<0.001	<0.001	<0.001	<0.003	234	Sand to clear No odor
3	54.7	65.43	1.7	6	10/13/2011	670	1,590	<0.001	<0.001	<0.001	<0.003	247	Sand to clear No odor
3	54.18	65.43	1.8	6	1/18/2012	630	1,520	<0.001	<0.001	<0.001	<0.003	244	Sand to clear No odor

ROC - BD Santa Rita EOL (AP-58) Unit Letter A, Section 27, T22S, R37E

D 4) A /	Depth to	Total	Well	Volume	Sample	Cl	TDC	D	Talmana	Ethyl	Total	C. Ifaka	Caramanta
MW	Water	Depth	Volume	Purged	Date	Cl	TDS	Benzene	Toluene	Benzene	Xylenes	Sulfate	Comments
3	54.69	65.43	1.7	6	4/17/2012	520	1,410	<0.001	<0.001	<0.001	<0.003	208	Sand to clear No odor
3	54.48	65.43	1.8	6	7/16/2012	520	1,460	<0.001	<0.001	<0.001	<0.003	267	Sand to clear No odor
3	54.64	65.43	1.7	6	10/5/2012	520	1,520	<0.001	<0.001	<0.001	<0.003	226	Sand to clear No odor
3	54.06	65.43	1.8	6	1/8/2013	730	1,520	<0.001	<0.001	<0.001	<0.003	177	Sand to clear No odor
3	54.42	65.43	1.8	6	4/19/2013	750	1,620	<0.001	<0.001	<0.001	<0.003	202	Sand to clear No odor
3	54.26	65.43	1.8	6	7/16/2013	448	1,280	<0.001	<0.001	<0.001	<0.003	220	Sand to clear No odor
3	54.28	65.43	1.8	6	10/17/2013	600	1,490	<0.001	<0.001	<0.001	<0.003	174	Sand to clear No odor
3	54.02	65.43	1.8	6	1/17/2014	540	1,320	<0.001	<0.001	<0.001	<0.003	176	Sand to clear No odor
3	54.22	65.43	1.8	6	4/7/2014	580	1,510	<0.001	<0.001	<0.001	<0.003	251	Sand to clear No odor
3	54.24	65.43	1.8	6	7/16/2014	460	1,400	<0.001	<0.001	<0.001	<0.003	215	Sand to clear No odor
3	53.82	65.43	1.9	6	10/23/2014	490	1,420	<0.001	<0.001	<0.001	<0.003	206	Sand to clear No odor
3	53.39	65.43	1.9	6	2/2/2015	520	1,520	<0.001	<0.001	<0.001	<0.003	349	Sand to clear No odor
3	53.49	65.43	1.9	6	4/21/2015	580	1,560	<0.001	<0.001	<0.001	<0.003	219	Sand to clear No odor
3	53.88	65.43	1.85	6	7/21/2015	500	1,430	<0.001	<0.001	<0.001	<0.003	185	Sand to clear No odor
3	53.85	65.43	1.85	6	11/18/2015	540	1,420	<0.001	<0.001	<0.001	<0.003	190	Sand to clear No odor
3	53.37	65.43	1.9	6	1/28/2016	830	1,990	<0.001	<0.001	<0.001	<0.003	356	Sand to clear No odor
3	53.7	65.43	1.9	6	4/21/2016	560	1,500	<0.001	<0.001	<0.001	<0.003	248	Sand to clear No odor
3	53.81	65.43	1.9	6	7/21/2016	530	1,300	<0.001	<0.001	<0.001	<0.003	222	Sand to clear No odor
3	53.68	65.43	1.9	6	10/21/2016	388	1,240	<0.001	<0.001	<0.001	<0.003	208	Sand to clear No odor
3	53.39	65.43	1.9	6	2/3/2017	780	1,710	<0.001	<0.001	<0.001	<0.003	132	Sand to clear No odor
3	53.49	65.43	1.9	6	4/6/2017	660	1,590	<0.001	<0.001	<0.001	<0.003	241	Sand to clear No odor
3	53.55	65.43	1.9	6	7/28/2017	500	1,520	<0.001	<0.001	<0.001	<0.003	201	Sand to clear No odor
3	53.46	65.43	1.9	6	10/20/2017	530	1,370	<0.001	<0.001	<0.001	<0.003	241	Sand to clear No odor
3	53.51	65.43	1.9	6	1/16/2018	640	1,330	<0.001	<0.001	<0.001	<0.003	230	Sand to clear No odor
3	53.56	65.43	1.9	6	4/26/2018	590	1,560	<0.001	<0.001	<0.001	<0.003	233	Sand to clear No odor
3	53.94	65.43	1.8	6	8/2/2018	540	1,290	<0.001	<0.001	<0.001	<0.003	224	Sand to clear No odor
3	54.01	65.43	1.8	6	10/30/2018	790	1,720	<0.001	<0.001	<0.001	<0.003	207	Sand to clear No odor
3	53.48	65.43	1.9	6	2/4/2019	440	1,200	<0.001	<0.001	<0.001	<0.003	220	Sand to clear No odor
3	53.37	65.43	1.9	6	4/22/2019	528	1,510	<0.001	<0.001	<0.001	<0.003	243	Sand to clear No odor

ROC - BD Santa Rita EOL (AP-58) Unit Letter A, Section 27, T22S, R37E

N	1W	Depth to	Total	Well	Volume	Sample	CI	TDS	Benzene	Toluene	Ethyl	Total	Sulfato	Comments
IV	100	Water	Depth	Volume	Purged	Date	Ū	נטו	belizelle	Toluelle	Benzene	Xylenes	Juliate	Comments
	3	53.89	65.43	1.9	6	7/19/2019	428	1,340	<0.001	<0.001	<0.001	<0.003	227	Sand to clear No odor
	3	53.74	65.43	1.9	6	10/23/2019	396	1,200	<0.001	<0.001	<0.001	<0.003	205	Sand to clear No odor

MW	Depth to Water	Total Depth	Well Volume	Volume Purged	Sample Date	Cl	TDS	Benzene	Toluene	Ethyl Benzene	Total Xylenes	Sulfate	Comments
4	52.28	64.4	1.9	6	7/13/2009	1,040	2,260	<0.001	<0.001	<0.001	<0.003	230	Sand to clear No odor
4	52.23	64.4	1.9	6	10/8/2009	1,240	3,320	<0.001	<0.001	<0.001	<0.003	233	Sand to clear No odor
4	52.23	64.29	1.9	6	1/6/2010	1,200	2,750	<0.001	<0.001	<0.001	<0.003	209	Sand to clear No odor
4	52.24	64.29	1.9	6	4/9/2010	900	2,100	<0.001	<0.001	<0.001	<0.003	313	Sand to clear No odor
4	52.76	64.29	1.8	6	7/9/2010	1,450	2,810	<0.001	<0.001	<0.001	<0.003	280	Sand to clear No odor
4	52.83	64.29	1.8	6	10/6/2010	1,040	2,320	<0.001	<0.001	<0.001	<0.003	251	Sand to clear No odor
4	52.22	65.2	2.1	8	2/11/2011	610	1,490	<0.001	<0.001	<0.001	<0.003	208	Sand to clear No odor
4	52.92	65.2	2	8	4/12/2011	640	1,580	<0.001	<0.001	<0.001	<0.003	238	Sand to clear No odor
4	52.95	65.2	2	8	7/18/2011	640	1,530	<0.001	<0.001	<0.001	<0.003	232	Sand to clear No odor
4	52.91	65.2	2	8	10/13/2011	450	1,160	<0.001	<0.001	<0.001	<0.003	235	Sand to clear No odor
4	52.32	65.2	2.1	8	1/18/2012	380	915	<0.001	<0.001	<0.001	<0.003	216	Sand to clear No odor
4	52.81	65.2	2	8	4/17/2012	344	1,110	<0.001	<0.001	<0.001	<0.003	207	Sand to clear No odor
4	52.64	65.2	2	8	7/16/2012	344	1,190	<0.001	<0.001	<0.001	<0.003	244	Sand to clear No odor
4	52.79	65.2	2	8	10/5/2012	352	1,180	<0.001	<0.001	<0.001	<0.003	218	Sand to clear No odor
4	52.41	65.2	2	8	1/8/2013	380	980	<0.001	<0.001	<0.001	<0.003	149	Sand to clear No odor
4	52.73	65.2	2	8	4/19/2013	410	1,140	<0.001	<0.001	<0.001	<0.003	213	Sand to clear No odor
4	52.57	65.2	2	8	7/16/2013	388	1,140	<0.001	<0.001	<0.001	<0.003	202	Sand to clear No odor
4	52.57	65.2	2	8	10/17/2013	368	1,100	<0.001	<0.001	<0.001	<0.003	197	Sand to clear No odor
4	52.34	65.2	2.1	8	1/17/2014	360	1,070	<0.001	<0.001	<0.001	<0.003	192	Sand to clear No odor
4	52.58	65.2	2	8	4/7/2014	448	1,200	<0.001	<0.001	<0.001	<0.003	204	Sand to clear No odor
4	52.59	65.2	2	8	7/16/2014	384	1,140	<0.001	<0.001	<0.001	<0.003	174	Sand to clear No odor
4	51.97	65.2	2.1	8	10/23/2014	360	1,100	<0.001	<0.001	<0.001	<0.003	157	Sand to clear No odor
4	51.52	65.2	2.2	8	2/2/2015	460	1,310	<0.001	<0.001	<0.001	<0.003	188	Sand to clear No odor

ROC - BD Santa Rita EOL (AP-58) Unit Letter A, Section 27, T22S, R37E

MW	Depth to Water	Total Depth	Well Volume	Volume Purged	Sample Date	Cl	TDS	Benzene	Toluene	Ethyl Benzene	Total Xylenes	Sulfate	Comments
4	51.58	65.2	2.2	8	4/21/2015	500	1,350	<0.001	<0.001	<0.001	<0.003	207	Sand to clear No odor
4	51.89	65.2	2.13	8	7/21/2015	550	1,450	<0.001	<0.001	<0.001	<0.003	190	Sand to clear No odor
4	51.88	65.2	2.13	8	11/18/2015	500	1,350	<0.001	<0.001	<0.001	<0.003	228	Sand to clear No odor
4	51.42	65.2	2.2	8	1/28/2016	490	1,240	<0.001	<0.001	<0.001	<0.003	223	Sand to clear No odor
4	51.72	65.2	2.2	8	4/21/2016	450	1,360	<0.001	<0.001	<0.001	<0.003	224	Sand to clear No odor
4	51.64	65.2	2.2	8	7/21/2016	400	1,200	<0.001	<0.001	<0.001	<0.003	208	Sand to clear No odor
4	51.52	65.2	2.2	8	10/21/2016	420	1,160	<0.001	<0.001	<0.001	<0.003	111	Sand to clear No odor
4	51.24	65.2	2.2	8	2/3/2017	430	1,240	<0.001	<0.001	<0.001	<0.003	219	Sand to clear No odor
4	51.32	65.2	2.2	8	4/6/2017	440	1,410	<0.001	<0.001	<0.001	<0.003	208	Sand to clear No odor
4	51.38	65.2	2.2	8	7/28/2017	510	1,440	<0.001	<0.001	<0.001	<0.003	218	Sand to clear No odor
4	51.27	65.2	2.2	8	10/20/2017	520	1,330	<0.001	<0.001	<0.001	<0.003	206	Sand to clear No odor
4	51.12	65.2	2.3	8	1/16/2018	540	1,420	<0.001	<0.001	<0.001	<0.003	242	Sand to clear No odor
4	51.15	65.2	2.2	8	4/26/2018	500	1,460	<0.001	<0.001	<0.001	<0.003	247	Sand to clear No odor
4	51.55	65.2	2.2	8	8/2/2018	436	1,070	<0.001	<0.001	<0.001	<0.003	208	Sand to clear No odor
4	51.62	65.2	2.2	8	10/30/2018	450	1,190	<0.001	<0.001	<0.001	<0.003	206	Sand to clear No odor
4	51.14	65.2	2.2	8	2/4/2019	620	1,500	<0.001	<0.001	<0.001	<0.003	235	Sand to clear No odor
4	51.61	65.2	2.2	8	4/22/2019	432	1,210	<0.001	<0.001	<0.001	<0.003	246	Sand to clear No odor
4	51.61	65.2	2.2	8	7/19/2019	448	1,330	<0.001	<0.001	<0.001	<0.003	228	Sand to clear No odor
4	51.55	65.2	2.2	8	10/23/2019	380	1,210	<0.001	<0.001	<0.001	<0.003	214	Sand to clear No odor

MW	Depth to Water	Total Depth	Well Volume	Volume Purged	Sample Date	Cl	TDS	Benzene	Toluene	Ethyl Benzene	Total Xylenes	Sulfate	Comments
RW-1	53.02	98.85	29.8	90	7/13/2009	1,340	2,750	<0.001	<0.001	<0.001	<0.003	288	Sand to clear No odor
RW-1	53.01	98.85	29.8	90	10/8/2009	1,520	2,970	<0.001	<0.001	<0.001	<0.003	251	Sand to clear No odor
RW-1	53.04	98.85	29.8	90	1/6/2010	1,480	2,880	<0.001	<0.001	<0.001	<0.003	224	Sand to clear No odor
RW-1	53.06	98.85	29.8	90	4/9/2010	1,300	2,620	<0.001	<0.001	<0.001	<0.003	290	Sand to clear No odor
RW-1	XXX	98.85	XXX	XXX	7/9/2010	1,260	2,750	<0.001	<0.001	<0.001	<0.003	291	Solar pump used to purge

ROC - BD Santa Rita EOL (AP-58) Unit Letter A, Section 27, T22S, R37E

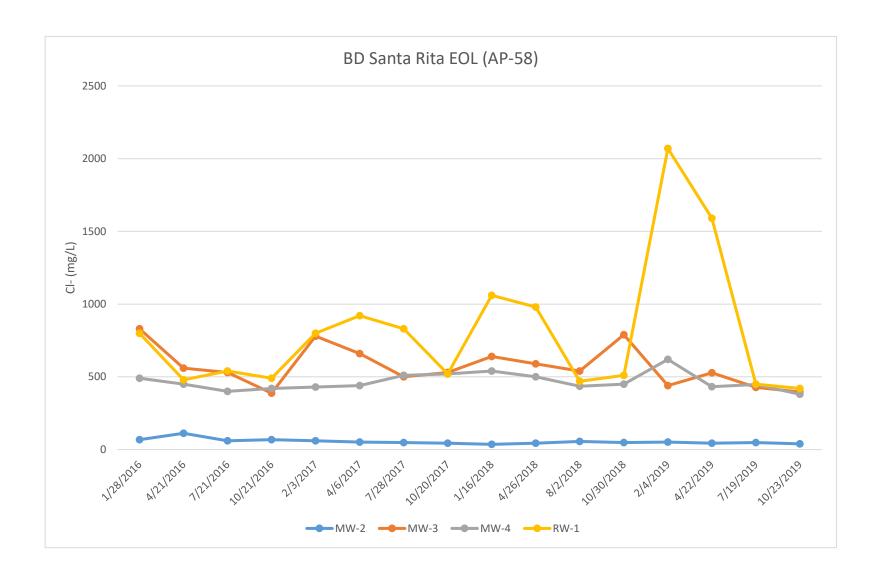
MW	Depth to Water	Total Depth	Well Volume	Volume Purged	Sample Date	Cl	TDS	Benzene	Toluene	Ethyl Benzene	Total Xylenes	Sulfate	Comments
RW-1	XXX	98.85	XXX	xxx	10/6/2010	930	2,360	<0.001	<0.001	<0.001	<0.003	298	Solar pump used to purge
RW-1	XXX	98.85	XXX	90	2/11/2011	850	1,800	<0.001	<0.001	<0.001	<0.003	180	Solar pump used to purge
RW-1	XXX	98.85	xxx	XXX	4/12/2011	1,000	2,190	<0.001	<0.001	<0.001	<0.003	298	Solar pump used to purge
RW-1	XXX	98.85	xxx	XXX	7/18/2011	740	1,740	<0.001	<0.001	<0.001	<0.001	255	Solar pump used to purge
RW-1	XXX	98.85	xxx	pumping	10/13/2011	680	1,630	<0.001	<0.001	<0.001	<0.003	199	Solar pump used to purge
RW-1	XXX	98.85	xxx	pumping	1/18/2012	630	1,500	<0.001	<0.001	<0.001	<0.003	244	Solar pump used to purge
RW-1	XXX	98.85	XXX	pumping	4/17/2012	580	1,490	<0.001	<0.001	<0.001	<0.003	277	Solar pump used to purge
RW-1	XXX	98.85	XXX	pumping	7/16/2012	650	1,710	<0.001	<0.001	<0.001	<0.003	250	Solar pump used to purge
RW-1	XXX	98.85	xxx	pumping	10/5/2012	680	1,760	<0.001	<0.001	<0.001	<0.003	218	Solar pump used to purge
RW-1	XXX	98.85	XXX	pumping	1/7/2013	750	1,600	<0.001	<0.001	<0.001	<0.003	188	Solar pump used to purge
RW-1	XXX	98.85	xxx	pumping	4/19/2013	570	1,480	<0.001	<0.001	<0.001	<0.003	224	Solar pump used to purge
RW-1	XXX	98.85	xxx	pumping	7/16/2013	540	1,480	<0.001	<0.001	<0.001	<0.003	247	Solar pump used to purge
RW-1	XXX	98.85	xxx	pumping	10/17/2013	520	1,430	<0.001	<0.001	<0.001	<0.003	195	Solar pump used to purge
RW-1	XXX	98.85	XXX	pumping	1/17/2014	570	1,300	<0.001	<0.001	<0.001	<0.003	188	Solar pump used to purge

ROC - BD Santa Rita EOL (AP-58) Unit Letter A, Section 27, T22S, R37E

MW	Depth to Water	Total Depth	Well Volume	Volume Purged	Sample Date	Cl	TDS	Benzene	Toluene	Ethyl Benzene	Total Xylenes	Sulfate	Comments
RW-1	xxx	98.85	XXX	pumping	4/7/2014	770	1,800	<0.001	<0.001	<0.001	<0.003	258	Solar pump used to purge
RW-1	XXX	98.85	XXX	pumping	7/16/2014	470	1,410	<0.001	<0.001	<0.001	<0.003	210	Solar pump used to purge
RW-1	XXX	98.85	xxx	pumping	10/23/2014	440	1,430	<0.001	<0.001	<0.001	<0.003	200	Solar pump used to purge
RW-1	XXX	98.85	XXX	100	2/2/2015	550	1,450	<0.001	<0.001	<0.001	<0.003	220	Solar pump used to purge
RW-1	XXX	98.85	XXX	100	4/21/2015	890	2,030	<0.001	<0.001	<0.001	<0.003	198	Solar pump used to purge
RW-1	XXX	98.85	XXX	100	7/21/2015	520	1,430	<0.001	<0.001	<0.001	<0.003	195	Solar pump used to purge
RW-1	XXX	98.85	XXX	pumping	11/18/2015	520	1,380	<0.001	<0.001	<0.001	<0.003	259	Solar pump used to purge
RW-1	XXX	98.85	xxx	100	1/28/2016	800	1,730	<0.001	<0.001	<0.001	<0.003	332	Solar pump used to purge
RW-1	XXX	98.85	XXX	running	4/21/2016	480	1,480	<0.001	<0.001	<0.001	<0.003	221	Solar pump used to purge
RW-1	XXX	98.85	XXX	running	7/21/2016	540	1,220	<0.001	<0.001	<0.001	<0.003	224	Solar pump used to purge
RW-1	XXX	98.85	xxx	running	10/21/2016	490	962	<0.001	<0.001	<0.001	<0.003	226	Solar pump used to purge
RW-1	XXX	98.85	XXX	100	2/3/2017	800	1,500	<0.001	<0.001	<0.001	<0.003	194	Solar Pump Used to Purge
RW-1	XXX	98.85	xxx	100	4/6/2017	920	1,990	<0.001	<0.001	<0.001	<0.003	242	Solar Pump Used to Purge
RW-1	XXX	98.85	XXX	Running	7/28/2017	830	2,150	<0.001	<0.001	<0.001	<0.003	212	Solar Pump Used to Purge

ROC - BD Santa Rita EOL (AP-58) Unit Letter A, Section 27, T22S, R37E

MW	Depth to Water	Total Depth	Well Volume	Volume Purged	Sample Date	Cl	TDS	Benzene	Toluene	Ethyl Benzene	Total Xylenes	Sulfate	Comments
RW-1	XXX	98.85	XXX	Running	10/20/2017	520	1,320	<0.001	<0.001	<0.001	<0.003	229	Solar Pump Used to Purge
RW-1	XXX	98.85	XXX	100	1/16/2018	1,060	2,450	<0.001	<0.001	<0.001	<0.003	227	Solar pump used to purge
RW-1	XXX	98.85	XXX	100	4/26/2018	980	2,250	<0.001	<0.001	<0.001	<0.003	185	Solar pump used to purge
RW-1	XXX	98.85	XXX	100	8/2/2018	470	1,380	<0.001	<0.001	<0.001	<0.003	232	Solar pump used to purge
RW-1	XXX	98.85	XXX	100	10/30/2018	510	1,300	<0.001	<0.001	<0.001	<0.003	210	Solar pump used to purge
RW-1	XXX	98.85	xxx	100	2/4/2019	2,070	3,230	<0.001	<0.001	<0.001	<0.003	263	Solar pump used to purge
RW-1	XXX	98.85	XXX	100	4/22/2019	1,590	3,220	<0.001	<0.001	<0.001	<0.003	238	Solar pump used to purge
RW-1	XXX	98.85	XXX	Running	7/19/2019	450	1,350	<0.001	<0.001	<0.001	<0.003	196	Solar pump used to purge
RW-1	xxx	98.85	xxx	Running	10/23/2019	420	1,170	<0.001	<0.001	<0.001	<0.003	204	Solar pump used to purge





February 14, 2019

KATIE JONES

Rice Operating Company

112 W. Taylor

Hobbs, NM 88240

RE: BD SANTA RITA LEAK

Enclosed are the results of analyses for samples received by the laboratory on 02/07/19 15:55.

Cardinal Laboratories is accredited through Texas NELAP under certificate number T104704398-18-11. Accreditation applies to drinking water, non-potable water and solid and chemical materials. All accredited analytes are denoted by an asterisk (*). For a complete list of accredited analytes and matrices visit the TCEQ website at www.tceq.texas.gov/field/ga/lab accred certif.html.

Cardinal Laboratories is accreditated through the State of Colorado Department of Public Health and Environment for:

Method EPA 552.2 Haloacetic Acids (HAA-5)
Method EPA 524.2 Total Trihalomethanes (TTHM)
Method EPA 524.4 Regulated VOCs (V1, V2, V3)

Celey D. Keine

Accreditation applies to public drinking water matrices.

This report meets NELAP requirements and is made up of a cover page, analytical results, and a copy of the original chain-of-custody. If you have any questions concerning this report, please feel free to contact me.

Sincerely,

Celey D. Keene

Lab Director/Quality Manager



Rice Operating Company KATIE JONES 112 W. Taylor Hobbs NM, 88240

Fax To: (575) 397-1471

Received: 02/07/2019 Sampling Date: 02/04/2019
Reported: 02/14/2019 Sampling Type: Water

Project Name: BD SANTA RITA LEAK Sampling Condition: Cool & Intact
Project Number: NOT GIVEN Sample Received By: Tamara Oldaker

A | D.

Project Location: T22S R37E SEC27 A-LEA CTY., NM

Sample ID: MONITOR WELL #2 (H900489-01)

RPD 2.40	Qualifier
2.40	
1.01	
0.235	
0.952	
RPD	Qualifier
3.77	
3.77	
3.77 RPD	Qualifier
	Qualifier
RPD	Qualifier
RPD	Qualifier Qualifier
	0.952

Cardinal Laboratories *=Accredited Analyte

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Rice Operating Company KATIE JONES 112 W. Taylor Hobbs NM, 88240

Fax To: (575) 397-1471

Received: 02/07/2019 Sampling Date: 02/04/2019 Reported: 02/14/2019 Sampling Type: Water

Project Name: BD SANTA RITA LEAK Sampling Condition: Cool & Intact Sample Received By: Project Number: NOT GIVEN Tamara Oldaker

Project Location: T22S R37E SEC27 A-LEA CTY., NM

Sample ID: MONITOR WELL #3 (H900489-02)

BTEX 8021B	mg/	L	Analyze	d By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	< 0.001	0.001	02/10/2019	ND	0.023	114	0.0200	2.40	
Toluene*	< 0.001	0.001	02/10/2019	ND	0.022	108	0.0200	1.01	
Ethylbenzene*	< 0.001	0.001	02/10/2019	ND	0.022	108	0.0200	0.235	
Total Xylenes*	< 0.003	0.003	02/10/2019	ND	0.067	112	0.0600	0.952	
Total BTEX	<0.006	0.006	02/10/2019	ND					
Surrogate: 4-Bromofluorobenzene (PID	98.7	% 81.3-12	8						
Chloride, SM4500Cl-B	mg/	L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride*	440	4.00	02/11/2019	ND	104	104	100	3.77	
Sulfate 375.4	mg/	L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Sulfate*	220	50.0	02/12/2019	ND	22.9	115	20.0	6.39	
TDS 160.1	mg/	L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
TDS*	1200	5.00	02/12/2019	ND	524	99.4	527	2.58	
TDS*	1200	5.00	02/12/2019	ND	524	99.4	527	2.58	

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Rice Operating Company KATIE JONES 112 W. Taylor Hobbs NM, 88240

Fax To: (575) 397-1471

Received: 02/07/2019 Sampling Date: 02/04/2019 Reported: 02/14/2019 Sampling Type: Water Project Name: BD SANTA RITA LEAK Sampling Condition: Cool & Intact

Sample Received By: Project Number: NOT GIVEN Tamara Oldaker

Project Location: T22S R37E SEC27 A-LEA CTY., NM

Sample ID: MONITOR WELL #4 (H900489-03)

BTEX 8021B	mg/	L	Analyze	d By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	< 0.001	0.001	02/10/2019	ND	0.023	114	0.0200	2.40	
Toluene*	< 0.001	0.001	02/10/2019	ND	0.022	108	0.0200	1.01	
Ethylbenzene*	< 0.001	0.001	02/10/2019	ND	0.022	108	0.0200	0.235	
Total Xylenes*	<0.003	0.003	02/10/2019	ND	0.067	112	0.0600	0.952	
Total BTEX	<0.006	0.006	02/10/2019	ND					
Surrogate: 4-Bromofluorobenzene (PID	98.6 9	% 81.3-12	8						
Chloride, SM4500Cl-B	mg/	L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride*	620	4.00	02/11/2019	ND	104	104	100	3.77	
Sulfate 375.4	mg/	L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Sulfate*	235	50.0	02/12/2019	ND	22.9	115	20.0	6.39	
TDS 160.1	mg/	L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
TDS*	1500	5.00	02/12/2019	ND	524	99.4	527	2.58	

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02/04/2019



Analytical Results For:

Rice Operating Company KATIE JONES 112 W. Taylor Hobbs NM, 88240

Fax To: (575) 397-1471

Received: 02/07/2019 Sampling Date: Reported: 02/14/2019 Sampling Type:

Water Project Name: BD SANTA RITA LEAK Sampling Condition: Cool & Intact Sample Received By: Project Number: NOT GIVEN Tamara Oldaker

Analyzed By: me

Project Location: T22S R37E SEC27 A-LEA CTY., NM

Sample ID: RECOVERY WELL #1 (H900489-04)

RTFY 8021R

BIEX 8021B	mg/	<u> </u>	Anaiyze	a By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.001	0.001	02/10/2019	ND	0.023	114	0.0200	2.40	
Toluene*	<0.001	0.001	02/10/2019	ND	0.022	108	0.0200	1.01	
Ethylbenzene*	<0.001	0.001	02/10/2019	ND	0.022	108	0.0200	0.235	
Total Xylenes*	<0.003	0.003	02/10/2019	ND	0.067	112	0.0600	0.952	
Total BTEX	<0.006	0.006	02/10/2019	ND					
Surrogate: 4-Bromofluorobenzene (PID	101 %	% 81.3-12	8						
Chloride, SM4500CI-B	mg/	L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride*	2070	4.00	02/11/2019	ND	104	104	100	3.77	
Sulfate 375.4	mg/	L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Sulfate*	263	50.0	02/12/2019	ND	22.9	115	20.0	6.39	
TDS 160.1	mg/	L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
TDS*	3230	5.00	02/12/2019	ND	524	99.4	527	2.58	

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Notes and Definitions

ND Analyte NOT DETECTED at or above the reporting limit

RPD Relative Percent Difference

** Samples not received at proper temperature of 6°C or below.

*** Insufficient time to reach temperature.

Chloride by SM4500Cl-B does not require samples be received at or below 6°C

Samples reported on an as received basis (wet) unless otherwise noted on report

Cardinal Laboratories *=Accredited Analyte

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ONLY		(G)rab or (C)omp	# CONTAINERS	WATER	SOIL	兴	SLUDGE	HCL (2 40ml VOA)	HNO ₃	NaHSO₄	H ₂ SO ₄	ICE (1-1Liter HDPE)	NONE	DATE (2019)	TIME	MTBE 8021B/602	BTEX 8021B/602	표	PAH 8270C		뚮	TCLP Semi Volatiles	TCLP Pesticides	RCI	GC/MS Vol. 8260B/624	C/N	PCB's 8082/608	Pesticides 8081A/608	BOD, TSS, pH	Moisture Content	[]	Sulfates (SO4)	Total Dissolved Solids	Chlorides	E
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May 02, 2019

KATIE JONES

Rice Operating Company

112 W. Taylor

Hobbs, NM 88240

RE: BD SANTA RITA LEAK

Enclosed are the results of analyses for samples received by the laboratory on 04/25/19 14:51.

Cardinal Laboratories is accredited through Texas NELAP under certificate number T104704398-18-11. Accreditation applies to drinking water, non-potable water and solid and chemical materials. All accredited analytes are denoted by an asterisk (*). For a complete list of accredited analytes and matrices visit the TCEQ website at www.tceq.texas.gov/field/ga/lab accred certif.html.

Cardinal Laboratories is accreditated through the State of Colorado Department of Public Health and Environment for:

Method EPA 552.2 Haloacetic Acids (HAA-5)
Method EPA 524.2 Total Trihalomethanes (TTHM)
Method EPA 524.4 Regulated VOCs (V1, V2, V3)

Celey D. Keine

Accreditation applies to public drinking water matrices.

This report meets NELAP requirements and is made up of a cover page, analytical results, and a copy of the original chain-of-custody. If you have any questions concerning this report, please feel free to contact me.

Sincerely,

Celey D. Keene

Lab Director/Quality Manager



Rice Operating Company KATIE JONES 112 W. Taylor Hobbs NM, 88240

Fax To: (575) 397-1471

Received: 04/25/2019 Sampling Date: 04/22/2019
Reported: 05/02/2019 Sampling Type: Water

Project Name: BD SANTA RITA LEAK Sampling Condition: Cool & Intact
Project Number: NOT GIVEN Sample Received By: Jodi Henson

A | D.

Project Location: T22S R37E SEC27 A-LEA CTY., NM

Sample ID: MONITOR WELL #2 (H901492-01)

BTEX 8021B	mg/	L	Analyze	d By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.001	0.001	04/27/2019	ND	0.021	104	0.0200	1.04	
Toluene*	< 0.001	0.001	04/27/2019	ND	0.021	107	0.0200	0.520	
Ethylbenzene*	< 0.001	0.001	04/27/2019	ND	0.020	102	0.0200	0.0147	
Total Xylenes*	<0.003	0.003	04/27/2019	ND	0.062	103	0.0600	1.67	
Total BTEX	<0.006	0.006	04/27/2019	ND					
Surrogate: 4-Bromofluorobenzene (PID	98.6	% 81.3-12	8						
Chloride, SM4500CI-B	mg/	L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride*	44.0	4.00	04/30/2019	ND	108	108	100	3.77	
Sulfate 375.4	mg/	L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Sulfate*	88.0	25.0	05/01/2019	ND	20.5	103	20.0	12.7	
TDS 160.1	mg/	L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
TDS*	360	5.00	05/01/2019	ND	554	105	527	26.0	

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Rice Operating Company KATIE JONES 112 W. Taylor Hobbs NM, 88240

Fax To: (575) 397-1471

Received: 04/25/2019 Sampling Date: 04/22/2019 Reported: 05/02/2019 Sampling Type: Water Project Name: BD SANTA RITA LEAK Sampling Condition: Cool & Intact Sample Received By: Project Number: NOT GIVEN Jodi Henson

Project Location: T22S R37E SEC27 A-LEA CTY., NM

Sample ID: MONITOR WELL #3 (H901492-02)

BTEX 8021B	mg/	'L	Analyze	d By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	< 0.001	0.001	04/27/2019	ND	0.021	104	0.0200	1.04	
Toluene*	< 0.001	0.001	04/27/2019	ND	0.021	107	0.0200	0.520	
Ethylbenzene*	< 0.001	0.001	04/27/2019	ND	0.020	102	0.0200	0.0147	
Total Xylenes*	<0.003	0.003	04/27/2019	ND	0.062	103	0.0600	1.67	
Total BTEX	<0.006	0.006	04/27/2019	ND					
Surrogate: 4-Bromofluorobenzene (PID	98.0	% 81.3-12	8						
Chloride, SM4500CI-B	mg/	'L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride*	528	4.00	04/30/2019	ND	108	108	100	3.77	
Sulfate 375.4	mg/	'L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Sulfate*	243	50.0	05/01/2019	ND	20.5	103	20.0	12.7	
TDS 160.1	mg/	'L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
TDS*	1510	5.00	05/01/2019	ND	554	105	527	26.0	

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Rice Operating Company KATIE JONES 112 W. Taylor Hobbs NM, 88240

Fax To: (575) 397-1471

Received: 04/25/2019 Sampling Date: 04/22/2019 Reported: 05/02/2019 Sampling Type: Water Project Name: BD SANTA RITA LEAK Sampling Condition: Cool & Intact Sample Received By: Project Number: NOT GIVEN Jodi Henson

Project Location: T22S R37E SEC27 A-LEA CTY., NM

Sample ID: MONITOR WELL #4 (H901492-03)

BTEX 8021B	mg/	L	Analyze	d By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.001	0.001	04/27/2019	ND	0.021	104	0.0200	1.04	
Toluene*	<0.001	0.001	04/27/2019	ND	0.021	107	0.0200	0.520	
Ethylbenzene*	<0.001	0.001	04/27/2019	ND	0.020	102	0.0200	0.0147	
Total Xylenes*	<0.003	0.003	04/27/2019	ND	0.062	103	0.0600	1.67	
Total BTEX	<0.006	0.006	04/27/2019	ND					
Surrogate: 4-Bromofluorobenzene (PID	97.5 9	% 81.3-12	8						
Chloride, SM4500Cl-B	mg/	L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride*	432	4.00	04/30/2019	ND	108	108	100	3.77	
Sulfate 375.4	mg/	L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Sulfate*	246	50.0	05/01/2019	ND	20.5	103	20.0	12.7	
TDS 160.1	mg/	L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
TDS*	1210	5.00	05/01/2019	ND	554	105	527	26.0	

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Rice Operating Company KATIE JONES 112 W. Taylor Hobbs NM, 88240 Fax To: (575) 397-1471

Received: 04/25/2019 Sampling Date: 04/22/2019 Reported: 05/02/2019 Sampling Type: Water Project Name: BD SANTA RITA LEAK Sampling Condition: Cool & Intact Sample Received By: Project Number: NOT GIVEN Jodi Henson

Project Location: T22S R37E SEC27 A-LEA CTY., NM

Sample ID: RECOVERY WELL #1 (H901492-04)

	•	/							
BTEX 8021B	mg/	L	Analyze	d By: ms					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	< 0.001	0.001	04/27/2019	ND	0.021	104	0.0200	1.04	
Toluene*	< 0.001	0.001	04/27/2019	ND	0.021	107	0.0200	0.520	
Ethylbenzene*	< 0.001	0.001	04/27/2019	ND	0.020	102	0.0200	0.0147	
Total Xylenes*	<0.003	0.003	04/27/2019	ND	0.062	103	0.0600	1.67	
Total BTEX	<0.006	0.006	04/27/2019	ND					
Surrogate: 4-Bromofluorobenzene (PID	95.7	% 81.3-12	8						
Chloride, SM4500Cl-B	mg/	L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride*	1590	4.00	04/30/2019	ND	108	108	100	3.77	
Sulfate 375.4	mg/	L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Sulfate*	238	50.0	05/01/2019	ND	20.5	103	20.0	12.7	
TDS 160.1	mg/	L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
TDS*	3220	5.00	05/01/2019	ND	554	105	527	26.0	

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Notes and Definitions

ND Analyte NOT DETECTED at or above the reporting limit

RPD Relative Percent Difference

** Samples not received at proper temperature of 6°C or below.

*** Insufficient time to reach temperature.

Chloride by SM4500Cl-B does not require samples be received at or below 6°C

Samples reported on an as received basis (wet) unless otherwise noted on report

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H901492		(G)rab or (C)omp	# CONTAINERS	WATER	SOIL	AR	SL	HCL (2 40ml VOA)	HNO3	NaHSO4	H ₂ SO ₄	ICE (1-1Liter HDPE)	NONE	DATE (2019)	TIME	MTBE	BTEX 8021B/602	Ⅱ	PAH 8270C	Cota		TCLP Semi Volatiles	TCLP Pesticides	RCI	GC/MS Vol. 8260B/624	3C/N	PCB's 8082/608	Pesticides 8081A/608	BOD, TSS, pH	Moisture Content	Cations (Ca. Mo.	Sulfates (SO4)	Total Dissolved Solids	Chlorides	E
1	Monitor Well #2	G	3	Х				2	T			1		4/22	8:50		х		7	+	Ť	Ť			Ŭ	Ĭ		7	_	+	۲	X		х	F
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4	Recovery Well #1	G	3	х		П		2	-	\vdash	\vdash	1	П	4/22		-	х	\neg	\forall	+	+		Н	Н		\neg	\dashv	+	+	+	+	$\overline{}$	X	X	
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Rozanne Johnson	1 4/25/2019 14:50	1										2				Fax	Res	ults		Т	Ye	s		No		hhA	ition	al Fa	ax N	lumb	er.				
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Delivered By: (Circle One)	Sample	Conditi	on	JF		T	CH	ECK	ED I	RV:	7	111	1	-1		Lilla	III PC	csu	its.								•		L					
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July 29, 2019

KATIE JONES

Rice Operating Company

112 W. Taylor

Hobbs, NM 88240

RE: BD SANTA RITA LEAK

Enclosed are the results of analyses for samples received by the laboratory on 07/23/19 14:15.

Cardinal Laboratories is accredited through Texas NELAP under certificate number T104704398-18-11. Accreditation applies to drinking water, non-potable water and solid and chemical materials. All accredited analytes are denoted by an asterisk (*). For a complete list of accredited analytes and matrices visit the TCEQ website at www.tceq.texas.gov/field/ga/lab accred certif.html.

Cardinal Laboratories is accreditated through the State of Colorado Department of Public Health and Environment for:

Method EPA 552.2 Haloacetic Acids (HAA-5)
Method EPA 524.2 Total Trihalomethanes (TTHM)
Method EPA 524.4 Regulated VOCs (V1, V2, V3)

Celey D. Keine

Accreditation applies to public drinking water matrices.

This report meets NELAP requirements and is made up of a cover page, analytical results, and a copy of the original chain-of-custody. If you have any questions concerning this report, please feel free to contact me.

Sincerely,

Celey D. Keene

Lab Director/Quality Manager

07/19/2019

Water



Analytical Results For:

Rice Operating Company KATIE JONES 112 W. Taylor Hobbs NM, 88240

Fax To: (575) 397-1471

Received: 07/23/2019 Sampling Date: Reported: 07/29/2019 Sampling Type:

Project Name: BD SANTA RITA LEAK Sampling Condition: Cool & Intact
Project Number: NOT GIVEN Sample Received By: Tamara Oldaker

Project Location: T22S R37E SEC27 A-LEA CTY., NM

Sample ID: MONITOR WELL #2 (H902536-01)

mg/	'L	Analyze	d By: MS					
Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
<0.001	0.001	07/26/2019	ND	0.019	93.7	0.0200	0.468	
<0.001	0.001	07/26/2019	ND	0.018	89.2	0.0200	3.72	
<0.001	0.001	07/26/2019	ND	0.019	93.8	0.0200	3.77	
<0.003	0.003	07/26/2019	ND	0.053	88.1	0.0600	3.89	
<0.006	0.006	07/26/2019	ND					
108 9	% 81.3-12	8						
mg/	'L	Analyze	d By: AC					
Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
48.0	4.00	07/24/2019	ND	100	100	100	3.92	
mg/	'L	Analyze	d By: AC					
Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
101	25.0	07/29/2019	ND	24.0	120	20.0	8.47	
mg/	'L	Analyze	d By: AC					
mg/ Result	Reporting Limit	Analyze Analyzed	d By: AC Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
	Result <0.001 <0.001 <0.001 <0.003 <0.006 108 9 mg/ Result 48.0 mg/ Result	Result Reporting Limit <0.001	Result Reporting Limit Analyzed <0.001	Result Reporting Limit Analyzed Method Blank <0.001	Result Reporting Limit Analyzed Method Blank BS <0.001	Result Reporting Limit Analyzed Method Blank BS % Recovery <0.001	Result Reporting Limit Analyzed Method Blank BS % Recovery True Value QC <0.001	Result Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD <0.001

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Rice Operating Company KATIE JONES 112 W. Taylor Hobbs NM, 88240

Fax To: (575) 397-1471

Received: 07/23/2019
Reported: 07/29/2019
Project Name: BD SANTA RITA LEAK

Project Name: BD SANTA RIT Project Number: NOT GIVEN

Project Location: T22S R37E SEC27 A-LEA CTY., NM

Sampling Date: 07/19/2019 Sampling Type: Water

Sampling Condition: Cool & Intact
Sample Received By: Tamara Oldaker

Sample ID: MONITOR WELL #3 (H902536-02)

BTEX 8021B	mg/	L	Analyze	d By: MS					
Analyte			Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.001	0.001	07/26/2019	ND	0.019	93.7	0.0200	0.468	
Toluene*	< 0.001	0.001	07/26/2019	ND	0.018	89.2	0.0200	3.72	
Ethylbenzene*	< 0.001	0.001	07/26/2019	ND	0.019	93.8	0.0200	3.77	
Total Xylenes*	<0.003	0.003	07/26/2019	ND	0.053	88.1	0.0600	3.89	
Total BTEX	<0.006	0.006	07/26/2019	ND					
Surrogate: 4-Bromofluorobenzene (PID	107 %	6 81.3-12	18						
Chloride, SM4500CI-B	mg/	L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride*	428	4.00	07/24/2019	ND	100	100	100	3.92	
Sulfate 375.4	mg/	L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Sulfate*	227	50.0	07/29/2019	ND	24.0	120	20.0	8.47	
TDS 160.1	mg/	L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
TDS*	1340	5.00	07/25/2019	ND	516	97.9	527	2.51	

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Rice Operating Company KATIE JONES 112 W. Taylor Hobbs NM, 88240

Fax To: (575) 397-1471

Received: 07/23/2019 Reported: 07/29/2019

Project Name: BD SANTA RITA LEAK
Project Number: NOT GIVEN

Project Location: T22S R37E SEC27 A-LEA CTY., NM

Sampling Date: 07/19/2019 Sampling Type: Water

Sampling Condition: Cool & Intact
Sample Received By: Tamara Oldaker

Sample ID: MONITOR WELL #4 (H902536-03)

BTEX 8021B	mg/	L	Analyze	d By: MS					
Analyte	Result Reporting Limit <0.001 0.001 <0.001 0.001		Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	< 0.001	0.001	07/26/2019	ND	0.019	93.7	0.0200	0.468	
Toluene*	< 0.001	0.001	07/26/2019	ND	0.018	89.2	0.0200	3.72	
Ethylbenzene*	< 0.001	0.001	07/26/2019	ND	0.019	93.8	0.0200	3.77	
Total Xylenes*	<0.003	0.003	07/26/2019	ND	0.053	88.1	0.0600	3.89	
Total BTEX	<0.006	0.006	07/26/2019	ND					
Surrogate: 4-Bromofluorobenzene (PID	118 %	6 81.3-12	8						
Chloride, SM4500Cl-B	mg/	L	Analyze	d By: AC					
Analyte	mg/L Result Reporting Limit		Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride*	448	4.00	07/24/2019	ND	100	100	100	3.92	
Sulfate 375.4	mg/	L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Sulfate*	228	50.0	07/29/2019	ND	24.0	120	20.0	8.47	
TDS 160.1	mg/	L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
TDS*	1330	5.00	07/25/2019	ND	516	97.9	527	2.51	

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Rice Operating Company KATIE JONES 112 W. Taylor Hobbs NM, 88240 Fax To: (575) 397-1471

Received: 07/23/2019 Reported: 07/29/2019

Project Name: BD SANTA RITA LEAK
Project Number: NOT GIVEN

Project Location: T22S R37E SEC27 A-LEA CTY., NM

Sampling Date: 07/19/2019 Sampling Type: Water

Sampling Condition: Cool & Intact
Sample Received By: Tamara Oldaker

Sample ID: RECOVERY WELL #1 (H902536-04)

BTEX 8021B	mg/	'L	Analyze	d By: MS					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.001	0.001	07/26/2019	ND	0.019	93.7	0.0200	0.468	
Toluene*	< 0.001	0.001	07/26/2019	ND	0.018	89.2	0.0200	3.72	
Ethylbenzene*	< 0.001	0.001	07/26/2019	ND	0.019	93.8	0.0200	3.77	
Total Xylenes*	<0.003	0.003	07/26/2019	ND	0.053	88.1	0.0600	3.89	
Total BTEX	<0.006	0.006	07/26/2019	ND					
Surrogate: 4-Bromofluorobenzene (PID	107 9	% 81.3-12	8						
Chloride, SM4500Cl-B	mg/	'L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride*	450	4.00	07/24/2019	ND	100	100	100	3.92	
Sulfate 375.4	mg/	'L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Sulfate*	196	50.0	07/29/2019	ND	24.0	120	20.0	8.47	
TDS 160.1	mg/	'L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
TDS*	1350	5.00	07/25/2019	ND	516	97.9	527	2.51	

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Notes and Definitions

ND Analyte NOT DETECTED at or above the reporting limit

RPD Relative Percent Difference

** Samples not received at proper temperature of 6°C or below.

*** Insufficient time to reach temperature.

Chloride by SM4500Cl-B does not require samples be received at or below 6°C

Samples reported on an as received basis (wet) unless otherwise noted on report

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Katie Jones			122 W	Taylo	or Stre	eet ~ Ho	bbs,	New	Mexi	co 882	40							1															
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/ LAB USE \		٦	(G)rab or (C)omp # CONTAINERS WATER SOIL AIR SLUDGE SLUDGE HCL (2 40ml VOA) HNO3 NAHSO4 ICE (1-1Liter HDPE) NONE DATE (2019) TIME								021	121E	5	8	als	atile	盲	stici		<u>-</u>	eml (co	700	0 0	3 8	5 6	SO S	Sol	"	밀				
. ONLY		g	(G)rab or (C)omp # CONTAINER WATER SOIL AIR SLUDGE SLUDGE HVC (2 40ml VOA) HNO3 NAHSO4 H2SO4 ICE (1-1 Liter HDPE) NONE DATE (2019) TIME									8	8	418	82	Me	18	Se	Pe		2	2 2	9 3	E S	2 2	0) SI	les les	Si	ide	Aro			
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November 01, 2019

KATIE JONES

Rice Operating Company

112 W. Taylor

Hobbs, NM 88240

RE: BD SANTA RITA LEAK

Enclosed are the results of analyses for samples received by the laboratory on 10/24/19 14:55.

Cardinal Laboratories is accredited through Texas NELAP under certificate number T104704398-19-12. Accreditation applies to drinking water, non-potable water and solid and chemical materials. All accredited analytes are denoted by an asterisk (*). For a complete list of accredited analytes and matrices visit the TCEQ website at www.tceq.texas.gov/field/ga/lab accred certif.html.

Cardinal Laboratories is accreditated through the State of Colorado Department of Public Health and Environment for:

Method EPA 552.2 Haloacetic Acids (HAA-5)
Method EPA 524.2 Total Trihalomethanes (TTHM)
Method EPA 524.4 Regulated VOCs (V1, V2, V3)

Accreditation applies to public drinking water matrices.

Celey D. Keine

This report meets NELAP requirements and is made up of a cover page, analytical results, and a copy of the original chain-of-custody. If you have any questions concerning this report, please feel free to contact me.

Sincerely,

Celey D. Keene

Lab Director/Quality Manager



Rice Operating Company KATIE JONES 112 W. Taylor Hobbs NM, 88240

Fax To: (575) 397-1471

Received: 10/24/2019 Sampling Date: 10/23/2019
Reported: 11/01/2019 Sampling Type: Water

Project Name: BD SANTA RITA LEAK Sampling Condition: Cool & Intact
Project Number: NOT GIVEN Sample Received By: Tamara Oldaker

A ... - L ... - - - I D. .. MC

Project Location: T22S R37E SEC27 A-LEA CTY., NM

Sample ID: MONITOR WELL #2 (H903653-01)

Benzene* <0.001	BTEX 8021B	mg/	L	Analyze	d By: MS					S-04
Toluene* <0.001	Analyte	, ,		Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Ethylbenzene* <0.001 0.001 10/30/2019 ND 0.022 108 0.0200 5.41	Benzene*	< 0.001	0.001	10/30/2019	ND	0.022	110	0.0200	2.88	
Total Xylenes* < 0.003	Toluene*	< 0.001	0.001	10/30/2019	ND	0.019	96.8	0.0200	0.762	
Total BTEX	Ethylbenzene*	< 0.001	0.001	10/30/2019	ND	0.022	108	0.0200	5.41	
Surrogate: 4-Bromofluorobenzene (PID 111 % 74-98 Chloride, SM4500Cl-B mg/L Analyzed By: AC Analyte Result Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Qualif Qualif Chloride* 40.0 4.00 10/25/2019 ND 100 100 100 3.92 Sulfate 375.4 mg/L Analyzed By: AC Analyte Result Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Qualif Qualif Sulfate* 87.0 25.0 10/25/2019 ND 23.9 120 20.0 10.7 20.0 10.7 TDS 160.1 mg/L Analyzed By: AC Analyzed Method Blank BS % Recovery True Value QC RPD Qualif Qualif Analyte Result Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Qualif Qualif	Total Xylenes*	<0.003	0.003	10/30/2019	ND	0.061	102	0.0600	0.991	
Chloride, SM4500Cl-B mg/L Analyzed By: AC Analyte Result Reporting Limit Analyzed Analyzed Prince Pri	Total BTEX	<0.006 0.006		10/30/2019	ND					
Analyte Result Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Qualification Chloride* 40.0 4.00 10/25/2019 ND 100 100 100 100 3.92 Sulfate 375.4 mg/L Analyzed By: AC Analyte Result Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Qualification Company Com	Surrogate: 4-Bromofluorobenzene (PID	111 % 74-98								
Chloride* 40.0 4.00 10/25/2019 ND 100 100 100 3.92 Sulfate 375.4 mg/L Analyzed By: AC Analyte Result Reporting Limit Reporting Limit Analyzed Method Blank BS Recovery True Value QC RPD Qualified Processing Result Reporting Limit Analyzed By: AC ND 23.9 120 20.0 20.0 10.7 TDS 160.1 mg/L Analyzed By: AC Analyzed By: AC Recovery True Value QC RPD Qualified Reporting Limit Analyzed Method Blank BS Recovery True Value QC RPD Qualified Reporting Limit Reporting Limit Reporting Limit Analyzed Reporting Limit Reporting Li	Chloride, SM4500CI-B	mg/	L	Analyze	d By: AC					
Sulfate 375.4 mg/L Analyzed By: AC Analyte Result Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Qualification Sulfate* 87.0 25.0 10/25/2019 ND 23.9 120 20.0 10.7 TDS 160.1 mg/L Analyzed By: AC Analyte Result Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Qualification	Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Analyte Result Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Qualifications and Sulfate* 87.0 25.0 10/25/2019 ND 23.9 120 20.0 10.7 TDS 160.1 mg/L Analyzed By: AC Analyte Result Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Qualifications and Sulfate Result Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Qualifications and Sulfate Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Qualifications and Sulfate Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Qualifications and Sulfate Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Qualifications and Sulfate Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Qualifications and Sulfate Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Qualifications and Sulfate Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Qualifications and Sulfate Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Qualifications and Sulfate Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Qualifications and Sulfate Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Qualifications and Sulfate Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Qualifications and Sulfate Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Qualifications and Sulfate Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Qualifications and Sulfate Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Qualifications and Sulfate Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Qualifications and Sulfate Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Qualifications and Sulfate Reporting Limit Analyzed RPD QUALIFICATION Analyze	Chloride*	40.0	4.00	10/25/2019	ND	100	100	100	3.92	
Sulfate* 87.0 25.0 10/25/2019 ND 23.9 120 20.0 10.7 TDS 160.1 mg/L Analyzed By: AC Analyzed By: AC Result Result Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Qualification	Sulfate 375.4	mg/	L	Analyze	d By: AC					
TDS 160.1 mg/L Analyzed By: AC Analyte Result Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Qualif	Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Analyte Result Reporting Limit Analyzed Method Blank BS % Recovery True Value QC RPD Qualif	Sulfate*	87.0	25.0	10/25/2019	ND	23.9	120	20.0	10.7	
, , , , , , , , , , , , , , , , , , , ,	TDS 160.1	mg/	L	Analyze	d By: AC					
TDS* 416 5.00 10/30/2019 ND 522 99.1 527 1.90	Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
	TDS*	416	5.00	10/30/2019	ND	522	99.1	527	1.90	

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Tamara Oldaker

Sample Received By:



Analytical Results For:

Rice Operating Company KATIE JONES 112 W. Taylor Hobbs NM, 88240 Fax To: (575) 397-1471

Received:10/24/2019Sampling Date:10/23/2019Reported:11/01/2019Sampling Type:WaterProject Name:BD SANTA RITA LEAKSampling Condition:Cool & Intact

Project Location: T22S R37E SEC27 A-LEA CTY., NM

NOT GIVEN

Sample ID: MONITOR WELL #3 (H903653-02)

Project Number:

BTEX 8021B	mg/	L	Analyze	d By: MS					S-04
Analyte			Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.001	0.001	10/30/2019	ND	0.022	110	0.0200	2.88	
Toluene*	< 0.001	0.001	10/30/2019	ND	0.019	96.8	0.0200	0.762	
Ethylbenzene*	<0.001	0.001	10/30/2019	ND	0.022	108	0.0200	5.41	
Total Xylenes*	<0.003	0.003	10/30/2019	ND	0.061	102	0.0600	0.991	
Total BTEX	<0.006	0.006	10/30/2019	ND					
Surrogate: 4-Bromofluorobenzene (PID	101 % 74-98								
Chloride, SM4500CI-B	mg/	L	Analyze	d By: AC					
Analyte	Result	mg/L Lesult Reporting Limit Ar		Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride*	396	4.00	10/25/2019	ND	100	100	100	3.92	
Sulfate 375.4	mg/	L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Sulfate*	205	50.0	10/25/2019	ND	23.9	120	20.0	10.7	
TDS 160.1	mg/	L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
TDS*	1200	5.00	10/30/2019	ND	522	99.1	527	1.90	

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Tamara Oldaker



Analytical Results For:

Rice Operating Company KATIE JONES 112 W. Taylor Hobbs NM, 88240 Fax To: (575) 397-1471

Received: 10/24/2019 Sampling Date: 10/23/2019 Reported: 11/01/2019 Sampling Type: Water Project Name: BD SANTA RITA LEAK Sampling Condition: Cool & Intact Project Number: Sample Received By:

Project Location: T22S R37E SEC27 A-LEA CTY., NM

NOT GIVEN

Sample ID: MONITOR WELL #4 (H903653-03)

BTEX 8021B	mg/	L	Analyze	d By: MS					S-04
Analyte	, ,		Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.001	0.001	10/30/2019	ND	0.022	110	0.0200	2.88	
Toluene*	< 0.001	0.001	10/30/2019	ND	0.019	96.8	0.0200	0.762	
Ethylbenzene*	< 0.001	0.001	10/30/2019	ND	0.022	108	0.0200	5.41	
Total Xylenes*	<0.003	0.003	10/30/2019	ND	0.061	102	0.0600	0.991	
Total BTEX	<0.006	0.006	10/30/2019	ND					
Surrogate: 4-Bromofluorobenzene (PID	104 % 74-98								
Chloride, SM4500CI-B	mg/	L	Analyze	d By: AC					
Analyte	Result	mg/L esult Reporting Limit A		Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride*	380	4.00	10/25/2019	ND	100	100	100	3.92	
Sulfate 375.4	mg/	L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Sulfate*	214	50.0	10/25/2019	ND	23.9	120	20.0	10.7	
TDS 160.1	mg/	L	Analyze	d By: AC					
Analyte	Result Reporting Limit		Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
TDS*	1210	5.00	10/30/2019	ND	522	99.1	527	1.90	

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Tamara Oldaker

Sample Received By:



Analytical Results For:

Rice Operating Company KATIE JONES 112 W. Taylor Hobbs NM, 88240 Fax To: (575) 397-1471

Received:10/24/2019Sampling Date:10/23/2019Reported:11/01/2019Sampling Type:WaterProject Name:BD SANTA RITA LEAKSampling Condition:Cool & Intact

Project Location: T22S R37E SEC27 A-LEA CTY., NM

NOT GIVEN

Sample ID: RECOVERY WELL #1 (H903653-04)

Project Number:

BTEX 8021B	mg/	L	Analyze	d By: MS					S-04
Analyte	, 5		Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Benzene*	<0.001	0.001	10/31/2019	ND	0.022	110	0.0200	2.88	
Toluene*	< 0.001	0.001	10/31/2019	ND	0.019	96.8	0.0200	0.762	
Ethylbenzene*	<0.001	0.001	10/31/2019	ND	0.022	108	0.0200	5.41	
Total Xylenes*	<0.003	0.003	10/31/2019	ND	0.061	102	0.0600	0.991	
Total BTEX	<0.006	0.006	10/31/2019	ND					
Surrogate: 4-Bromofluorobenzene (PID	103 % 74-98								
Chloride, SM4500Cl-B	mg/	L	Analyze	d By: AC					
Analyte	Result	mg/L Result Reporting Limit A		Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Chloride*	420	4.00	10/25/2019	ND	100	100	100	3.92	
Sulfate 375.4	mg/	L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
Sulfate*	204	50.0	11/01/2019	ND	23.9	120	20.0	10.7	
TDS 160.1	mg/	L	Analyze	d By: AC					
Analyte	Result	Reporting Limit	Analyzed	Method Blank	BS	% Recovery	True Value QC	RPD	Qualifier
TDS*	1170	5.00	11/01/2019	ND	522	99.1	527	1.90	

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Notes and Definitions

S-04 The surrogate recovery for this sample is outside of established control limits due to a sample matrix effect.

QR-02 The RPD result exceeded the QC control limits; however, both percent recoveries were acceptable. Sample results for the QC

batch were accepted based on percent recoveries and completeness of QC data.

ND Analyte NOT DETECTED at or above the reporting limit

RPD Relative Percent Difference

** Samples not received at proper temperature of 6°C or below.

*** Insufficient time to reach temperature.

- Chloride by SM4500Cl-B does not require samples be received at or below 6°C

Samples reported on an as received basis (wet) unless otherwise noted on report

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Celeg D. Freene

Page 1 of 1

101 East Marland - H	101 East Marland - Hobbs, NM 88240 Tel (575) 393-2326 Fax (575) 393-2476 Cardinal Laboratories, Inc. CHAIN-OF-CUSTODY AND ANALYSIS REQUEST LAB Order ID #																																	
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,		(<u>G</u>	# CONTAINERS	WATER	SOIL	AIR	3	HCL (2 40ml VOA)	HNO ₃	NaHSO ₄	2 1	NONE (1-1 Liter HDPE)	DATE (2019)	TIME	MTBE	BTEX	퓬	PAH 8270C	E E	님	TCLP Semi Volatiles	TCLP Pesticides	5	GC/MS Vol. 8260B/624	S/W	PCB's 8082/608	Pesticides 8081A/608	BOD, TSS, pH	Moisture Content	Anions (Cl, SO4,	Cations (Ca, Mg, Na, K) Sulfates (SO4)	Total Dissolved Solids	Chlorides	n A
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4	Recovery Well #1	G	3	x			\vdash	2	+	+	1	-		12:00	_	X	-	+	+	\vdash	Н		_		\Box	\dashv	\dashv	\dashv	4	\downarrow	X	X	Х	
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