505 East Huntland Drive
Suite 250
Austin, TX 78752

512.329.6080 PHONE
512.329.8750 FAX

www.TRCsolutions.com

STATE OF TEXAS
3/17/09
ARSIN M. SAHBA
GEOLOGY
No. 4041
LICENSED
PROFESSIONAL GEOSCIENTIST

March 17, 2009

Mr. Bill Renfro, P.G.
Railroad Commission of Texas
William B. Travis Building
1701 North Congress
PO Box 12967
Austin, Texas 78711-2967

Re: January 2009 Wendkirk BMP Sampling Event Results, Upper Colorado River Segment 1426 Downstream from E. V. Spence Reservoir, Wendkirk Oil Field, Coke County, Texas

Dear Mr. Renfro:

The purpose of this report is to present the results of the Best Management Practice (BMP) monitoring activities conducted during January 2009 at the Wendkirk Oil Field in Coke County, Texas. The Railroad Commission of Texas (RRC) requested that TRC perform additional sampling to monitor the affect of the implemented BMP and obtain additional data for temporal evaluation.

INTRODUCTION

The RRC, Oil and Gas Division, received a Section 319 Non-Point Source (NPS) grant from the United States Environmental Protection Agency (USEPA) through the Texas Commission on Environmental Quality (TCEQ) to determine if oil and gas operations in the Wendkirk Oil Field are contributing to the high saline water in the Colorado River. The objective of the grant was to assess and determine the source(s) leading to the elevated salinity in the Machae Creek Area of the Colorado River, develop BMPs to reduce salinity, and implement the BMPs. The Wendkirk Oil Field is located at the downstream extent of the Machae Creek Area as illustrated in Figure 1.

Previous site investigations conducted under the NPS grant indicated that the Mays-01 water well may be a potential vertical conduit for saline impacts from the Coleman Junction formation, which is approximately 2,500 feet below ground surface and contains predominantly high sodium/chloride water. Although data collected from the Mays-01 water well were inconclusive in verifying the water well as a conduit, the well was plugged by the RRC on July 9, 2008, as a

recommended BMP in order to prevent any potential influence from deeper formations via the Mays-01 well. During the plugging of the Mays-01 water well, it was determined that the total depth of the well (190 feet) was not sufficient to provide a conduit to the Coleman Junction formation. The Mays-01 water well does not appear to be a pathway for saline water to migrate from deeper formations.

The objective of the January 2009 monitoring event was to obtain additional groundwater and surface water analytical data to supplement the previous site investigation results and determine the affects, if any, of the BMP (plugging of Mays-01 well). This report presents the data collected from the January 2009 monitoring event.

GROUNDWATER AND SURFACE WATER MONITORING

TRC conducted groundwater monitoring activities at the Wendkirk Oil Field from January 19 through 22, 2009. Field activities were completed in accordance with the Work Order submitted to the RRC by TRC on November 7, 2008. TRC personnel coordinated field activities with the RRC San Angelo District 7C office to obtain access to sample locations which are located on private property.

The BMP sampling event was performed in accordance with previously developed site investigation Work Plans and the project-specific Quality Assurance Project Plan (QAPP). Completed field activities included synoptic well gauging, surface water sampling, groundwater sampling, seep/spring water sampling, Quality Assurance/Quality Control (QA/QC) sampling, and managing investigation-derived waste (IDW). Sampling was completed in accordance with the Work Order with the exception that a water sample was not collected from upstream seep location 4314102 because it was dry when the sampling event was completed. A summary of the sample locations, sample identifications, sample dates, and laboratory analyses are provided in Table 1. The surface water, groundwater, seep/spring water sample locations are depicted in Figure 2.

A synoptic fluid level gauging event was conducted prior to groundwater sampling. The wells were purged and sampled using disposable polyvinyl chloride (PVC) bailers. Field parameters including temperature, conductivity, pH, total dissolved solids (TDS), and oxidation-reduction potential (ORP) were collected during well purging and from each seep/surface water sample location. The field parameter results are provided in Attachment 1.

Water samples collected from surface water, groundwater, and seep/spring locations were submitted for the following laboratory analyses:

- Anions (chloride, sulfate, bromide) by EPA Method E300
- Cations (calcium, sodium, magnesium, potassium) by EPA Method SW6020

- Alkalinity (carbonate, bicarbonate) by EPA Method M2320 B
- Specific Conductance by EPA Method 2510 B
- TDS by EPA Method M2540C

Copies of the DHL Laboratory analytical reports and chain-of-custody forms are provided in Attachment 2.

MONITORING RESULTS

Fluid Level Measurements

Twenty monitoring wells (MW-1 through MW-20), one observation well (OW-1), three water wells (Mays-02, Milford-01, Milford-02), and one river gauging station (RG-2) were synoptically gauged on February 19, 2009. Table 2 presents the monitoring well gauging data including ground elevation, top of well casing elevation, water level measurement (date of measurement, depth to water, and total depth), and calculated water elevation. The groundwater potentiometric map for January 2009 is presented as Figure 3.

South of the Colorado River, groundwater flow is to the northwest towards the river. North of the Colorado River, groundwater flow is to the southeast towards the river. Groundwater mounds were observed at monitoring wells MW-16 and MW-20. The mounds indicate the presence of a localized groundwater recharge source in these areas. The groundwater potentiometric maps for August 2008 and January 2009 are generally similar in that groundwater flow is towards the Colorado River. The groundwater elevations are generally consistent with previous gauging events.

Surface Water Analytical Results

During the January 2009 monitoring event, surface water samples were collected from six river segment locations (W-RS-12, W-RS-13, W-RS-14, W-RS-15, W-RS-16, and W-RS-17). The surface water analytical results are summarized in Table 3. The calcium, sodium, sulfate, chloride, conductivity, and TDS concentrations along the Colorado River between river segments 12 and 17 are presented in Figure 4.

Prior to the completion of this sample event, surface water samples had been collected from the Colorado River in July 2006, August 2006, and April 2007. The January 2009 surface water sample results were compared to the previous results to evaluate changes in salinity over time. The low concentrations observed during the August 2006 were attributed to a precipitation event that preceded the sampling event, which diluted the analyte concentrations due to an increase in the volume of surface water discharged into the Colorado River relative to the volume of

groundwater base flow. A comparison of the January 2009 to the 2006 and 2007 surface water sample results indicated the following:

- During all sampling events, the chloride, TDS, sodium, and electrical conductivity concentrations steadily increased from river segment 12 to river segment 17.

- Chloride, TDS, and sodium concentrations at all six river segments were 46% and 83% higher than the July 2006 and April 2007 sampling events.

The monthly rainfall gauge levels for the City of San Angelo were obtained from the National Weather Service (NWS)/National Oceanic and Atmospheric Administration (NOAA) online database and are provided in Attachment 3. Between November 2008 and January 2009, the region received approximately 0.33 inches of precipitation. Precipitation amounts preceding previous sampling events ranged from 0.87 inches in July 2006 to 4.87 inches in August 2006. The lower precipitation preceding the January 2009 event may explain the higher concentrations of salinity in surface water.

Groundwater Analytical Results

During the January 2009 monitoring event, groundwater samples were collected from twenty monitoring wells (MW-01 through MW-20), one observation well (OW-01), and one water well (Mays-02). The groundwater analytical results are summarized in Table 3. The chloride concentrations from January 2009 and previous monitoring events are presented in Figure 5.

The January 2009 analytical results were relatively similar compared to previous sampling events completed in July 2008 and August 2008. Chloride concentrations have ranged from 945 mg/L to 1,720 mg/L at monitoring well MW-20, which indicates groundwater has not been impacted from oil field activities upgradient of MW-20. However, analytical results from the Mays-02 water well, located approximately 600 feet northwest (downgradient) of monitoring well MW-20, indicated the presence of elevated chloride (17,700 mg/L) concentrations. The difference in these concentrations indicates the potential presence of another salinity source located near the Mays-02 water well, and/or upgradient from the Mays-02 water well and well MW-18.

A trend analysis was performed on the wells located near the potential source area (i.e., Mays-01 water well) where the BMP was implemented; the results are presented in Graphs 1 through 9. The graphs present concentrations for chloride, TDS, and sodium, and groundwater elevation. A brief discussion of the trends observed in the graphs is provided below.

- Upgradient monitoring wells MW-06, MW-17, MW-19, and MW-20: Concentrations of chloride, TDS, and sodium have remained relatively consistent with the exception of well

MW-19. The chloride, TDS, and sodium concentration at well MW-19 have steadily decreased between July 2007 and January 2009.

- Source area observation well OW-1: The chloride, TDS, and sodium concentrations have remained relatively consistent between August 2008 and January 2009.

- Downgradient monitoring wells MW-05, MW-10, MW-11, and MW-12: Although salinity concentrations have increased and decreased at these locations, the chloride, TDS, and sodium concentrations have remained relatively consistent between August 2006 and January 2009.

Delineation of elevated salinity concentrations has not been achieved in the southwest portion of the site near well MW-18 and Mays-02 water well. Limited analytical data is available for these wells because sampling was initiated in 2007 and 2008. Salinity concentrations at these locations have remained relatively consistent and are elevated as compared to the majority of the other wells located in the Wendkirk Oil Field with the exception of the area surrounding well OW-1. The results indicate that a potential salinity source(s) may be located upgradient from these well locations.

Seep Water Analytical Results

Seep water samples were collected from the Mays Ranch Seep and Spring 4314102. As observed during previous monitoring events, the upstream location of Spring 4314102 (east) was dry, therefore no sample was collected from that location. The seep water analytical results are summarized in Table 3.

Chloride, TDS, and sodium concentrations in January 2009 were consistent with past monitoring events for both seep samples.

Quality Assurance Project Plan

The analytical results were reviewed for compliance with the QA/QC criteria established in the QAPP for this site. The QA/QC analytical data review is presented in Attachment 4. QA/QC data associated with laboratory measurements indicate that measurement data are defensible and that measurement data reliability is generally within expected limits of sampling and analytical error given the data interpretation issues identified in the evaluation.

INVESTIGATION-DERIVED WASTE MANAGEMENT

The July 2008, August 2008, and January 2009 sampling events generated approximately 500-gallons of investigation-derived waste (IDW) purge and decontamination water. The IDW water was temporarily stored in 55-gallon drums and a 200-gallon polyethylene tank that were staged near well MW-17. The IDW water is pending offsite disposal as RRC exempt waste.

TRC will coordinate with the RRC San Angelo District 7C office for the removal of the IDW from the site.

CONCLUSIONS

The following conclusions were developed based on the previous site investigation results and the January 2009 groundwater monitoring results:

- The groundwater elevations are generally consistent with previous gauging events. Groundwater mounds were observed at monitoring wells MW-16 and MW-20 in August 2008 and January 2009. The mounds indicate the presence of a localized groundwater recharge zone in these areas.

- Surface water samples collected along the Colorado River provide no indication of specific source(s) of salinity located near the river. Consistent with previous surface water data collected adjacent to the Wendkirk Oil Field, salinity concentrations steadily increased from Colorado River segments 12 through 17. This suggests that saline groundwater discharging into the Colorado River as base flow is the primary source of salinity, and that the discharge occurs over a large portion of segments 12 to 17 rather than at a discrete point.

- January 2009 concentrations of chloride, TDS, and sodium in surface water increased between 46% and 83% as compared to the July 2006 and April 2007 monitoring events. The elevated salinity concentrations encountered during the January 2009 sampling event may be attributed to less precipitation in the region as compared to the July 2006, August 2006, and April 2007 seasonal monitoring events. The decrease in precipitation and surface runoff would lead to an increase in base flow conditions (i.e., groundwater discharge) and a corresponding increase in salinity.

- Salinity concentrations in groundwater samples collected in January 2009 were consistent with past monitoring events with the exception at well MW-19 where the chloride, TDS, and sodium concentrations have steadily decreased between July 2007 and January 2009.

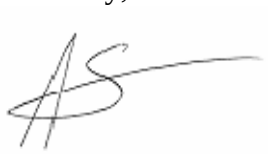
- Salinity concentrations in seep/spring samples collected in January 2009 were consistent with past monitoring events.

- A review of the recent and historical analytical results does not indicate that that plugging of Mays-01 water well has decreased salinity concentrations in the wells surrounding Mays-01; however, additional monitoring may be needed to observe if a change in conditions occurs.

- Elevated salinity concentrations have consistently been observed along the southwest portion of the Wendkirk Oil Field where delineation has not been achieved. Additional monitoring wells may be needed to investigate the source(s) of the elevated salinity, particularly upgradient of well MW-18 and Mays-02 water well.

Please do not hesitate to contact us at 512-329-6080 regarding questions or comments.

Sincerely,



Arsin M. Sahba, P.G.
Senior Project Manager/Senior Geologist

cc: Brian Floyd, RRC District 7C, San Angelo, Texas
Matt Webre, TRC, Austin, Texas
Chris Mansuri, TRC, Austin, Texas

FIGURES

Figure 1 Site Location Map
Figure 2 Site Map
Figure 3 Groundwater Potentiometric Surface Map, January 2009
Figure 4 Surface Water Sampling - Colorado River Segments 12 through 17, January 2009
Figure 5 Chronological Chloride Concentration Map

TABLES

Table 1 Summary of Seasonal Sample Locations
Table 2 Fluid Level Gauging Data
Table 3 Surface Water, Groundwater, Seep, and Produced Water Analytical Results

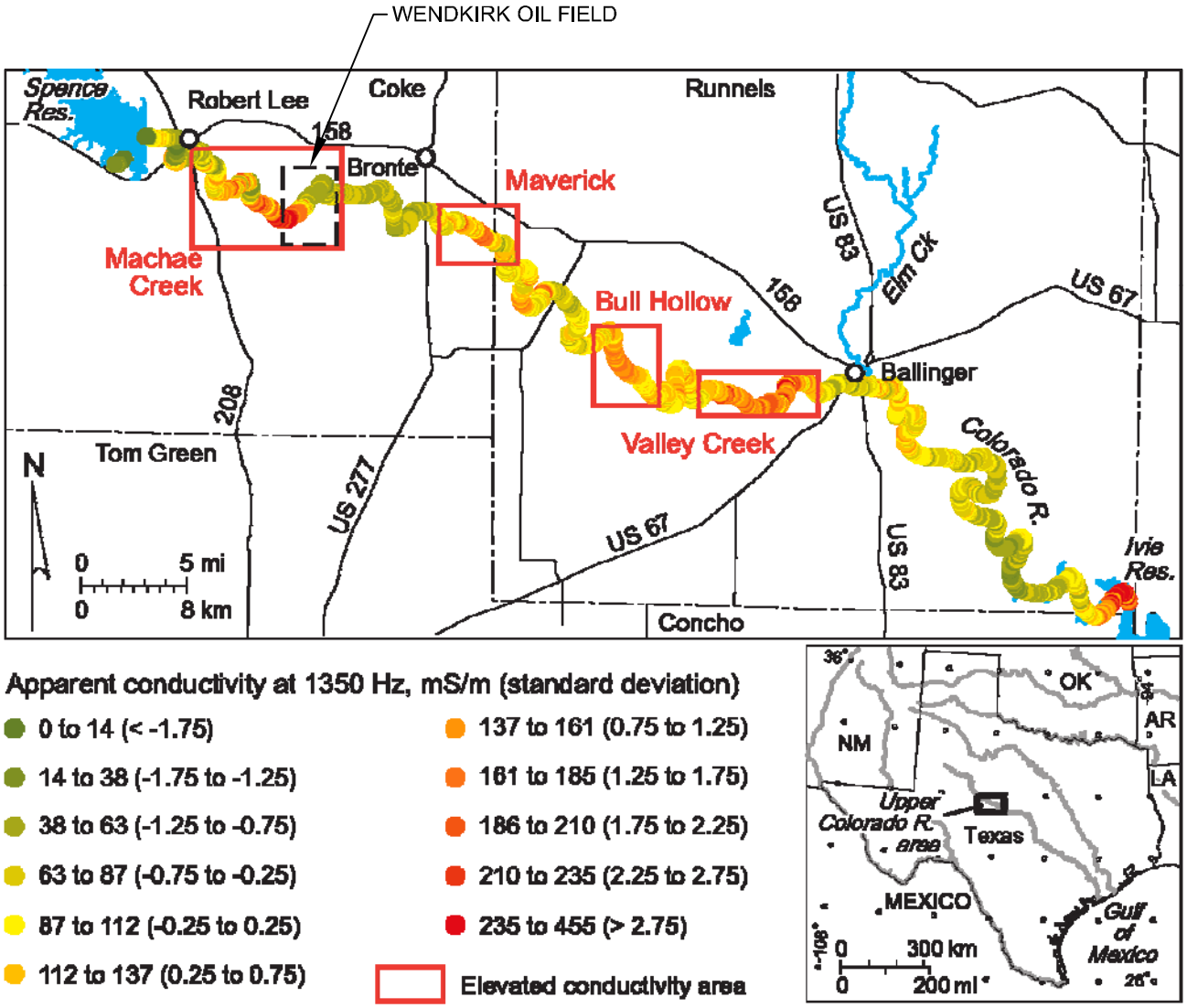
GRAPHS

Graph 1 MW-05 Concentrations and Groundwater Elevations
Graph 2 MW-06 Concentrations and Groundwater Elevations
Graph 3 MW-10 Concentrations and Groundwater Elevations
Graph 4 MW-11 Concentrations and Groundwater Elevations
Graph 5 MW-12 Concentrations and Groundwater Elevations
Graph 6 MW-17 Concentrations and Groundwater Elevations
Graph 7 MW-19 Concentrations and Groundwater Elevations
Graph 8 MW-20 Concentrations and Groundwater Elevations
Graph 9 OW-01 Concentrations and Groundwater Elevations

ATTACHMENTS

Attachment 1 Field Forms
Attachment 2 Laboratory Analytical Data Reports and Chain-of-Custody Forms
Attachment 3 Precipitation Data
Attachment 4 Analytical Data Review/Data Validation Checklist

FIGURES



NOTE:
APPARENT CONDUCTIVITY MEASURED AT 1350 Hz ALONG THE AXIS OF THE COLORADO RIVER DURING THE BEG AIRBORNE GEOPHYSICAL SURVEY IN FEBRUARY 2005. ELEVATED CONDUCTIVITY SEGMENTS INDICATING LOCATIONS OF POSSIBLE SALINE-WATER INFLOW ARE BOUNDED BY RED RECTANGULES. THE DASHED BOX NEAR BRONTE ENCLOSES THE WENDKIRK OIL FIELD.

SOURCE:
SURFACE AND BOREHOLE GEOPHYSICAL INVESTIGATIONS IN THE WENDKIRK OIL FIELD AREA, COKE COUNTY, TEXAS (BEG, 2006).

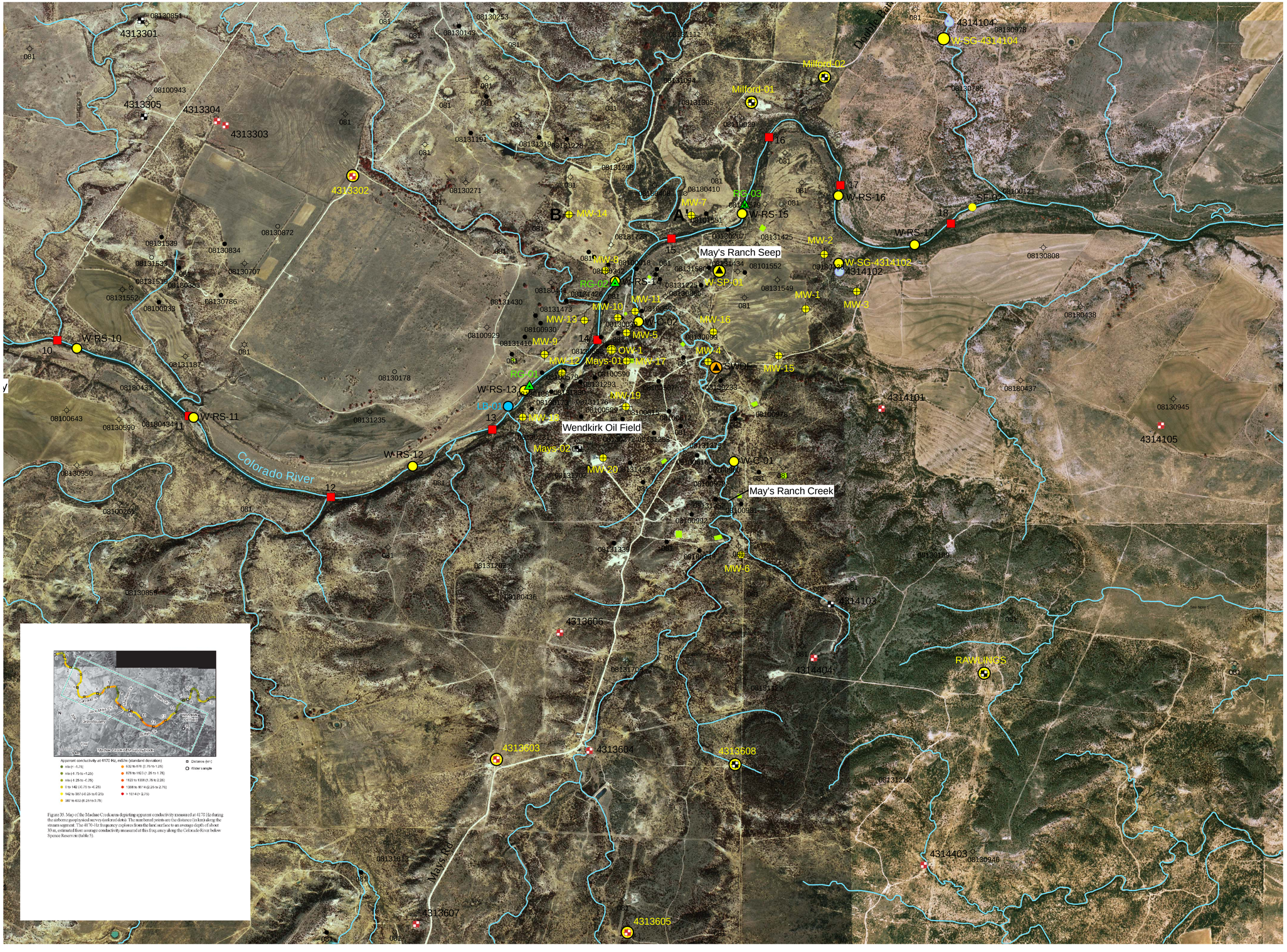
SITE LOCATION MAP

RAILROAD COMMISION OF TEXAS
WENDKIRK OIL FIELD

PROJECT NO.	165033	DWG FILE	165033-1
DRAWN BY.	CL	DATE	3/17/09

TRC
505 EAST HUNTLAND DRIVE
SUITE 250
AUSTIN, TEXAS 78752
(512) 329-6080

FIGURE
1



LEGEND

- Monitoring Well Locations
- Soil Boring
- Gauging Station
- Seasonal Water Sample and Stream Flow Measurement Locations [River Sample (RS) and Stream Flow (SF)]
- Produced Water Sample Location
- Well (Source TDLR)
- Well (Source TWDB)
- Well (Source Field Located)
- Surface Drainage (River and Creeks)
- Pit Locations
- Springs
- BEG River Segments for Machae Creek Area (Kilometer Markers)
- Site Features
- Permitted Location
- Dry Hole
- Oil
- Gas
- Oil / Gas
- Plugged Oil
- Plugged Gas
- Canceled / Abandoned Location
- Plugged Oil / Gas
- Injection / Disposal
- Core Hole

SOURCE:

1. BEG Airborne Geophysical Survey Report (ground conductivity, hydrochemical analysis, and surface water measurements)
2. Texas Water Develoment Board (water and gas well locations)
3. Texas Department of Licensing Regulation (water wells)
4. U.S.G.S.Digital Ortho Quater Quads (DOQQs) for Bronte SE (1996), Bronte SW (1996), Cement Mountain NE (1996), Cement Mountain NW (1996), Robert Lee SE (1996), Robert Lee SW (1996), Shawville NE (1996), and Shawville NW (1996), Texas DOQQs.
5. San Angelo contact from TWDB Report 166, Ground-Water Resources of Coke County, Texas.
6. National Hydrography Dataset (surface drainage).
7. Approximate location of pits determined from historical aerial photographs (1939, 1957, 1964, and 1971)

NOTE:

1. SWDF = Salt Water Disposal Facility (Salmon #1 SWD 06788)

N

1,000 0 1,000 2,000

Feet

SITE MAP

RAILROAD COMMISSION OF TEXAS
WENDKIRK OIL FIELD

PROJECT NO.: 165033 | DATE: 3/17/2009

TRC
505 EAST HUNTLAND DRIVE
SUITE 250
AUSTIN, TEXAS 78752
512-329-6080

FIGURE 2

LEGEND

- Monitoring Well Locations
- Gauging Station
- Seasonal Water Sample and Stream Flow Measurement Locations [River Sample (RS) and Stream Flow (SF)]
- Well (Source TDLR)
- Well (Source TWDB)
- Well (Source Field Located)
- Surface Drainage (River and Creeks)
- Pit Locations
- Springs
- BEG River Segments for Machae Creek Area (Kilometer Markers)
- Site Features
- Permitted Location
- Dry Hole
- Oil
- Gas
- Oil / Gas
- Plugged Oil
- Plugged Gas
- Canceled / Abandoned Location
- Plugged Oil / Gas
- Injection / Disposal
- Core Hole
- 1754.36 Groundwater Elevation
- Groundwater Elevation Contour Line (Dashed where Inferred)

SOURCE:

1. BEG Airborne Geophysical Survey Report (ground conductivity, hydrochemical analysis, and surface water measurements)
2. Texas Water Develoment Board (water and gas well locations)
3. Texas Department of Licensing Regulation (water wells)
4. U.S.G.S.Digital Ortho Quater Quads (DOQQs) for Bronte SE (1996), Bronte SW (1996), Cement Mountain NE (1996), Cement Mountain NW (1996), Rober Lee SE (1996), Robert Lee SW (1996), Shawville NE (1996), and Shawville NW (1996), Texas DOQQs.
5. San Angelo contact from TWDB Report 166, Ground-Water Resources of Coke County, Texas.
6. National Hydrography Dataset (surface drainage).
7. Approximate location of pits determined from historical aerial photographs (1939, 1957, 1964, and 1971)

NOTE:

1. SWDF = Salt Water Disposal Facility (Salmon #1 SWD 06788)
2. NG = Not Gauged. River gauges RG-01 and RG-03 have been damaged.

STATE OF TEXAS
2/17/09
ARSIN M. SAHBA
GEOLOGY
No. 4041
LICENSED
PROFESSIONAL GEOSCIENTIST

N

1,000 0 1,000 2,000
Feet

GROUNDWATER POTENTIOMETRIC SURFACE MAP - JANUARY 2009

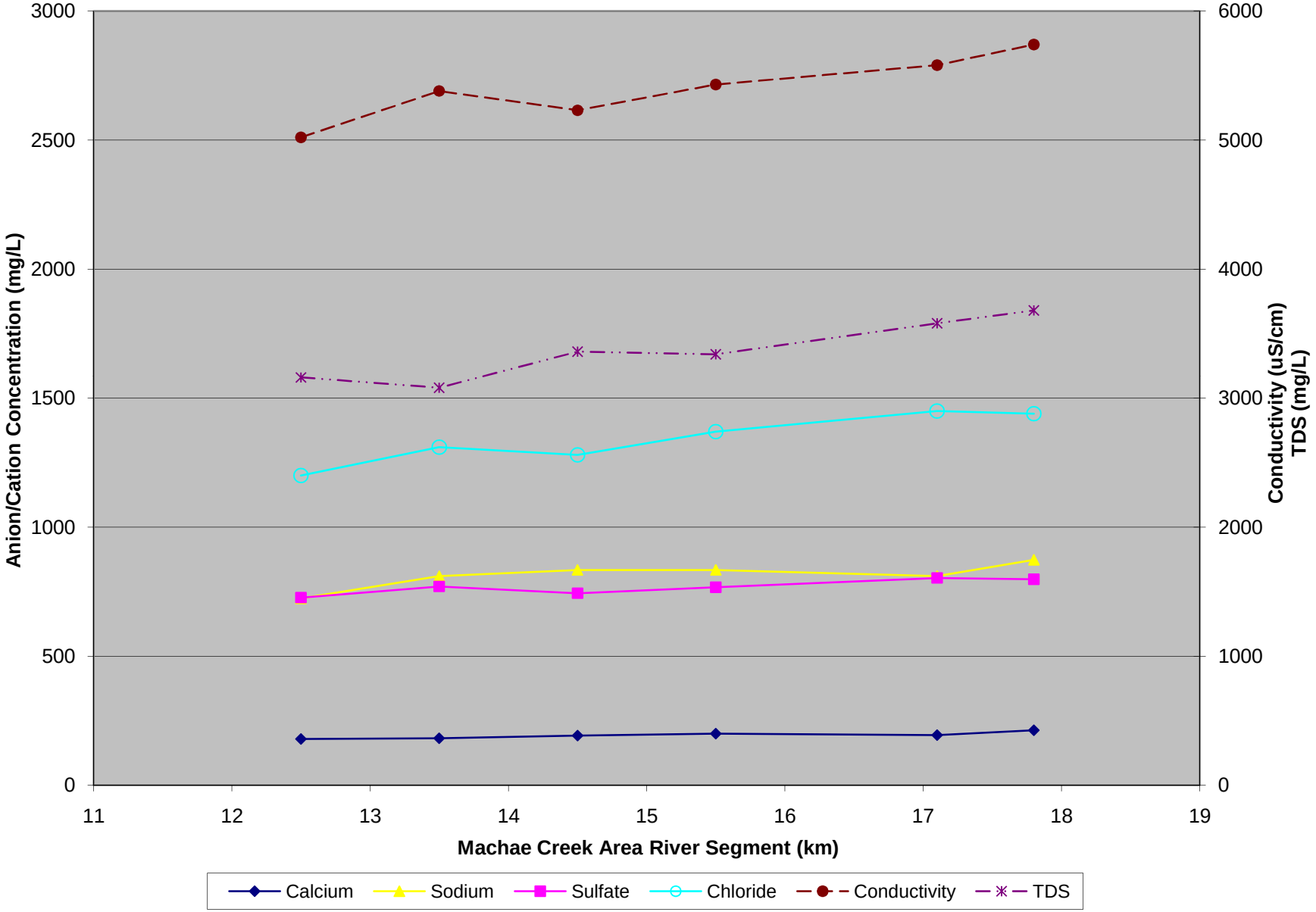
RAILROAD COMMISSION OF TEXAS
WENDKIRK OIL FIELD

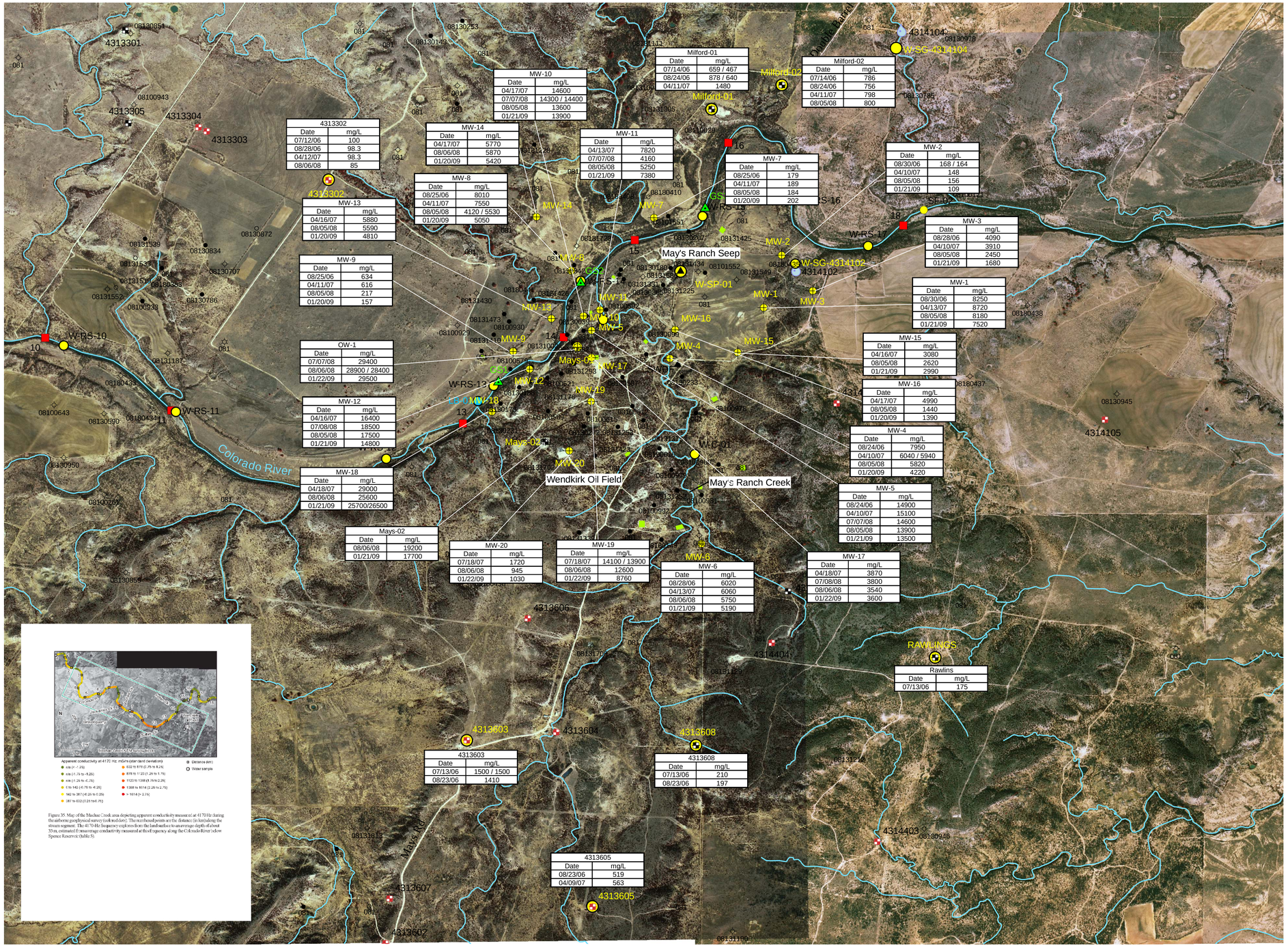
PROJECT NO.: 165033	DATE: 3/17/2009

TRC
505 EAST HUNTLAND DRIVE
SUITE 250
AUSTIN, TEXAS 78752
512-329-6080

FIGURE
3

Figure 4. Surface Water Sampling - Colorado River Segments 12 through 17
January 2009





4313302	
Date	mg/L
07/12/06	100
08/28/06	98.3
04/12/07	98.3
08/06/08	85

MW-13	
Date	mg/L
04/16/07	5880
08/05/08	5590
01/20/09	4810

MW-9	
Date	mg/L
08/25/06	634
04/11/07	616
08/05/08	217
01/20/09	157

OW-1	
Date	mg/L
07/07/08	29400
08/06/08	28900 / 28400
01/22/09	29500

MW-12	
Date	mg/L
04/16/07	16400
07/08/08	18500
08/05/08	17500
01/21/09	14800

MW-18	
Date	mg/L
04/18/07	29000
08/06/08	25600
01/21/09	25700/26500

Mays-02	
Date	mg/L
08/06/08	19200
01/21/09	17700

MW-10	
Date	mg/L
04/17/07	14600
07/07/08	14300 / 14400
08/05/08	13600
01/21/09	13900

MW-14	
Date	mg/L
04/17/07	5770
08/06/08	5870
01/20/09	5420

MW-8	
Date	mg/L
08/25/06	8010
04/11/07	7550
08/05/08	4120 / 5530
01/20/09	5050

MW-11	
Date	mg/L
04/13/07	7820
07/07/08	4160
08/05/08	5250
01/21/09	7380

Milford-01	
Date	mg/L
07/14/06	659 / 467
08/24/06	878 / 640
04/11/07	1480

Milford-02	
Date	mg/L
07/14/06	786
08/24/06	756
04/11/07	798
08/05/08	800

MW-7	
Date	mg/L
08/25/06	179
04/11/07	189
08/05/08	184
01/20/09	202

MW-2	
Date	mg/L
08/30/06	168 / 164
04/10/07	148
08/05/08	156
01/21/09	109

MW-3	
Date	mg/L
08/28/06	4090
04/10/07	3910
08/05/08	2450
01/21/09	1680

MW-1	
Date	mg/L
08/30/06	8250
04/13/07	8720
08/05/08	8180
01/21/09	7520

MW-15	
Date	mg/L
04/16/07	3080
08/05/08	2620
01/21/09	2990

MW-16	
Date	mg/L
04/17/07	4990
08/05/08	1440
01/20/09	1390

MW-4	
Date	mg/L
08/24/06	7950
04/10/07	6040 / 5940
08/05/08	5820
01/20/09	4220

MW-5	
Date	mg/L
08/24/06	14900
04/10/07	15100
07/07/08	14600
08/05/08	13900
01/21/09	13500

MW-20	
Date	mg/L
07/18/07	1720
08/06/08	945
01/22/09	1030

MW-19	
Date	mg/L
07/18/07	14100 / 13900
08/06/08	12600
01/22/09	8760

MW-6	
Date	mg/L
08/28/06	6020
04/13/07	6060
08/06/08	5750
01/21/09	5190

MW-17	
Date	mg/L
04/18/07	3870
07/08/08	3800
08/06/08	3540
01/22/09	3600

Rawlins	
Date	mg/L
07/13/06	175

4313603	
Date	mg/L
07/13/06	1500 / 1500
08/23/06	1410

4313608	
Date	mg/L
07/13/06	210
08/23/06	197

4313605	
Date	mg/L
08/23/06	519
04/09/07	563

Figure 35. Map of the Machae Creek area depicting apparent conductivity measured at 4170 Hz during the airborne geophysical survey (colored dots). The numbered points are the distance (in km) along the stream segment. The 4170 Hz frequency explores from the land surface to an average depth of about 33 m, estimated from average conductivity measured at this frequency along the Colorado River below Spence Reservoir (table 5).

LEGEND

- Monitoring Well Locations
- Soil Boring
- Gauging Station
- Seasonal Water Sample and Stream Flow Measurement Locations [River Sample (RS) and Stream Flow [SF])
- Well (Source TDLR)
- Well (Source TWDB)
- Well (Source Field Located)
- Surface Drainage (River and Creeks)
- Pit Locations
- Springs
- BEG River Segments for Machae Creek Area (Kilometer Markers)
- Site Features
- Permitted Location
- Dry Hole
- Oil
- Gas
- Oil / Gas
- Plugged Oil
- Plugged Gas
- Canceled / Abandoned Location
- Plugged Oil / Gas
- Injection / Disposal
- Core Hole

SOURCE:

1. BEG Airborne Geophysical Survey Report (ground conductivity, hydrochemical analysis, and surface water measurements)
2. Texas Water Develoment Board (water and gas well locations)
3. Texas Department of Licensing Regulation (water wells)
4. U.S.G.S.Digital Ortho Quater Quads (DOQQs) for Bronte SE (1996), Bronte SW (1996), Cement Mountain NE (1996), Cement Mountain NW (1996), Rober Lee SE (1996), Robert Lee SW (1996), Shawville NE (1996), and Shawville NW (1996), Texas DOQQs.
5. San Angelo contact from TWDB Report 166, Ground-Water Resources of Coke County, Texas.
6. National Hydrography Dataset (surface drainage).
7. Approximate location of pits determined from historical aerial photographs (1939, 1957, 1964, and 1971)

NOTE:

1. SWDF = Salt Water Disposal Facility (Salmon #1 SWD 06788)

STATE OF TEXAS
YASIN M. SAHBA
GEOLOGY
No. 4041
LICENSED
PROFESSIONAL GEOSCIENTIST

N

1,000 0 1,000 2,000
Feet

CHRONOLOGICAL CHLORIDE CONCENTRATION MAP

RAILROAD COMMISSION OF TEXAS
WENDKIRK OIL FIELD

PROJECT NO.: 165033

DATE: 3/17/2009

TRC
505 EAST HUNTLAND DRIVE
SUITE 250
AUSTIN, TEXAS 78752
512-329-6080

FIGURE
5

TABLES

Table 1. Summary of Seasonal Sample Locations

Seasonal Sample Areas	Sample Locations	Sample ID	Sample Date(s)	Laboratory Analysis
Colorado River	Segments 3, 7, 9 through 15, 17	W-RS-03 W-RS-07 W-RS-09 W-RS-10 W-RS-11 W-RS-12 W-RS-13 W-RS-14 W-RS-15 W-RS-16 W-RS-17	July 2006, August 2006, April 2007	Calcium, Chloride, Sodium, Sulfate, TDS, BTEX, TPH
	Segment 8	W-RS-08	July 2006	
	Segments 12 through 17	W-RS-12 W-RS-13 W-RS-14 W-RS-15 W-RS-16 W-RS-17	January 2009	Calcium, Sodium, Magnesium, Potassium, Chloride, Sulfide, Bromide, TDS, Alkalinity, Electrical Conductivity
Surface Water (Located in Wendkirk Oil Field)	May's Ranch Creek (upstream)	W-C-01	July 2006, August 2006, April 2007	Calcium, Chloride, Sodium, Sulfate, TDS
	May's Ranch Creek (downstream)	W-C-02	April 2007	
Surface Water (Not associated with Wendkirk Oil Field)	SANCO Quarry	W-Q-01	July 2006, August 2006, April 2007	
	North of River Segments 7 and 8	W-O-01	July 2006	Not Applicable – Field Chloride Test Kit
Spring Water	Spring 4314102 (west)	W-SG-4314102-01	July 2006, August 2006, April 2007	Calcium, Chloride, Sodium, Sulfate, TDS, BTEX, TPH
			January 2009	Calcium, Sodium, Magnesium, Potassium, Chloride, Sulfide, Bromide, TDS, Alkalinity, Electrical Conductivity
	Spring 4314102 (east)	W-SG-4314102-02	April 2007	Calcium, Chloride, Sodium, Sulfate, TDS
	Spring 4314104	W-SG-4314104	July 2006, August 2006, April 2007	Calcium, Chloride, Sodium, Sulfate, TDS, BTEX, TPH
	May's Ranch Seep	W-SP-01	July 2006, August 2006, April 2007	Calcium, Chloride, Sodium, Sulfate, TDS, BTEX, TPH
			January 2009	Calcium, Sodium, Magnesium, Potassium, Chloride, Sulfide, Bromide, TDS, Alkalinity, Electrical Conductivity

Table 1. Summary of Seasonal Sample Locations

Seasonal Sample Areas	Sample Locations	Sample ID	Sample Date(s)	Laboratory Analysis
Groundwater	May's Ranch Water Well	W-WW-Mays-01 Water well Mays-01 (73.5') Water well Mays-01 (98.5')	August 2006, April 2007, June 2007	Calcium, Chloride, Sodium, Sulfate, TDS, BTEX, TPH
		W-WW-081 W-WW-Mays-02	August 2008, January 2009	Calcium, Sodium, Magnesium, Potassium, Chloride, Sulfide, Bromide, TDS, Alkalinity, Electrical Conductivity
	Milford Water Well	W-WW-Milford-01	July 2006, August 2006, April 2007	Calcium, Chloride, Sodium, Sulfate, TDS, BTEX, TPH
		W-WW-Milford-02		
	Rawlin's Water Well	W-WW-Rawlins	July 2006	Calcium, Sodium, Magnesium, Potassium, Chloride, Sulfide, Bromide, TDS, Alkalinity, Electrical Conductivity
	Water Well 4313302	W-WW-4313302	July 2006, August 2006, April 2007	Calcium, Chloride, Sodium, Sulfate, TDS, BTEX, TPH
	Water Well 4313605	W-WW-4313605	August 2006, April 2007	
	Water Well 4313603	W-WW-4313603	July 2006, August 2006	
	Water Well 4313608	W-WW-4313608		
	Wendkirk Oil Field Monitoring Wells	W-MW-05 W-MW-10 W-MW-11 W-MW-12 W-MW-17 W-0B-01	July 2008	Calcium, Sodium, Magnesium, Potassium, Chloride, Sulfide, Bromide, TDS, Alkalinity, Electrical Conductivity
		W-MW-01 W-MW-02 W-MW-03 W-MW-04 W-MW-05 W-MW-06 W-MW-07 W-MW-08 W-MW-09 W-MW-10 W-MW-11 W-MW-12 W-MW-13 W-MW-14 W-MW-15 W-MW-16 W-MW-17 W-MW-18 W-MW-19 W-MW-20 W-OW-01	August 2008, January 2009	Calcium, Sodium, Magnesium, Potassium, Chloride, Sulfide, Bromide, TDS, Alkalinity, Electrical Conductivity

Table 2. Fluid Level Gauging Data

Location ID	Ground Elevation (feet)	Top-of-Casing Elevation (feet)	Date Water Level Measured	Total Depth of Well (feet btoc)	Depth to Water (feet btoc)	Water Elevation (ft AMSL)
MW-01	1779.45	1782.62	8/30/2006	43.25	24.16	1758.46
MW-01	1779.45	1782.62	10/26/2006	NM	23.97	1758.65
MW-01	1779.45	1782.62	4/20/2007	NM	25.92	1756.70
MW-01	1779.45	1782.62	8/4/2008	43.10	25.16	1757.46
MW-01	1779.45	1782.62	1/19/2009	NM	25.17	1757.45
MW-02	1771.43	1775.03	8/30/2006	39.05	27.02	1748.01
MW-02	1771.43	1775.03	10/26/2006	NM	27.37	1747.66
MW-02	1771.43	1775.03	4/20/2007	NM	27.98	1747.05
MW-02	1771.43	1775.03	8/4/2008	38.44	27.68	1747.35
MW-02	1771.43	1775.03	1/19/2009	NM	27.68	1747.35
MW-03	1773.61	1776.09	8/30/2006	40.20	21.69	1754.40
MW-03	1773.61	1776.09	10/26/2006	NM	21.45	1754.64
MW-03	1773.61	1776.09	4/20/2007	NM	21.73	1754.36
MW-03	1773.61	1776.09	6/20/2007	NM	18.35	1757.74
MW-03	1773.61	1776.09	8/4/2008	39.59	21.30	1754.79
MW-03	1773.61	1776.09	1/19/2009	NM	20.90	1755.19
MW-04	1772.28	1774.54	8/30/2006	36.51	16.75	1757.79
MW-04	1772.28	1774.54	10/26/2006	NM	16.91	1757.63
MW-04	1772.28	1774.54	4/20/2007	NM	17.47	1757.07
MW-04	1772.28	1774.54	8/4/2008	37.71	16.76	1757.78
MW-04	1772.28	1774.54	1/19/2009	NM	16.41	1758.13
MW-05	1760.71	1763.19	8/30/2006	35.15	17.23	1745.96
MW-05	1760.71	1763.19	10/26/2006	NM	16.43	1746.76
MW-05	1760.71	1763.19	4/20/2007	NM	16.65	1746.54
MW-05	1760.71	1763.19	6/20/2007	NM	15.80	1747.39
MW-05	1760.71	1763.19	7/17/2007	NM	15.80	1747.39
MW-05	1760.71	1763.19	7/7/2008	35.02	16.21	1746.98
MW-05	1760.71	1763.19	8/4/2008	NM	16.32	1746.87
MW-05	1760.71	1763.19	1/19/2009	NM	15.91	1747.28
MW-06	1831.77	1834.47	8/30/2006	99.40	52.34	1782.13
MW-06	1831.77	1834.47	10/26/2006	NM	51.53	1782.94
MW-06	1831.77	1834.47	4/20/2007	NM	58.92	1775.55
MW-06	1831.77	1834.47	8/4/2008	96.07	52.97	1781.50
MW-06	1831.77	1834.47	1/19/2009	NM	51.57	1782.90
MW-07	1767.97	1771.10	8/30/2006	40.00	31.84	1739.26
MW-07	1767.97	1771.10	10/26/2006	NM	31.07	1740.03
MW-07	1767.97	1771.10	4/20/2007	NM	32.32	1738.78
MW-07	1767.97	1771.10	8/4/2008	39.72	29.45	1741.65
MW-07	1767.97	1771.10	1/19/2009	NM	29.56	1741.54
MW-08	1777.30	1780.69	8/30/2006	62.12	33.13	1747.56
MW-08	1777.30	1780.69	10/26/2006	NM	32.86	1747.83
MW-08	1777.30	1780.69	4/20/2007	NM	33.32	1747.37
MW-08	1777.30	1780.69	8/4/2008	62.71	32.73	1747.96
MW-08	1777.30	1780.69	1/19/2009	NM	32.14	1748.55

Table 2. Fluid Level Gauging Data

Location ID	Ground Elevation (feet)	Top-of-Casing Elevation (feet)	Date Water Level Measured	Total Depth of Well (feet btoc)	Depth to Water (feet btoc)	Water Elevation (ft AMSL)
MW-09	1757.12	1759.82	8/30/2006	32.19	16.49	1743.33
MW-09	1757.12	1759.82	10/26/2006	NM	16.20	1743.62
MW-09	1757.12	1759.82	4/20/2007	NM	15.67	1744.15
MW-09	1757.12	1759.82	6/21/2007	NM	14.95	1744.87
MW-09	1757.12	1759.82	8/4/2008	30.82	16.45	1743.37
MW-09	1757.12	1759.82	1/19/2009	NM	15.79	1744.03
MW-10	1764.68	1767.02	4/20/2007	72.30	14.90	1752.12
MW-10	1764.68	1767.02	6/20/2007	72.30	14.20	1752.82
MW-10	1764.68	1767.02	7/7/2008	72.40	14.19	1752.83
MW-10	1764.68	1767.02	8/4/2008	72.66	14.34	1752.68
MW-10	1764.68	1767.02	1/19/2009	NM	14.04	1752.98
MW-11	1764.60	1766.78	4/20/2007	32.36	21.64	1745.14
MW-11	1764.60	1766.78	6/19/2007	NM	20.90	1745.88
MW-11	1764.60	1766.78	7/17/2007	NM	21.10	1745.68
MW-11	1764.60	1766.78	7/7/2008	32.33	21.59	1745.19
MW-11	1764.60	1766.78	8/4/2008	32.14	21.86	1744.92
MW-11	1764.60	1766.78	1/19/2009	NM	21.43	1745.35
MW-12	1763.54	1766.10	4/20/2007	42.39	31.18	1734.92
MW-12	1763.54	1766.10	7/7/2008	42.47	18.70	1747.40
MW-12	1763.54	1766.10	8/4/2008	NM	18.66	1747.44
MW-12	1763.54	1766.10	1/19/2009	NM	18.60	1747.50
MW-13	1759.45	1762.49	4/20/2007	27.95	17.54	1744.95
MW-13	1759.45	1762.49	7/18/2007	NM	17.35	1745.14
MW-13	1759.45	1762.49	8/4/2008	27.85	18.16	1744.33
MW-13	1759.45	1762.49	1/19/2009	NM	17.33	1745.16
MW-14	1787.19	1789.86	4/20/2007	83.30	69.59	1720.27
MW-14	1787.19	1789.86	6/21/2007	NM	27.21	1762.65
MW-14	1787.19	1789.86	8/4/2008	83.02	24.68	1765.18
MW-14	1787.19	1789.86	1/19/2009	NM	24.98	1764.88
MW-15	1790.04	1792.87	4/20/2007	43.50	25.85	1767.02
MW-15	1790.04	1792.87	8/4/2008	42.72	25.09	1767.78
MW-15	1790.04	1792.87	1/19/2009	NM	25.36	1767.51
MW-16	1785.23	1788.19	4/20/2007	38.07	32.33	1755.86
MW-16	1785.23	1788.19	8/4/2008	37.75	15.85	1772.34
MW-16	1785.23	1788.19	1/19/2009	NM	15.80	1772.39
MW-17	1824.99	1827.63	4/20/2007	73.00	65.83	1761.80
MW-17	1824.99	1827.63	7/8/2008	72.95	65.81	1761.82
MW-17	1824.99	1827.63	8/4/2008	NM	66.12	1761.51
MW-17	1824.99	1827.63	1/19/2009	NM	66.06	1761.57
MW-18	1773.10	1775.18	4/20/2007	72.29	19.88	1755.30
MW-18	1773.10	1775.18	6/19/2007	NM	22.33	1752.85
MW-18	1773.10	1775.18	8/4/2008	NM	20.25	1754.93
MW-18	1773.10	1775.18	1/19/2009	NM	20.12	1755.06

Table 2. Fluid Level Gauging Data

Location ID	Ground Elevation (feet)	Top-of-Casing Elevation (feet)	Date Water Level Measured	Total Depth of Well (feet btoc)	Depth to Water (feet btoc)	Water Elevation (ft AMSL)
MW-19	1827.10	1830.14	7/18/2007	105.50	75.70	1754.44
MW-19	1827.10	1830.14	8/4/2008	NM	75.50	1754.64
MW-19	1827.10	1830.14	1/19/2009	NM	75.22	1754.92
MW-20	1888.48	1890.90	7/18/2007	115.50	98.55	1792.35
MW-20	1888.48	1890.90	8/4/2008	NM	91.08	1799.82
MW-20	1888.48	1890.90	1/19/2009	NM	89.19	1801.71
Mays-01	1817.14	1820.66	8/30/2006	190.00	68.30	1752.36
Mays-01	1817.14	1820.66	10/26/2006	NM	68.04	1752.62
Mays-01	1817.14	1820.66	4/20/2007	NM	68.26	1752.40
Mays-01	1817.14	1820.66	6/20/2007	NM	67.27	1753.39
Mays-02	NM	NM	8/6/2008	NM	92.24	NA
Mays-02	NM	NM	1/19/2009	137.17	91.97	NA
OW-01	1816.44	1818.56	7/17/2007	97.81	66.54	1752.02
OW-01	1816.44	1818.56	7/7/2008	96.95	47.56 (1)	1771.00
OW-01	1816.44	1818.56	8/4/2008	NM	67.01	1751.55
OW-01	1816.44	1818.56	1/19/2009	97.81	66.74	1751.82
Milford-01	1829.94	1832.20	7/14/2006	180.50	83.15	1749.05
Milford-01	1829.94	1832.20	8/30/2006	NM	83.05	1749.15
Milford-01	1829.94	1832.20	4/20/2007	NM	82.94	1749.26
Milford-01	1829.94	1832.20	8/4/2008	NM	NM	NA
Milford-01	1829.94	1832.20	1/19/2009	NM	82.70	1749.50
Milford-02	1814.59	1816.53	7/14/2006	118.80	63.01	1753.52
Milford-02	1814.59	1816.53	8/30/2006	NM	63.30	1753.23
Milford-02	1814.59	1816.53	4/20/2007	NM	63.10	1753.43
Milford-02	1814.59	1816.53	8/5/2008	NM	63.28	1753.25
Milford-02	1814.59	1816.53	1/19/2009	NM	63.43	1753.10
RG-01	NA	1747.70	4/20/2007	NA	2.72	1744.98
RG-01	NA	1747.70	8/5/2008	NM	NM - DAMAGED	NA
RG-01	NA	1747.70	1/19/2009	NM	NM - DAMAGED	NA
RG-02	NA	1748.34	4/20/2007	NA	3.70	1744.64
RG-02	NA	1748.34	8/5/2008	NA	3.49	1744.85
RG-02	NA	1748.34	1/19/2009	NA	2.72	1745.62
RG-03	NA	1746.26	4/20/2007	NA	3.67	1742.59
RG-03	NA	1746.26	8/5/2008	NA	3.73	1742.53
RG-03	NA	1746.26	1/19/2009	NA	NM - DAMAGED	NA

Notes:
(1) OW-1 is located adjacent to Mays-01. Mays-01 was plugged and abandoned during measurement on 7/7/2008 which appears to have influenced the water level elevation in OW-1.
btoc = below top of casing
AMSL = above mean sea level
NA = not applicable
NM = not measured

Table 3. Surface Water, Groundwater, and Produced Water Analytical Results

Sample ID	Sample Location	Sample Date	Calcium (mg/L)	Magnesium (mg/L)	Potassium (mg/L)	Bromide (mg/L)	Chloride (mg/L)	Sulfate (mg/L)	Sodium (mg/L)	Alkalinity, Bicarbonate (as CaCO3) (mg/L)	Alkalinity, Carbonate (as CaCO3) (mg/L)	Alkalinity, Hydroxide (as CaCO3) (mg/L)	Alkalinity, Total (as CaCO3) (mg/L)	pH (pH units)	Specific Conductance (umhos/cm)	Total Dissolved Solids (mg/L)	Benzene (mg/L)	Toluene (mg/L)	Ethylbenzene (mg/L)	Xylenes, total (mg/L)	TX1005 >C12-C28 (mg/L)	TX1005 >C28-C35 (mg/L)	TX1005 C6-C12 (mg/L)	TX1005 C6-C35 (mg/L)
W-MW-01	Monitoring Well #1	8/30/2006	751	NA	NA	NA	8250	3750	5700	NA	NA	NA	NA	NA	NA	19000	0.0008 U	0.002 U	0.002 U	0.003 U	0.657 U	0.657 U	0.657 U	0.657 U
W-MW-01	Monitoring Well #1	4/13/2007	831	NA	NA	NA	8720	5640	6140	NA	NA	NA	NA	NA	NA	21900	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-01	Monitoring Well #1	8/5/2008	664	679	63.0	16.2	8180	5410	4800	384	10.0 U	10.0 U	384	6.94	33800	22000	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-01	Monitoring Well #1	1/21/2009	695	703	66.6	14.1	7520	5040	4940	519	10.0 U	10.0 U	519	NA	31000	21200	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-02	Monitoring Well #2	8/30/2006	800	NA	NA	NA	168	1850	171	NA	NA	NA	NA	NA	NA	3240	0.0008 U	0.002 U	0.002 U	0.003 U	0.686 U	0.686 U	0.686 U	0.686 U
W-MW-02	Monitoring Well #2	4/10/2007	942	NA	NA	NA	148	1950	145	NA	NA	NA	NA	NA	NA	3290	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-02-D	Monitoring Well #2 Duplicate	8/30/2006	775	NA	NA	NA	164	1840	177	NA	NA	NA	NA	NA	NA	3250	0.0008 U	0.002 U	0.002 U	0.003 U	0.673 U	0.673 U	0.673 U	0.673 U
W-MW-02	Monitoring Well #2	8/5/2008	738	166	9.72	0.595 J	156	1980	106	185	10.0 U	10.0 U	185	7.06	3390	3310	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-02	Monitoring Well #2	1/21/2009	707	167	9.53	0.509 J	109	1630	131	242	10.0 U	10.0 U	242	NA	3240	3080	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-03	Monitoring Well #3	8/28/2006	907	NA	NA	NA	4090	3070	1880	NA	NA	NA	NA	NA	NA	11600	0.0008 U	0.002 U	0.002 U	0.003 U	0.656 U	0.656 U	0.656 U	0.656 U
W-MW-03	Monitoring Well #3	4/10/2007	1000	NA	NA	NA	3910	3290	2030	NA	NA	NA	NA	NA	NA	11900	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-03	Monitoring Well #3	8/5/2008	585	576	17.9	4.48	2450	3360	1180	320	10.0 U	10.0 U	320	6.86	11400	9800	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-03	Monitoring Well #3	1/21/2009	492	523	19.2	3.22	1680	2770	1040	428	10.0 U	10.0 U	428	NA	9510	7620	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-04	Monitoring Well #4	8/24/2006	1120	NA	NA	NA	7950	1640	3920	NA	NA	NA	NA	NA	NA	15200	0.0008 U	0.002 U	0.002 U	0.003 U	0.685 U	0.685 U	0.685 U	0.685 U
W-MW-04	Monitoring Well #4	4/10/2007	953	NA	NA	NA	6040	2080	3810	NA	NA	NA	NA	NA	NA	12700	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-04-D	Monitoring Well #4 Duplicate	4/10/2007	1020	NA	NA	NA	5940	2030	3760	NA	NA	NA	NA	NA	NA	11800	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-04	Monitoring Well #4	8/5/2008	724	317	67.0	10.3	5820	1750	3090	317	10.0 U	10.0 U	317	6.88	20300	12800	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-04	Monitoring Well #4	1/20/2009	743	395	51.6	8.33	4220	1830	2310	458	10.0 U	10.0 U	458		14500	10100								
W-MW-05	Monitoring Well #5	8/24/2006	1120	NA	NA	NA	14900	2730	7070	NA	NA	NA	NA	NA	NA	27400	0.0008 U	0.002 U	0.002 U	0.003 U	0.669 U	0.669 U	0.669 U	0.669 U
W-MW-05	Monitoring Well #5	4/10/2007	1030	NA	NA	NA	15100	2820	8690	NA	NA	NA	NA	NA	NA	27100	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-05	Monitoring Well #5	7/7/2008	899	NA	NA	NA	14600	2960	7040	NA	NA	NA	NA	NA	NA	28700	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-05	Monitoring Well #5	8/5/2008	885	325	109	25.1	13900	2740	7150	305	10.0 U	10.0 U	305	6.69	46700	27900	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-05	Monitoring Well #5	1/21/2009	905	349	116	25.5	13500	2590	7710	328	10.0 U	10.0 U	328	NA	45400	26200	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-06	Monitoring Well #6	8/28/2006	469	NA	NA	NA	6020	1100	2860	NA	NA	NA	NA	NA	NA	11300	0.0008 U	0.002 U	0.002 U	0.003 U	0.674 U	0.674 U	0.674 U	0.674 U
W-MW-06	Monitoring Well #6	4/13/2007	523	NA	NA	NA	6060	1170	3620	NA	NA	NA	NA	NA	NA	12400	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-06	Monitoring Well #6	8/6/2008	376	286	55.0	9.89	5750	1040	2800	329	10.0 U	10.0 U	329	6.87	20200	11800	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-06	Monitoring Well #6	1/21/2009	415	329	58.6	9.52	5190	1010	3180	354	10.0 U	10.0 U	354	NA	17800	10700	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-07	Monitoring Well #7	8/25/2006	816	NA	NA	NA	179	495	286	NA	NA	NA	NA	NA	NA	1300	0.0008 U	0.002 U	0.002 U	0.003 U	0.68 U	0.68 U	0.68 U	0.68 U
W-MW-07	Monitoring Well #7	4/11/2007	185	NA	NA	NA	189	532	260	NA	NA	NA	NA	NA	NA	1320	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-07	Monitoring Well #7	8/5/2008	142	32.1	12.5	0.569 J	184	493	264	269	10.0 U	10.0 U	269	7.41	1930	1370	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-07	Monitoring Well #7	1/20/2009	128	32.4	13.6	0.652 J	202	575	346	290	10.0 U	10.0 U	290		2150	1460								
W-MW-08	Monitoring Well #8	8/25/2006	588	NA	NA	NA	8010	7520	6950	NA	NA	NA	NA	NA	NA	23200	0.0008 U	0.002 U	0.002 U	0.003 U	0.661 U	0.661 U	0.661 U	0.661 U
W-MW-08	Monitoring Well #8	4/11/2007	599	NA	NA	NA	7550	7660	6520	NA	NA		NA	NA	NA	23000	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-08	Monitoring Well #8	8/5/2008	433	162	73.4	10.9	4120	5480	4560	384	10.0 U	10.0 U	384	7.06	22300	16100	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-08-D	Monitoring Well #8 - Duplicate	8/5/2008	426	188	84.6	10.9	5530	6700	4720	423	10.0 U	10.0 U	423	7.09	27300	19000	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-08	Monitoring Well #8	1/20/2009	501	195	82.3	10.3	5050	5630	5050	423	10.0 U	10.0 U	423	NA	24900	17800	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-09	Monitoring Well #9	8/25/2006	490	NA	NA	NA	634	862	672	NA	NA	NA	NA	NA	NA	2600	0.0008 U	0.002 U	0.002 U	0.003 U	0.677 U	0.677 U	0.677 U	0.677 U
W-MW-09	Monitoring Well #9	4/11/2007	244	NA	NA	NA	616	1020	704	NA	NA	NA	NA	NA	NA	2820	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-09	Monitoring Well #9	8/5/2008	84.6	35.6	8.31	0.850 J	217	333	347	440	10.0 U	10.0 U	440	7.44	2220	1530	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-09	Monitoring Well #9	1/20/2009	80.4	38.1	7.14	0.796 J	157	278	389	623	10.0 U	10.0 U	623	NA	2070	1400	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-10	Monitoring Well #10	4/17/2007	881	NA	NA	NA	14600	6700	11600	NA	NA	NA	NA	NA	NA	30800	0.0008 U	0.002 U	0.002 U	0.003 U	0.651 U	0.651 U	0.651 U	0.651 U
W-MW-10	Monitoring Well #10	7/7/2008	763	NA	NA	NA	14300	6500	8380	NA	NA	NA	NA	NA	NA	32300	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-10-D	Monitoring Well #10 Duplicate	7/7/2008	760	NA	NA	NA	14400	6510	8520	NA	NA	NA	NA	NA	NA	32300	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-10	Monitoring Well #10	8/5/2008	751	339	138	26.2	13600	6150	8850	408	10.0 U	10.0 U	408	6.73	51200	32200	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-10	Monitoring Well #10	1/21/2009	730	362	152	27.4	13900	5980	9450	439	10.0 U	10.0 U	439	NA	51200	32300	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-11	Monitoring Well #11	4/13/2007	983	NA	NA	NA	7820	1140	4210	NA	NA	NA	NA	NA	NA	14900	0.0008 U	0.002 U	0.002 U	0.003 U	0.682 U	0.682 U	0.682 U	0.682 U
W-MW-11	Monitoring Well #11	7/7/2008	499	NA	NA	NA	4160	812	1840	NA	NA	NA	NA	NA	NA	13300	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-11	Monitoring Well #11	8/5/2008	764	273	53.0	14.4	5250	1070	4420	262	10.0 U	10.0 U	262	6.87	21800	13200	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-11	Monitoring Well #11	1/21/2009	796	288	29.7	21.9	7380	1150	3920	332	10.0 U	10.0 U	332	NA	25600	15500	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-12	Monitoring Well #12	4/16/2007	1320	NA	NA	NA	16400	5080	10900	NA	NA	NA	NA	NA	NA	31800	0.0008 U	0.002 U	0.002 U	0.003 U	0.682 U	0.682 U	0.682 U	0.682 U
W-MW-12	Monitoring Well #12	7/8/2008	984	NA	NA	NA	18500	5210	9410	NA	NA	NA	NA	NA	NA	37700	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-12	Monitoring Well #12	8/5/2008	1020	634	128	31.7	17500	4610	9190	354	10.0 U	10.0 U	354	6.71	58400	37400	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-12	Monitoring Well #12	1/21/2009	963	674	127	26.5	14800	4810	8840	383	10.0 U	10.0 U	383	NA	53400	33700	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-13	Monitoring Well #13	4/16/2007	1600	NA	NA	NA	5880	1980	3670	NA	NA	NA	NA	NA	NA	13200	0.0008 U	0.002 U	0.002 U	0.003 U	0.676 U	0.676 U	0.676 U	0.676 U
W-MW-13	Monitoring Well #13	8/5/2008	748	262	24.2	21.0	5590	2160	2520	272	10.0 U	10.0 U	272	6.99	21000	13200	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-13	Monitoring Well #13	1/20/2009	814	303	26.4	20.3	4810	2180 J	3260	392	10.0 U	10.0 U	392	NA	18100	12700	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-14	Monitoring Well #14	4/17/2007	574	NA	NA	NA	5770	6540	5980	NA	NA	NA	NA	NA	NA	18200	0.0008 U	0.002 U	0.002 U	0.003 U	0.666 U	0.666 U	0.666 U	0.666 U
W-MW-14	Monitoring Well #14	8/6/2008	532	277	82.0	30.0 U	5870	6760	5100	424	10.0 U	10.0 U	424	6.77	30800	20800	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-14	Monitoring Well #14	1/20/2009	576	315	90.8	11.1	5240	6540	5960	465	10.0 U	10.0 U	465	NA	26800	19300	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-15	Monitoring Well #15	4/16/2007	474	NA	NA	NA	3080	2600	2060	NA	NA	NA	NA	NA	NA	8980	0.0008 U	0.002 U	0.002 U	0.003 U	0.687 U	0.687 U	0.687 U	0.687 U
W-MW-15	Monitoring Well #15	8/5/2008	574	465	37.2	6.69	2620	4670	1850	373	10.0 U	10.0 U	373	7.03	12600	10500	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-15	Monitoring Well #15	1/21/2009	482	357	39.7	6.09	2990	2520	1970	402	10.0 U	10.0 U	402	NA	13400	9660	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-16	Monitoring Well #16	4/17/2007	888	NA	NA	NA	4990	3190	2560	NA	NA	NA	NA	NA	NA	13200	0.0008 U	0.002 U	0.002 U	0.003 U	0.668 U	0.668 U	0.668 U	0.668 U
W-MW-16	Monitoring Well #16	8/5/2008	233	138	25.6	3.46	1440	888	571	237	10.0 U	10.0 U	237	7.32	4520	3070	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-16	Monitoring Well #16	1/20/2009	286	183	35	4.95	1390	893	807	286	10.0 U	10.0 U	286	NA	5300	3610	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-17	Monitoring Well #17	4/18/2007	418	NA	NA	NA	3870	2650	2680	NA	NA	NA	NA	NA	NA	10100	0.0008 U	0.002 U	0.002 U	0.003 U	0.682 U	0.682 U	0.682 U	0.682 U
W-MW-17	Monitoring Well #17	7/8/2008	404	NA	NA	NA	3800	2310	2400	NA	NA	NA	NA	NA	NA	10500	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-17	Monitoring Well #17	8/6/2008	414	187	46.7	7.45	3540	2230	2320	325	10.0 U	10.0 U	325	6.87	16300	10200	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-17	Monitoring Well #17	1/22/2009	396	195	48.6	5.83	3600	2350	2350	341	10.0 U	10.0 U	341	NA	14000	9780	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-18	Monitoring Well #18	4/18/2007	1450	NA	NA	NA	29000	4620	14900	NA	NA	NA	NA	NA	NA	47900	0.0008 U	0.002 U	0.002 U	0.003 U	0.653 U	0.653 U	0.653 U	0.653 U
W-MW-18-D	Monitoring Well #18 Duplicate	4/18/2007	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	0.0008 U	0.002 U	0.002 U	0.003 U	0.664 U	0.664 U	0.664 U	0.664 U
W-MW-18	Monitoring Well #18	8/6/2008	1390	603	175	44.2	25600	4180	13700	286	10.0 U	10.0 U	286	6.48	89200	49300	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-18	Monitoring Well #18	1/21/2009	1470	631	187	43.9	25700	3940	14000	312	10.0 U	10.0 U	312	NA	79900	47500	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-18-D	Monitoring Well #18 Duplicate	1/21/2009	1550	658	193	44	26500	4090	14200	315	10.0 U	10.0 U	315	NA	79100	47700	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-19	Monitoring Well #19	7/18/2007	958	NA	NA	NA	14100	3910	7410	NA	NA	NA	NA	NA	NA	28600	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-19-D	Monitoring Well #19 Duplicate	7/18/2007	951	NA	NA	NA	13900	3700	7360	NA	NA	NA	NA	NA	NA	28500	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-19	Monitoring Well #19	8/6/2008	971	360	98.7	18.7	12600	3950	6930	301	10.0 U	10.0 U	301	6.74	35800	22100	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-19	Monitoring Well #19	1/22/2009	757	317	85.2	38.7	8760	3330	5410	349	10.0 U	10.0 U	349	NA	31700	21400	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-20	Monitoring Well #20	7/18/2007	270	NA	NA	NA	1720	1500	1300	NA	NA	NA	NA	NA	NA	5080	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-20	Monitoring Well #20	8/6/2008	342	165	21.2	2.99	945	1160	675	322	10.0 U	10.0 U	322	6.95	5470	4120	NA	NA	NA	NA	NA	NA	NA	NA
W-MW-20	Monitoring Well #20	1/22/2009	331	164	19.2	2.96	1030	1240	628	358	10.0 U	10.0 U	358	NA	5680	4120	NA	NA	NA	NA	NA	NA	NA	NA

Table 3. Surface Water, Groundwater, and Produced Water Analytical Results

Sample ID	Sample Location	Sample Date	Calcium (mg/L)	Magnesium (mg/L)	Potassium (mg/L)	Bromide (mg/L)	Chloride (mg/L)	Sulfate (mg/L)	Sodium (mg/L)	Alkalinity, Bicarbonate (as CaCO3) (mg/L)	Alkalinity, Carbonate (as CaCO3) (mg/L)	Alkalinity, Hydroxide (as CaCO3) (mg/L)	Alkalinity, Total (as CaCO3) (mg/L)	pH (pH units)	Specific Conductance (umhos/cm)	Total Dissolved Solids (mg/L)	Benzene (mg/L)	Toluene (mg/L)	Ethylbenzene (mg/L)	Xylenes, total (mg/L)	TX1005 >C12-C28 (mg/L)	TX1005 >C28-C35 (mg/L)	TX1005 C6-C12 (mg/L)	TX1005 C6-C35 (mg/L)
W-OB-01	Observation Well #1	7/7/2008	3660	NA	NA	NA	29400	1960	9580	NA	NA	NA	NA	NA	NA	63800	NA	NA	NA	NA	NA	NA	NA	NA
W-OW-01	Observation Well #1	8/6/2008	4090	1080	61.7	163	28900	1420	9430	288	10.0 U	10.0 U	288	6.14	89500	53900	NA	NA	NA	NA	NA	NA	NA	NA
W-OW-01-D	Observation Well #1 Duplicate	8/6/2008	4090	1100	61.6	164	28400	1490	9540	286	10.0 U	10.0 U	286	6.13	85500	54400	NA	NA	NA	NA	NA	NA	NA	NA
W-OW-01	Observation Well #1	1/22/2009	4060	1130	66.5	147	29500	1410	10600	303	10.0 U	10.0 U	303	NA	80100	52000	NA	NA	NA	NA	NA	NA	NA	NA
W-WW-4313302	Water Well 4313302	7/12/2006	256	NA	NA	NA	100	1090	150	NA	NA	NA	NA	NA	NA	1950	0.0008 U	0.002 U	0.002 U	0.003 U	0.711 U	0.711 U	0.711 U	0.711 U
W-WW-4313302	Water Well 4313302	8/28/2006	288	NA	NA	NA	98.3	1050	149	NA	NA	NA	NA	NA	NA	2040	0.0008 U	0.002 U	0.002 U	0.003 U	0.67 U	0.67 U	0.67 U	0.67 U
W-WW-4313302	Water Well 4313302	4/12/2007	261	NA	NA	NA	98.3	1090	139	NA	NA	NA	NA	NA	NA	1990	NA	NA	NA	NA	NA	NA	NA	NA
W-WW-4313302	Water Well 4313302	8/6/2008	101	97.5	7.95	0.703 J	85	900	111	51.6	10.0 U	10.0 U	51.6	6.98	1590	1210	NA	NA	NA	NA	NA	NA	NA	NA
W-WW-4313603	Water Well 4313603	7/13/2006	147	NA	NA	NA	1500	540	955	NA	NA	NA	NA	NA	NA	3370	0.0008 U	0.002 U	0.002 U	0.003 U	0.679 U	0.679 U	0.679 U	0.679 U
W-WW-4313603-D	Water Well 4313603 Duplicate	7/13/2006	144	NA	NA	NA	1500	545	937	NA	NA	NA	NA	NA	NA	3340	0.0008 U	0.002 U	0.002 U	0.003 U	0.691 U	0.691 U	0.691 U	0.691 U
W-WW-4313603	Water Well 4313603	8/23/2006	158	NA	NA	NA	1410	510	932	NA	NA	NA	NA	NA	NA	3320	0.0008 U	0.002 U	0.002 U	0.003 U	0.678 U	0.678 U	0.678 U	0.678 U
W-WW-4313603	Water Well 4313603	4/11/2007	PUMP NOT OPERATING																					
W-WW-4313605	Water Well 4313605	8/23/2006	106	NA	NA	NA	519	490	437	NA	NA	NA	NA	NA	NA	1740	0.0008 U	0.002 U	0.002 U	0.003 U	0.674 U	0.674 U	0.674 U	0.674 U
W-WW-4313605	Water Well 4313605	4/9/2007	131	NA	NA	NA	563	506	470	NA	NA	NA	NA	NA	NA	1970	NA	NA	NA	NA	NA	NA	NA	NA
W-WW-4313608	Water Well 4313608	7/13/2006	51.8	NA	NA	NA	210	112	205	NA	NA	NA	NA	NA	NA	763	0.0008 U	0.002 U	0.002 U	0.003 U	0.704 U	0.704 U	0.704 U	0.704 U
W-WW-4313608	Water Well 4313608	8/23/2006	56.8	NA	NA	NA	197	104	191	NA	NA	NA	NA	NA	NA	718	0.0008 U	0.002 U	0.002 U	0.003 U	0.679 U	0.679 U	0.679 U	0.679 U
W-WW-4313608	Water Well 4313608	4/11/2007	PUMP NOT OPERATING																					
W-WW-Mays-01	Water Well May's Ranch #1	8/23/2006	4320	NA	NA	NA	27200	1390	12300	NA	NA	NA	NA	NA	NA	47000	0.0008 U	0.002 U	0.002 U	0.003 U	0.651 U	0.651 U	0.651 U	0.651 U
W-WW-Mays-01	Water Well May's Ranch #1	4/9/2007	3720	NA	NA	NA	27900	1650	10600	NA	NA	NA	NA	NA	NA	50600	NA	NA	NA	NA	NA	NA	NA	NA
W-WW-Mays-01-D	Water Well May's Ranch #1 Duplicate	4/9/2007	3630	NA	NA	NA	28700	1670	10300	NA	NA	NA	NA	NA	NA	51900	NA	NA	NA	NA	NA	NA	NA	NA
Water Well Mays-01 (73.5') *	Water Well May's Ranch #1 @73.5 ft btoc	6/21/2007	4580	NA	NA	NA	36000	1350	11900	NA	NA	NA	NA	NA	NA	58200	NA	NA	NA	NA	NA	NA	NA	NA
Water Well Mays-01 (98.5') *	Water Well May's Ranch #1 @98.5 ft btoc	6/21/2007	4630	NA	NA	NA	35800	1600	12100	NA	NA	NA	NA	NA	NA	57900	NA	NA	NA	NA	NA	NA	NA	NA
W-WW-081	Water Well May's Ranch #2	8/6/2008	1140	575	125	34.7	19200	3480	9160	237	10.0 U	10.0 U	237	6.60	59400	36700	NA	NA	NA	NA	NA	NA	NA	NA
W-WW-Mays-02	Water Well May's Ranch #2	1/21/2009	1160	608	131	85.8	17700	3300	10000	270	10.0 U	10.0 U	270	NA	57900	35600	NA	NA	NA	NA	NA	NA	NA	NA
W-WW-Milford-01	Milford Water Well #1	7/14/2006	77.4	NA	NA	NA	659	2960	754	NA	NA	NA	NA	NA	NA	5210	0.0008 U	0.002 U	0.002 U	0.003 U	0.675 U	0.675 U	0.675 U	0.675 U
W-WW-Milford-01-D	Milford Water Well #1 Duplicate	7/14/2006	69.4	NA	NA	NA	467	2020	691	NA	NA	NA	NA	NA	NA	3730	0.0008 U	0.002 U	0.002 U	0.003 U	0.68 U	0.68 U	0.68 U	0.68 U
W-WW-Milford-01	Milford Water Well #1	8/24/2006	191	NA	NA	NA	878	3930	1680	NA	NA	NA	NA	NA	NA	7260	0.0008 U	0.002 U	0.002 U	0.003 U	0.676 U	0.676 U	0.676 U	0.676 U
W-WW-Milford-01-D	Milford Water Well #1 Duplicate	8/24/2006	157	NA	NA	NA	640	2830	1670	NA	NA	NA	NA	NA	NA	5340	0.0008 U	0.002 U	0.002 U	0.003 U	0.679 U	0.679 U	0.679 U	0.679 U
W-WW-Milford-01	Milford Water Well #1	4/11/2007	258	NA	NA	NA	1480	6810	3450	NA	NA	NA	NA	NA	NA	12400	NA	NA	NA	NA	NA	NA	NA	NA
W-WW-Milford-02	Milford Water Well #2	7/14/2006	195	NA	NA	NA	786	5110	2450	NA	NA	NA	NA	NA	NA	7450	0.0008 U	0.002 U	0.002 U	0.003 U	0.686 U	0.686 U	0.686 U	0.686 U
W-WW-Milford-02	Milford Water Well #2	8/24/2006	235	NA	NA	NA	756	5110	2870	NA	NA	NA	NA	NA	NA	8860	0.0008 U	0.002 U	0.002 U	0.003 U	0.682 U	0.682 U	0.682 U	0.682 U
W-WW-Milford-02	Milford Water Well #2	4/11/2007	242	NA	NA	NA	798	5710	2520	NA	NA	NA	NA	NA	NA	9500	NA	NA	NA	NA	NA	NA	NA	NA
W-WW-Milford-02	Milford Water Well #2	8/5/2008	229	118	44.2	1.38	800	4890	2470	431	10.0 U	10.0 U	431	7.22	11200	9980	NA	NA	NA	NA	NA	NA	NA	NA
W-WW-Rawlins	Rawlings Water Well	7/13/2006	59.8	NA	NA	NA	175	126	184	NA	NA	NA	NA	NA	NA	780	0.0008 U	0.002 U	0.002 U	0.003 U	0.704 U	0.704 U	0.704 U	0.704 U
W-RS-03	Colorado River Segment 3	7/12/2006	111	NA	NA	NA	624	273	366	NA	NA	NA	NA	NA	NA	1570	0.0008 U	0.002 U	0.002 U	0.003 U	0.694 U	0.694 U	0.694 U	0.694 U
W-RS-03	Colorado River Segment 3	8/29/2006	85.1	NA	NA	NA	313	184	195	NA	NA	NA	NA	NA	NA	965	NA	NA	NA	NA	NA	NA	NA	NA
W-RS-03	Colorado River Segment 3	4/19/2007	119	NA	NA	NA	679	481	368	NA	NA	NA	NA	NA	NA	1870	NA	NA	NA	NA	NA	NA	NA	NA
W-RS-07	Colorado River Segment 7	7/12/2006	102	NA	NA	NA	647	273	388	NA	NA	NA	NA	NA	NA	1600	0.0008 U	0.002 U	0.002 U	0.003 U	0.706 U	0.706 U	0.706 U	0.706 U
W-RS-07	Colorado River Segment 7	8/29/2006	85.8	NA	NA	NA	324	192	196	NA	NA	NA	NA	NA	NA	980	NA	NA	NA	NA	NA	NA	NA	NA
W-RS-07	Colorado River Segment 7	4/18/2007	125	NA	NA	NA	716	531	392	NA	NA	NA	NA	NA	NA	1970	NA	NA	NA	NA	NA	NA	NA	NA
W-RS-08	Colorado River Segment 8	7/12/2006	104	NA	NA	NA	666	358	396	NA	NA	NA	NA	NA	NA	1660	0.0008 U	0.002 U	0.002 U	0.003 U	0.697 U	0.697 U	0.697 U	0.697 U
W-RS-08	Colorado River Segment 8	8/30/2006	NO ACCESS																					
W-RS-08	Colorado River Segment 8	4/19/2007	NO ACCESS																					
W-RS-09	Colorado River Segment 9	7/12/2006	104	NA	NA	NA	713	302	415	NA	NA	NA	NA	NA	NA	1730	0.0008 U	0.002 U	0.002 U	0.003 U	0.671 U	0.671 U	0.671 U	0.671 U
W-RS-09	Colorado River Segment 9	8/30/2006	84.1	NA	NA	NA	380	208	216	NA	NA	NA	NA	NA	NA	1070	NA	NA	NA	NA	NA	NA	NA	NA
W-RS-09	Colorado River Segment 9	4/19/2007	119	NA	NA	NA	738	543	360	NA	NA	NA	NA	NA	NA	2060	NA	NA	NA	NA	NA	NA	NA	NA
W-RS-10	Colorado River Segment 10	7/12/2006	108	NA	NA	NA	735	300	420	NA	NA	NA	NA	NA	NA	1760	0.0008 U	0.002 U	0.002 U	0.003 U	0.693 U	0.693 U	0.693 U	0.693 U
W-RS-10	Colorado River Segment 10	8/30/2006	93.3	NA	NA	NA	428	227	248	NA	NA	NA	NA	NA	NA	1100	NA	NA	NA	NA	NA	NA	NA	NA
W-RS-10	Colorado River Segment 10	4/19/2007	132	NA	NA	NA	784	576	374	NA	NA	NA	NA	NA	NA	2210	NA	NA	NA	NA	NA	NA	NA	NA
W-RS-11	Colorado River Segment 11	7/12/2006	96.7	NA	NA	NA	636	319	379	NA	NA	NA	NA	NA	NA	1550	0.0008 U	0.002 U	0.002 U	0.003 U	0.699 U	0.699 U	0.699 U	0.699 U
W-RS-11	Colorado River Segment 11	8/29/2006	91.6	NA	NA	NA	388	214	252	NA	NA	NA	NA	NA	NA	1110	NA	NA	NA	NA	NA	NA	NA	NA
W-RS-11	Colorado River Segment 11	4/19/2007	135	NA	NA	NA	809	600	403	NA	NA	NA	NA	NA	NA	2260	NA	NA	NA	NA	NA	NA	NA	NA
W-RS-12	Colorado River Segment 12	7/12/2006	91.5	NA	NA	NA	775	325	460	NA	NA	NA	NA	NA	NA	1780	0.0008 U	0.002 U	0.002 U	0.003 U	0.701 U	0.701 U	0.701 U	0.701 U
W-RS-12	Colorado River Segment 12	8/29/2006	90.8	NA	NA	NA	391	226	231	NA	NA	NA	NA	NA	NA	1060	NA	NA	NA	NA	NA	NA	NA	NA
W-RS-12	Colorado River Segment 12	4/19/2007	136	NA	NA	NA	841	632	441	NA	NA	NA	NA	NA	NA	2300	NA	NA	NA	NA	NA	NA	NA	NA
W-RS-12	Colorado River Segment 12	1/19/2009	179	112	17.7	3.81	1200	727	724	182	10.0 U	10.0 U	182	NA	5020	3160	NA	NA	NA	NA	NA	NA	NA	NA
W-RS-13	Colorado River Segment 13	7/12/2006	104	NA	NA	NA	794	319	474	NA	NA	NA	NA	NA	NA	1800	0.0008 U	0.002 U	0.002 U	0.003 U	0.691 U	0.691 U	0.691 U	0.691 U
W-RS-13	Colorado River Segment 13	8/29/2006	98.5	NA	NA	NA	378	208	240	NA	NA	NA	NA	NA	NA	1040	NA	NA	NA	NA	NA	NA	NA	NA
W-RS-13	Colorado River Segment 13	4/19/2007	137	NA	NA	NA	884	643	427	NA	NA	NA	NA	NA	NA	2410	NA	NA	NA	NA	NA	NA	NA	NA
W-RS-13	Colorado River Segment 13	1/19/2009	182	123	20.1	4.02	1310	770	810	153	10.0 U	10.0 U	153	NA	5380	3080	NA	NA	NA	NA	NA	NA	NA	NA
W-RS-14	Colorado River Segment 14	7/14/2006	97.8	NA	NA	NA	859	342	467	NA	NA	NA	NA	NA	NA	2000	0.0008 U	0.002 U	0.002 U	0.003 U	0.673 U	0.673 U	0.673 U	0.673 U
W-RS-14	Colorado River Segment 14	8/29/2006	86.5	NA	NA	NA	364	221	214	NA	NA	NA	NA	NA	NA	1010	NA	NA	NA	NA	NA	NA	NA	NA
W-RS-14	Colorado River Segment 14	4/18/2007	146	NA	NA	NA	899	667	463	NA	NA	NA	NA	NA	NA	2440	NA	NA	NA	NA	NA	NA	NA	NA
W-RS-14	Colorado River Segment 14	1/19/2009	192	125	19.9	3.92	1280	744	834	182	10.0 U	10.0 U	182	NA	5230	3360	NA	NA	NA	NA	NA	NA	NA	NA
W-RS-14-D	Colorado River Segment 14 Duplicate	1/19/2009	187	121	19	3.98	1330	753	824	183	10.0 U	10.0 U	183	NA	5360	3270	NA	NA	NA	NA	NA	NA	NA	NA
W-RS-15	Colorado River Segment 15	7/14/2006	106	NA	NA	NA	906	351	499	NA	NA	NA	NA	NA	NA	2070	0.0008 U	0.002 U	0.002 U	0.003 U	0.686 U	0.686 U	0.686 U	0.686 U
W-RS-15	Colorado River Segment 15	8/29/2006	84	NA	NA	NA	350	211	213	NA	NA	NA	NA	NA	NA	1020	NA	NA	NA	NA	NA	NA	NA	NA
W-RS-15	Colorado River Segment 15	4/18/2007	147	NA	NA	NA	909	665	497	NA	NA	NA	NA	NA	NA	2440	NA	NA	NA	NA	NA	NA	NA	NA
W-RS-15	Colorado River Segment 15	1/19/2009	200	125	19.6	4.09	1370	767	834	189	10.0 U	10.0 U	189	NA	5430	3340	NA	NA	NA	NA	NA	NA	NA	NA
W-RS-16	Colorado River Segment 16	7/14/2006	99.6	NA	NA	NA	909	352	473	NA	NA	NA	NA	NA	NA	2070	0.0008 U	0.002 U	0.002 U	0.003 U	0.69 U	0.69 U	0.69 U	0.69 U
W-RS-16	Colorado River Segment 16	8/29/2006	87.2	NA	NA	NA	338	193	214	NA	NA	NA	NA	NA	NA	1020	NA	NA	NA	NA	NA	NA	NA	NA
W-RS-16	Colorado River Segment 16	4/18/2007	140	NA	NA	NA	930	677	454	NA	NA	NA	NA	NA	NA	2480	NA	NA	NA	NA	NA	NA	NA	NA
W-RS-16	Colorado River Segment 16	1/19/2009	194	121	18.5	4.33	1450	803	810	190	10.0 U	10.0 U	190	NA	5580	3580	NA	NA	NA	NA	NA	NA	NA	NA
W-RS-17	Colorado River Segment 17	7/14/2006	98	NA	NA	NA	899	354	471	NA	NA	NA	NA	NA	NA	2050	0.0008 U	0.002 U	0.002 U	0.003 U	0.691 U	0.691 U	0.691 U	0.691 U
W-RS-17	Colorado River Segment 17	8/29/2006	84.9	NA	NA	NA	338	185	212	NA	NA	NA	NA	NA	NA	1010	NA	NA	NA	NA	NA	NA	NA	NA
W-RS-17	Colorado River Segment 17	4/18/2007	148	NA	NA	NA	948	677	483	NA	NA	NA	NA	NA	NA	2470	NA	NA	NA	NA	NA	NA	NA	NA
W-RS-17	Colorado River Segment 17	1/19/2009	213	128	20.7	4.39	1440	798	873	190	10.0 U	10.0 U	190	NA	5740	3680	NA	NA	NA	NA	NA	NA	NA	NA
W-SG-4314102-01	Spring 4314102 - West side of spring	7/13/2006	61.2	NA	NA	NA	4400	2300	168	NA	NA	NA	NA	NA	NA	9980	0.0008 U	0.002 U	0.002 U	0.003 U	0.699 U	0.699 U	0.699 U	0.699 U
W-SG-4314102-01	Spring 4314102 - West side of spring	8/28/2006	858	NA	NA	NA	7640	2480	2760	NA	NA	NA	NA	NA	NA	15300	0.0008 U	0.002 U	0.002 U	0.003 U	0.663 U	0.663 U	0.663 U	0.663 U
W-SG-4314102-01	Spring 4314102 - West side of spring	4/9/2007	882	NA	NA	NA	6280	2710	2750	NA	NA	NA	NA	NA	NA	12200	NA	NA	NA	NA	NA	NA	NA	NA
W-SG-4314102-01	Spring 4314102 - West side of spring	1/19/2009	667	457	18.9	13.2	4510	2760	2650	600	10.0 U	10.0 U	600	NA	16400	12000	NA	NA	NA	NA	NA	NA	NA	NA
W-SG-4314102-02	Spring 4314102 - East side of spring	4/9/2007	21.3	NA	NA	NA	0.658 J	1.42 J	2.31	NA	NA	NA	NA	NA	NA	179	NA	NA	NA	NA	NA	NA	NA	NA

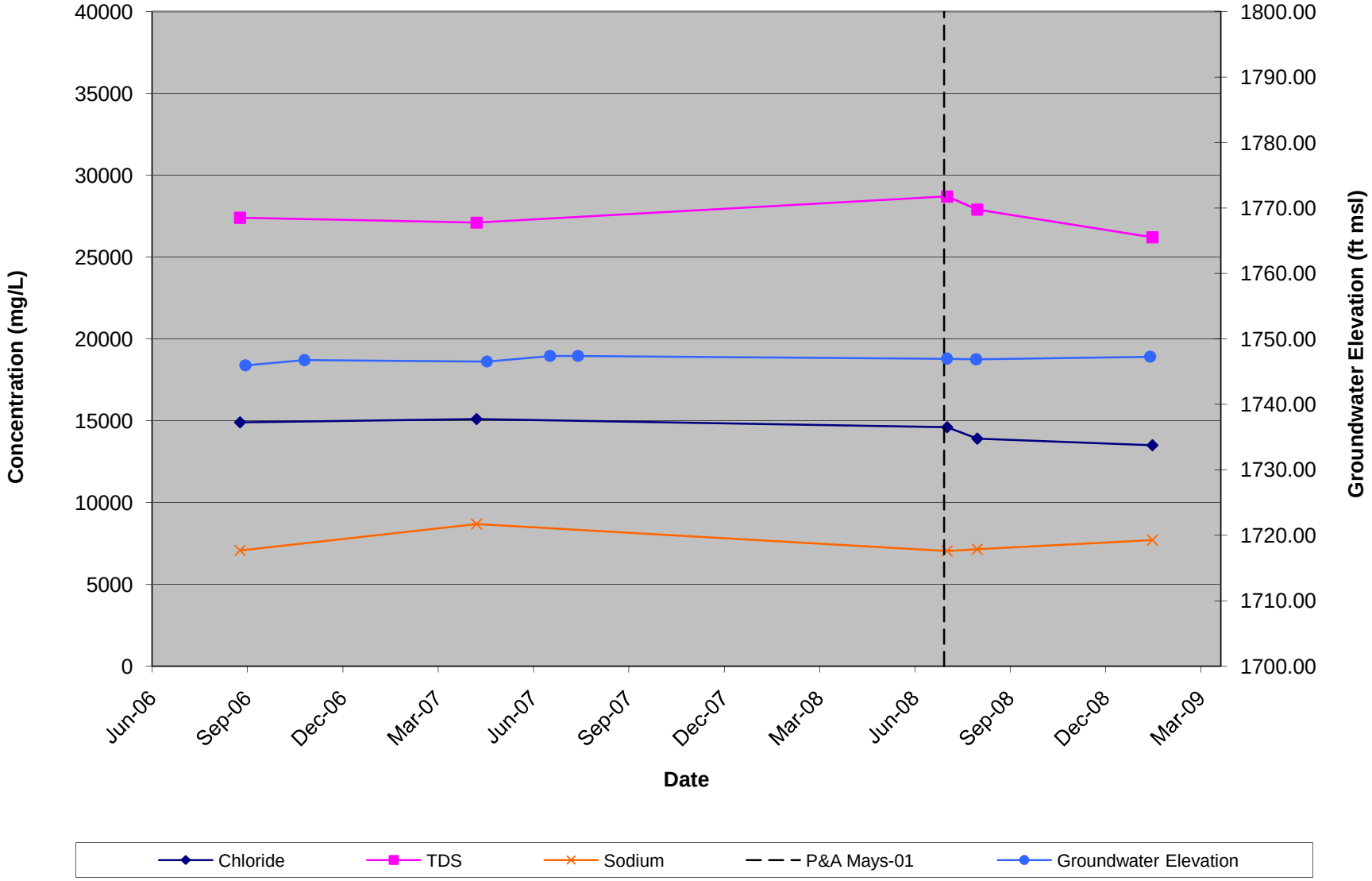
Table 3. Surface Water, Groundwater, and Produced Water Analytical Results

Sample ID	Sample Location	Sample Date	Calcium (mg/L)	Magnesium (mg/L)	Potassium (mg/L)	Bromide (mg/L)	Chloride (mg/L)	Sulfate (mg/L)	Sodium (mg/L)	Alkalinity, Bicarbonate (as CaCO3) (mg/L)	Alkalinity, Carbonate (as CaCO3) (mg/L)	Alkalinity, Hydroxide (as CaCO3) (mg/L)	Alkalinity, Total (as CaCO3) (mg/L)	pH (pH units)	Specific Conductance (umhos/cm)	Total Dissolved Solids (mg/L)	Benzene (mg/L)	Toluene (mg/L)	Ethylbenzene (mg/L)	Xylenes, total (mg/L)	TX1005 >C12-C28 (mg/L)	TX1005 >C28-C35 (mg/L)	TX1005 C6-C12 (mg/L)	TX1005 C6-C35 (mg/L)
W-SG-4314104-01	Spring 4314104	7/14/2006	694	NA	NA	NA	4660	19100	7640	NA	NA	NA	NA	NA	NA	31900	0.0008 U	0.002 U	0.002 U	0.003 U	0.674 U	0.674 U	0.674 U	0.674 U
W-SG-4314104	Spring 4314104	8/29/2006	487	NA	NA	NA	4360	19000	6770	NA	NA	NA	NA	NA	NA	31800	0.0008 U	0.002 U	0.002 U	0.003 U	0.657 U	0.657 U	0.657 U	0.657 U
W-SG-4314104-D	Spring 4314104 Duplicate	8/29/2006	506	NA	NA	NA	4150	18000	6090	NA	NA	NA	NA	NA	NA	31000	NA	NA	NA	NA	NA	NA	NA	NA
W-SG-4314104	Spring 4314104	4/11/2007	352	NA	NA	NA	1070	4660	2030	NA	NA	NA	NA	NA	NA	8650	NA	NA	NA	NA	NA	NA	NA	NA
W-SP-01	May's Ranch Seep	7/13/2006	84.3	NA	NA	NA	508	461	393	NA	NA	NA	NA	NA	NA	1630	0.0008 U	0.002 U	0.002 U	0.003 U	0.716 U	0.716 U	0.716 U	0.716 U
W-SP-01	May's Ranch Seep	8/23/2006	95.2	NA	NA	NA	503	471	384	NA	NA	NA	NA	NA	NA	1650	0.0008 U	0.002 U	0.002 U	0.003 U	0.676 U	0.676 U	0.676 U	0.676 U
W-SP-01	May's Ranch Seep	4/9/2007	87.3	NA	NA	NA	368	393	304	NA	NA	NA	NA	NA	NA	1330	NA	NA	NA	NA	NA	NA	NA	NA
W-SP-01	May's Ranch Seep	1/20/2009	124	82.8	23.2	1.31	462	443	361	350	10.0 U	10.0 U	350	NA	2520	1630	NA	NA	NA	NA	NA	NA	NA	NA
W-C-01	May's Ranch Creek (upstream)	7/13/2006	51	NA	NA	NA	133	16.4	60.2	NA	NA	NA	NA	NA	NA	396	0.0008 U	0.002 U	0.002 U	0.003 U	0.679 U	0.679 U	0.679 U	0.679 U
W-C-01	May's Ranch Creek (upstream)	8/23/2006	41.6	NA	NA	NA	282	9.51	141	NA	NA	NA	NA	NA	NA	590	0.0008 U	0.002 U	0.002 U	0.003 U	0.676 U	0.676 U	0.676 U	0.676 U
W-C-01	May's Ranch Creek (upstream)	4/9/2007	43	NA	NA	NA	23.8	4.18	15.8	NA	NA	NA	NA	NA	NA	169	NA	NA	NA	NA	NA	NA	NA	NA
W-C-02	May's Ranch Creek (downstream)	4/9/2007	50	NA	NA	NA	75.6	30.2	43.6	NA	NA	NA	NA	NA	NA	291	NA	NA	NA	NA	NA	NA	NA	NA
W-Q-01	SANCO Quarry Pond	7/12/2006	479	NA	NA	NA	855	453	464	NA	NA	NA	NA	NA	NA	2100	0.0008 U	0.002 U	0.002 U	0.003 U	0.71 U	0.71 U	0.71 U	0.71 U
W-Q-01	SANCO Quarry Pond	8/30/2006	312	NA	NA	NA	523	383	289	NA	NA	NA	NA	NA	NA	1510	NA	NA	NA	NA	NA	NA	NA	NA
W-Q-01	SANCO Quarry Pond	4/19/2007	1190	NA	NA	NA	803	606	422	NA	NA	NA	NA	NA	NA	2160	NA	NA	NA	NA	NA	NA	NA	NA
W-Q-01-D	SANCO Quarry Pond Duplicate	4/19/2007	1210	NA	NA	NA	809	609	374	NA	NA	NA	NA	NA	NA	2240	NA	NA	NA	NA	NA	NA	NA	NA
W-T-01	Wendkirk Oil Field Produced Water Tank	4/16/2007	8160	NA	NA	NA	89900	224	38300	NA	NA	NA	NA	NA	NA	138000	0.326	0.278	0.0485	0.273	12.2	1.19 J	12.9	26.3

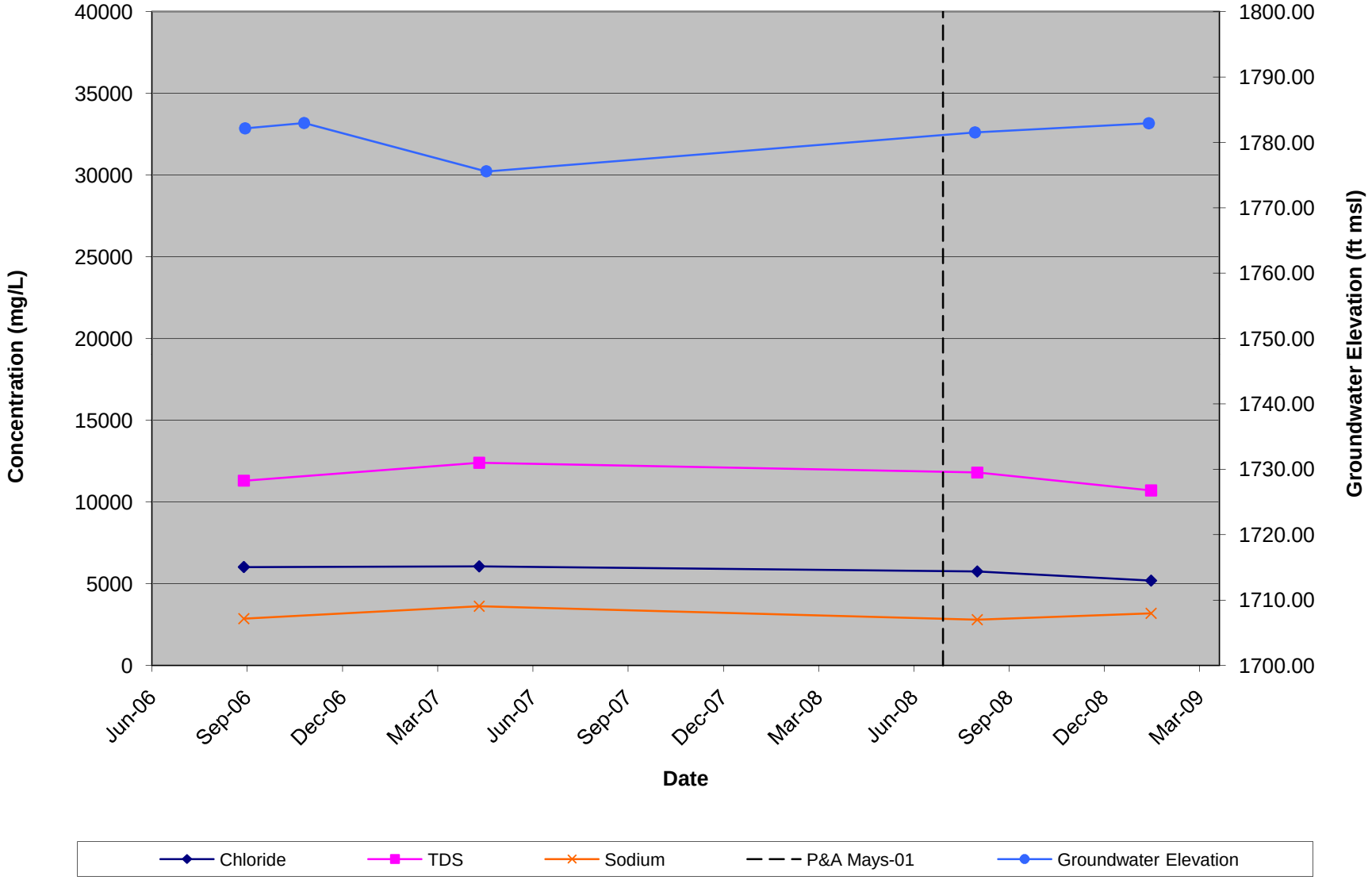
Notes
mg/L = milligrams per liter
U = analyte not detected
J = estimated concentration
NA = not analyzed
* = Grab sample for qualitative analysis only

GRAPHS

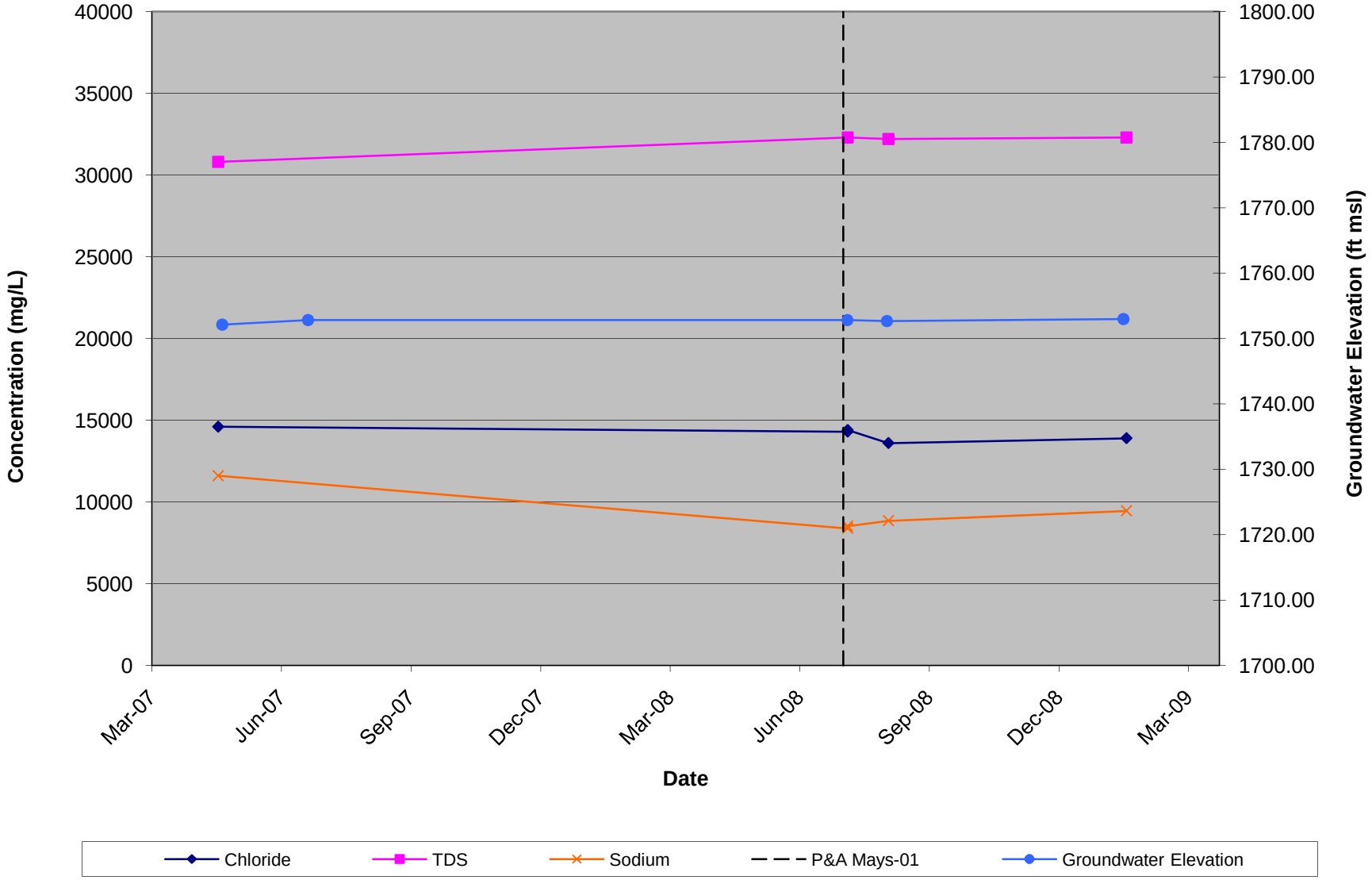
GRAPH 1. MW-05 Concentrations and Groundwater Elevations



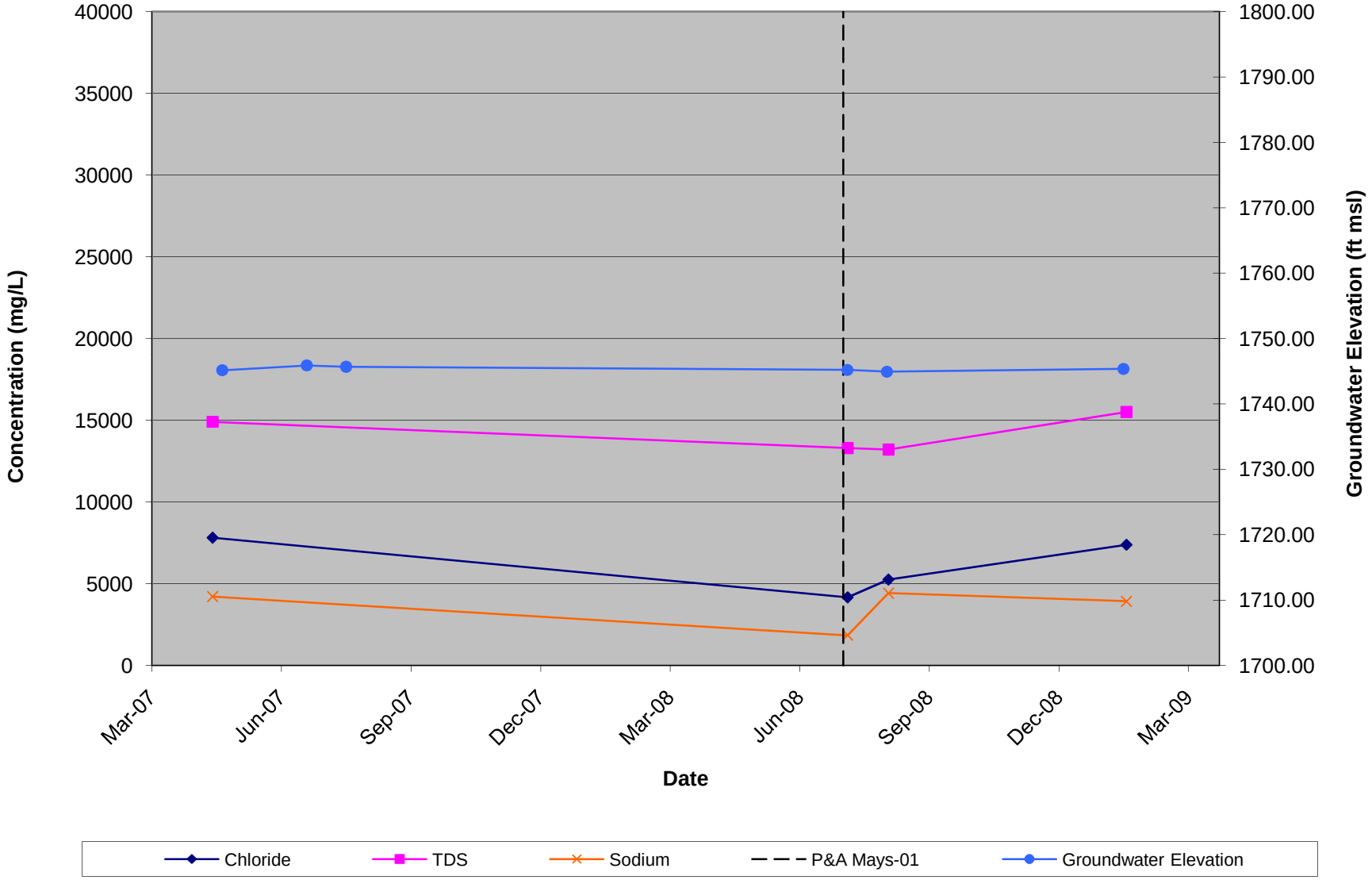
GRAPH 2. MW-06 Concentrations and Groundwater Elevations



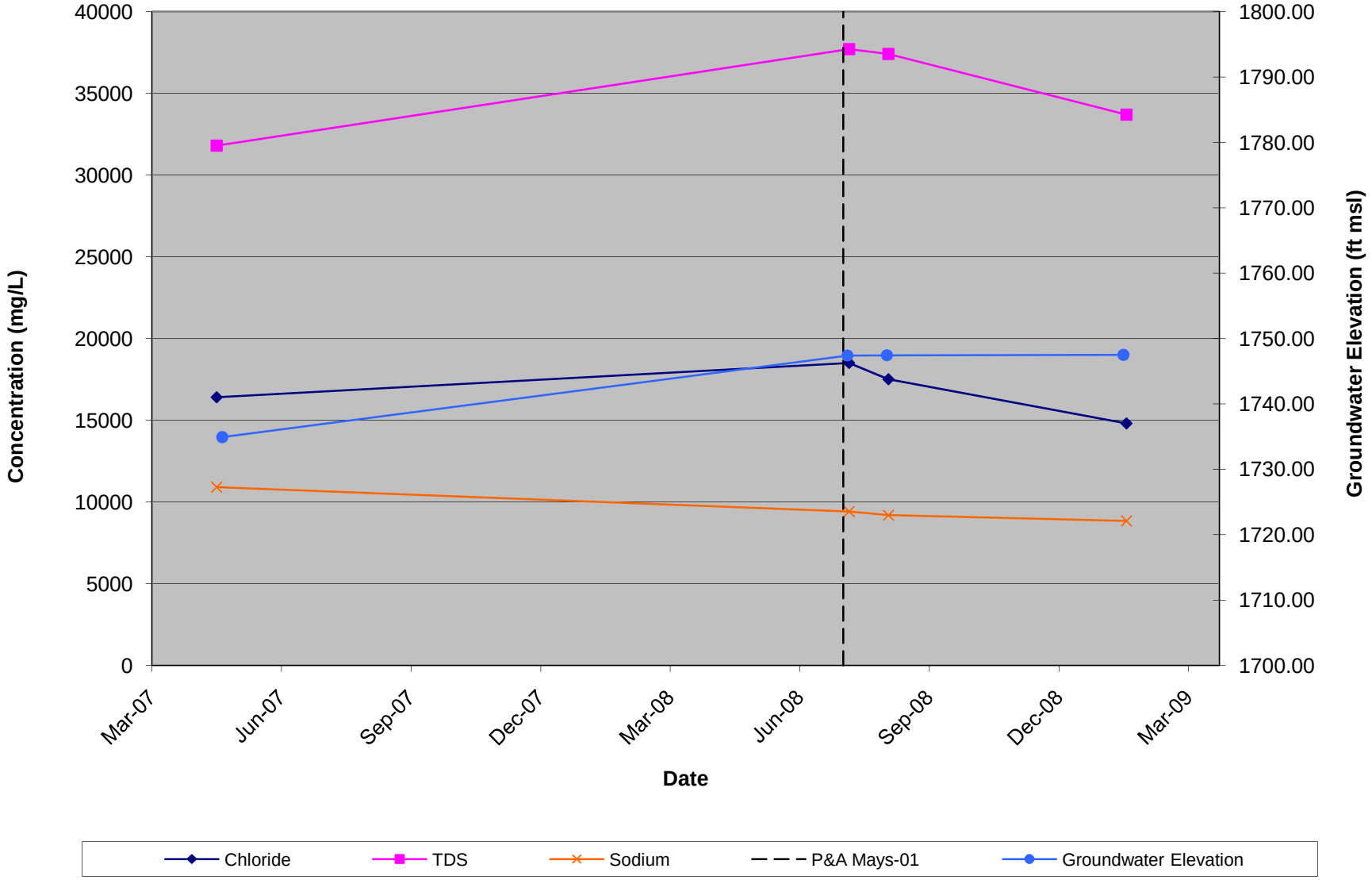
GRAPH 3. MW-10 Concentrations and Groundwater Elevations



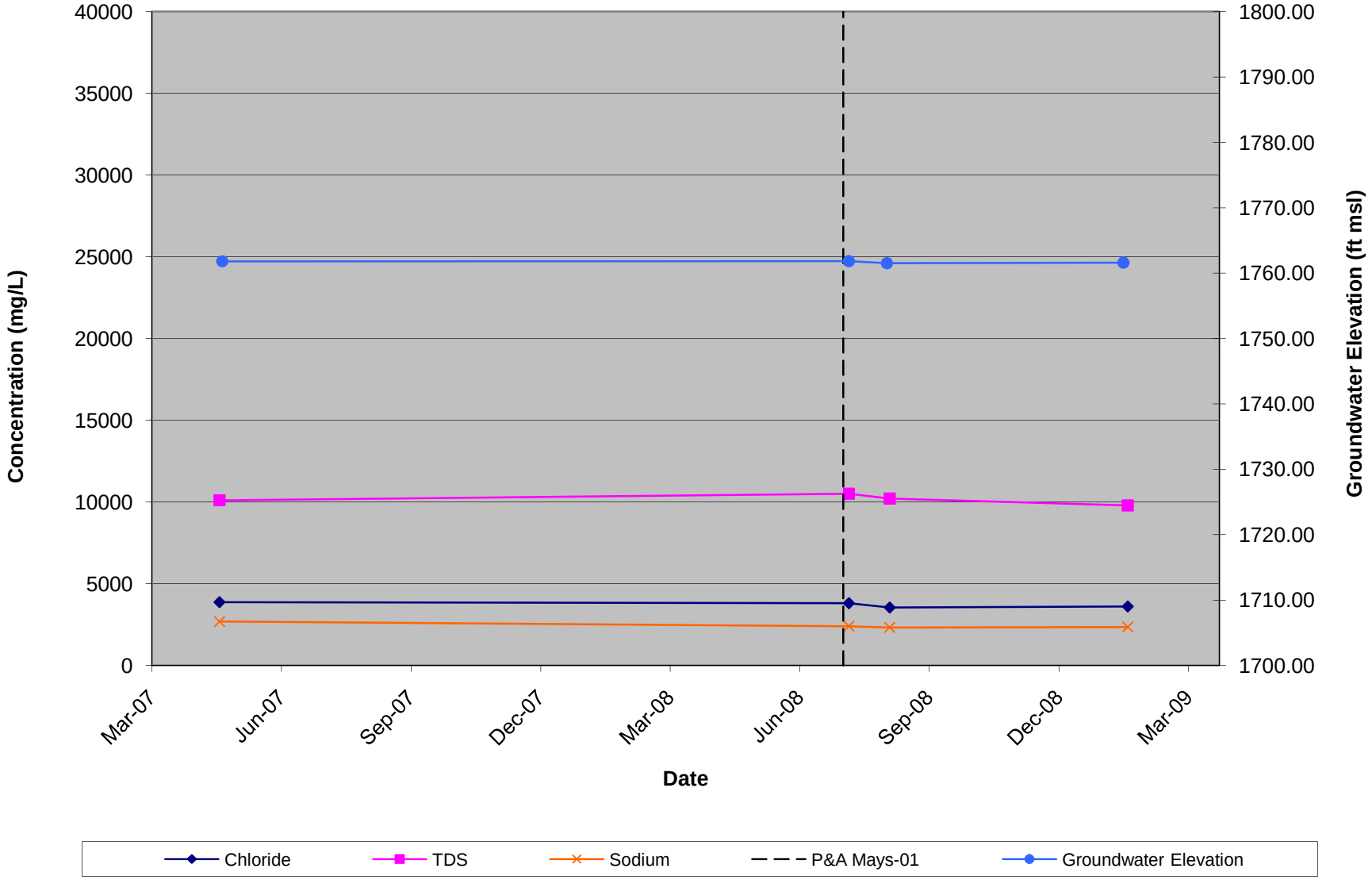
GRAPH 4. MW-11 Concentrations and Groundwater Elevations



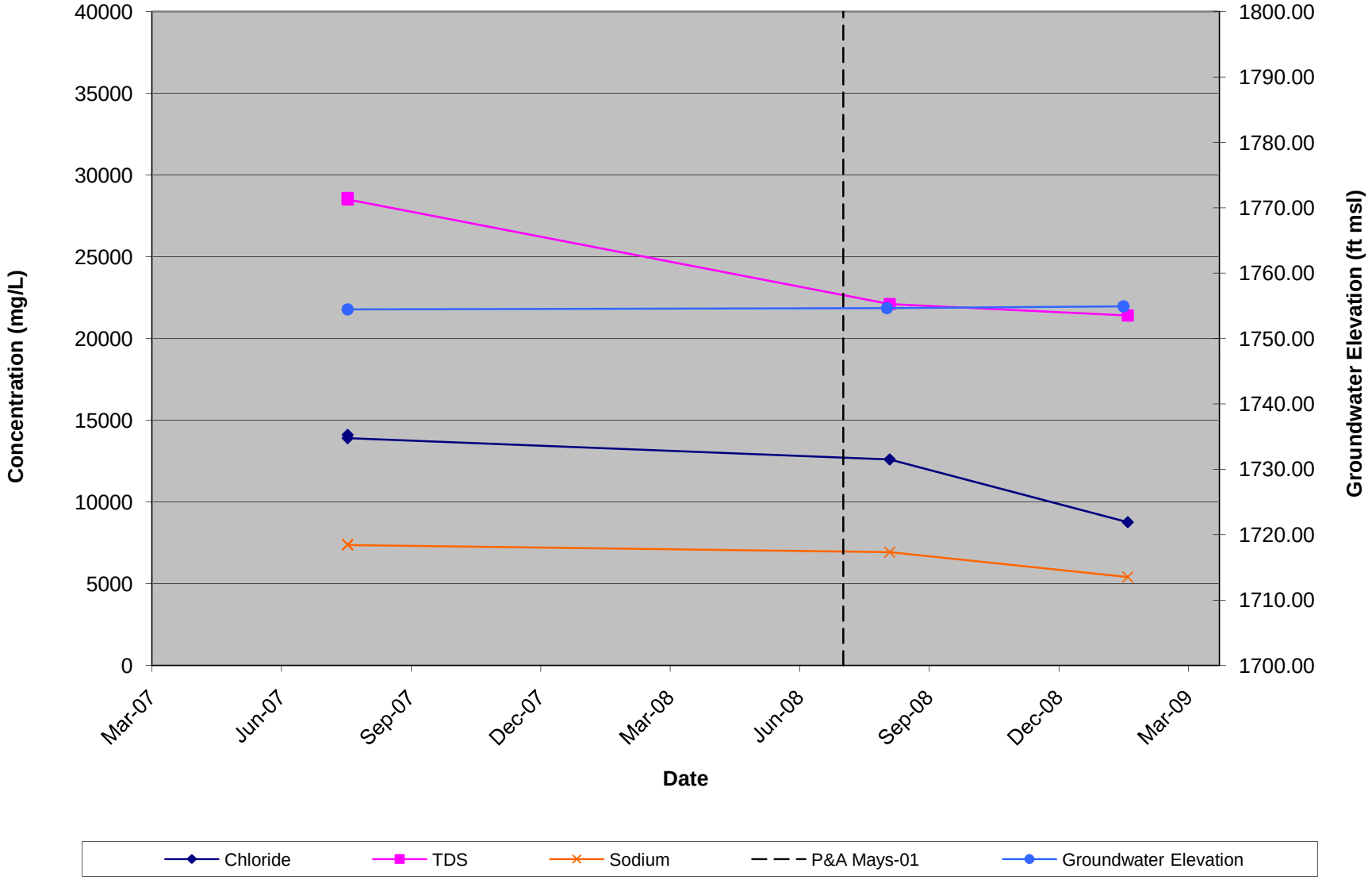
GRAPH 5. MW-12 Concentrations and Groundwater Elevations



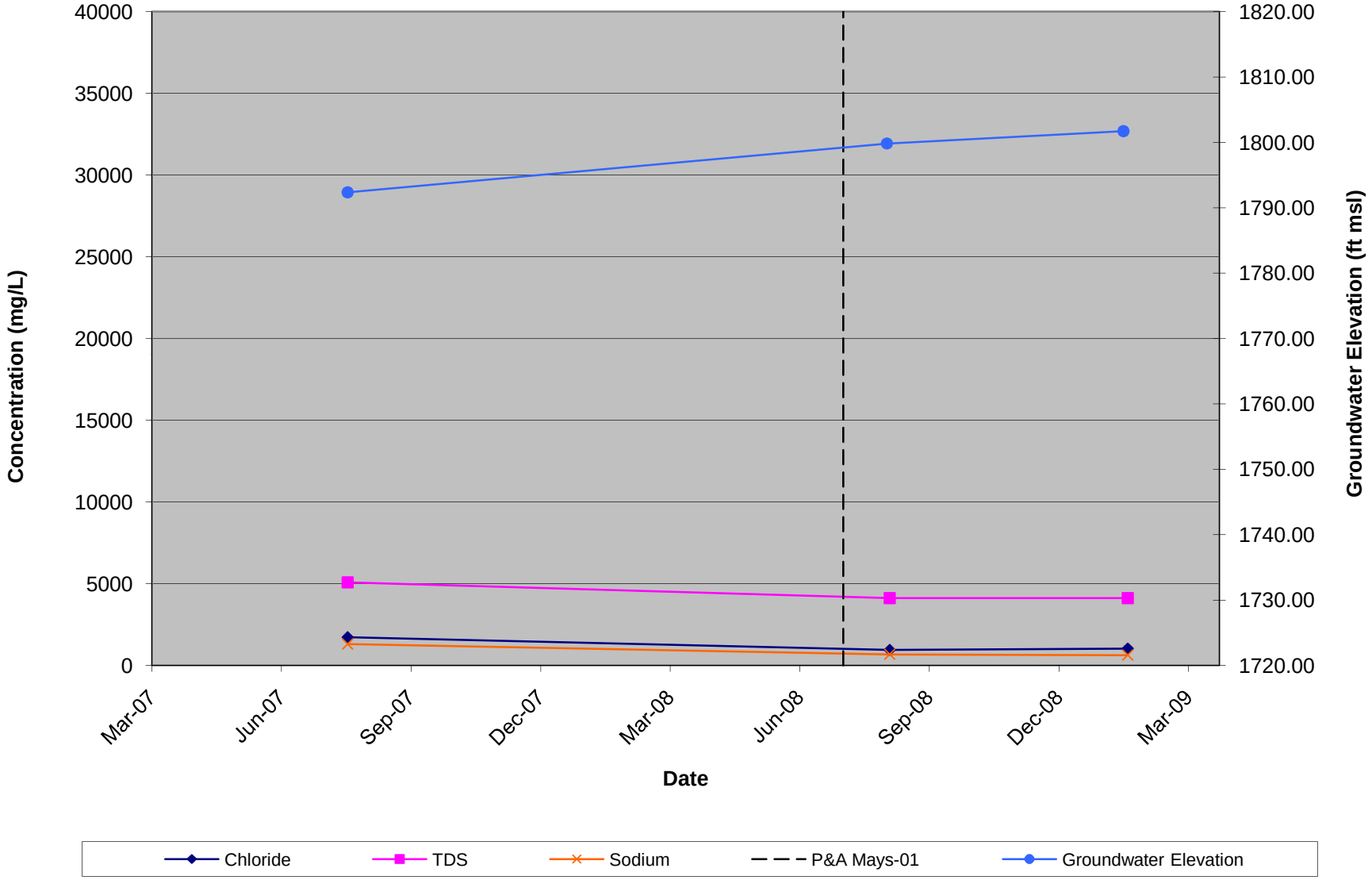
GRAPH 6. MW-17 Concentrations and Groundwater Elevations



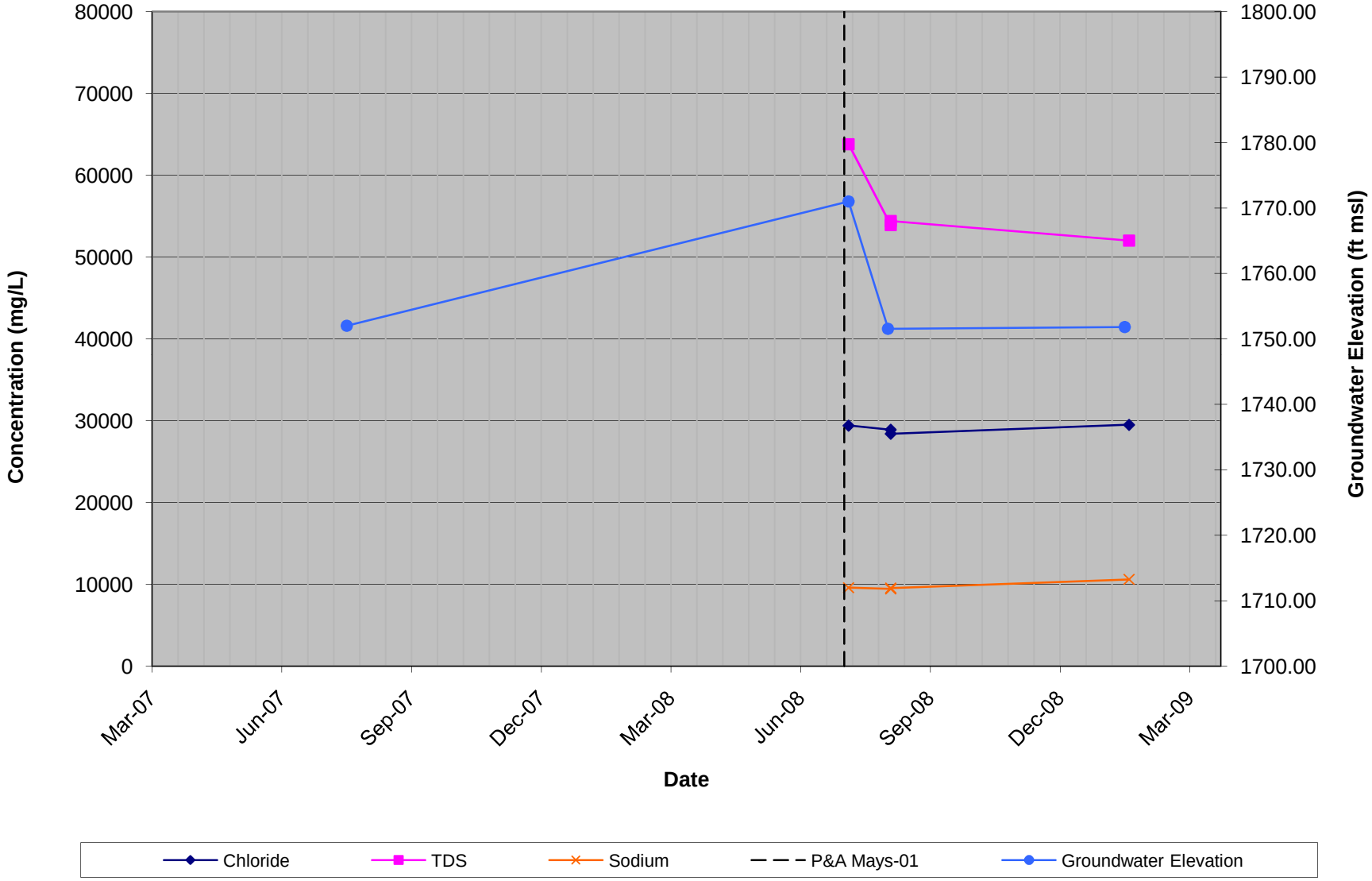
GRAPH 7. MW-19 Concentrations and Groundwater Elevations



GRAPH 8. MW-20 Concentrations and Groundwater Elevations



GRAPH 9. OW-01 Concentrations and Groundwater Elevations



ATTACHMENT 1

FIELD FORMS

GROUNDWATER SAMPLING FORM

TRC

Sample Location	W-MW-1
Client	*Railroad Commission of Texas*
Site	*Wendkirk Oil Field, Coke County, Texas*

Depth to Water (ft)	Before Sampling	25.17	Sample Collection Time	1240
	After Sampling	36.1	Purge Method	Disp. Bailer
Total Depth (ft)		40.1	Sample Method	"
Standing Water Column (ft)		15	Water Description	Silty TAN
One Purge Volume (gal)		2.75	Sampling Personnel	BC

Date	Time	Purge Volume (gal) This Period	Purge Volume (gal) Cumulative	~~Depth to Water (ft)~~	pH (SU)	Temp (C)	Conductivity (u-siemens/cm)	TDS (ppm)	ORP (mV)	~~Dissolved Oxygen (mg/L)~~	~~Turbidity (NTUs)~~ Water description
1-21-09	1225	2.75	2.75		6.73	22.8	27.65	28.66	59		clear
	1229	3.25	6.0		6.69	22.2	27.98	29.23	49		Silty TAN
	1237	2.50	8.5		6.71	21.8	~~29.85~~ 28.07	29.31	35		"
		*bailed dry									

Form Date: 01/24/07

Initial CM Date 1/21/09

Page 1 of 1

GROUNDWATER SAMPLING FORM

TRC

Sample Location	W-MW-2
Client	*Railroad Commission of Texas*
Site	*Wendkirk Oil Field, Coke County, Texas*

Depth to Water (ft)	Before Sampling	27.68	Sample Collection Time	1142
	After Sampling	28.18	Purge Method	BAILER
Total Depth (ft)		35.5	Sample Method	BAILER
Standing Water Column (ft)		7.82	Water Description	tan, Cloudy, No odor, No Sheen
One Purge Volume (gal)		1.25	Sampling Personnel	B. Clark, C. Mangum

Date	Time	Purge Volume (gal) This Period	Purge Volume (gal) Cumulative	Depth to Water (ft)	pH (SU)	Temp (C)	Conductivity (u-siemens/cm)	TDS (ppm)	ORP (mV)	Dissolved Oxygen (mg/L)	Turbidity (NTUs)
1/21/09	1125	1.0	1.0	27.68	7.01	22.7	3132	2420	+132		HIGH
	1129	1.0	2.0	NM	~~7.08~~ 6.81	21.9	3069	2373	+108		"
	1137	1.0	3.0	NM	6.84	22.0	3151	2436	+110		"
	1140	1.0	4.0	NM	6.88	22.0	3144	2435	+89		
	1142	– COLLECT –			6.83	22.0	3164	2437	+80		

Form Date: 01/24/07

Initial CM Date 1/21/09

Page 1 of 1

GROUNDWATER SAMPLING FORM

TRC

Sample Location	W-MW-3
Client	*Railroad Commission of Texas*
Site	*Wendkirk Oil Field, Coke County, Texas*

Depth to Water (ft)	Before Sampling	20.90	Sample Collection Time	1140
	After Sampling	23.35	Purge Method	BAILER
Total Depth (ft)		37.7	Sample Method	BAILER
Standing Water Column (ft)		17.0	Water Description	TAN, SILTY / CLOUDY NO ODOR, NO SHEEN
One Purge Volume (gal)		2.75	Sampling Personnel	[illegible]

Date	Time	Purge Volume (gal) This Period	Purge Volume (gal) Cumulative	Depth to Water (ft)	pH (SU)	Temp (C)	Conductivity (u-siemens/cm)	TDS (ppm)	ORP (mV)	Dissolved Oxygen (mg/L)	Turbidity (NTUs)
1-21-09	1120	2.75	2.75		6.77	21.6	9212	8120	217	NM	Silty/Grey
	1124 3.0	~~2.75~~	5.75		6.51	21.3	8310	8303	219		
	1130	2.50	8.25		6.53	21.3	9371	8288	217		
	1132	1.0	9.25		6.52	21.2	9354	8303	216		
	1134	1.0	10.25		6.54	21.2	9407	8301	212		

Form Date: 01/24/07

Initial CM Date 1/21/09

GROUNDWATER SAMPLING FORM

TRC

Sample Location	W-MW-4
Client	*Railroad Commission of Texas*
Site	*Wendkirk Oil Field, Coke County, Texas*

Depth to Water (ft)	Before Sampling	16.41	Sample Collection Time	1620
	After Sampling	22.15	Purge Method	BAILER
Total Depth (ft)		34.3	Sample Method	BAILER
Standing Water Column (ft)		18	Water Description	Redish Brown, Cloudy, No sheen, No odor.
One Purge Volume (gal)		2.93 ~ 3.0 GAL	Sampling Personnel	B. CLARK C. MANSURI

Date	Time	Purge Volume (gal) This Period	Purge Volume (gal) Cumulative	Depth to Water (ft)	pH (SU)	Temp (C)	Conductivity (u-siemens/cm)	TDS (ppm)	ORP (mV)	Dissolved Oxygen (mg/L)	Turbidity (NTUs)
1/20/09	1546	3.0	3.0	16.41	6.88	20.9	8,261	7,366	+77		HIGH
	1551	3.0	6.0	NM	6.69	21.1	11,170	10,300	+22		"
	1554	3.0	9.0	NM	6.79	20.8	13,430	12,790	−13		"
	1557	2.0	11.0	32.2	6.79	21.0	13,510	12,880	+2		"

Form Date: 01/24/07

Initial CM Date 1/20/09

GROUNDWATER SAMPLING FORM

TRC

Sample Location	W-MW-5
Client	*Railroad Commission of Texas*
Site	*Wendkirk Oil Field, Coke County, Texas*

Depth to Water (ft)	Before Sampling	15.91	Sample Collection Time	1415
	After Sampling	26.21	Purge Method	Disp. Bailer
Total Depth (ft)		32.7	Sample Method	"
Standing Water Column (ft)		16	Water Description	Silty Gray
One Purge Volume (gal)		2.5 GAL	Sampling Personnel	BC

Date	Time	Purge Volume (gal) This Period	Purge Volume (gal) Cumulative	~~Depth to Water (ft)~~	pH (SU)	Temp (C)	Conductivity (u-siemens/cm) m	TDS (ppm)	ORP (mV)	~~Dissolved Oxygen (mg/L)~~	Turbidity (NTUs)
1/21/09	1400	2.75	2.75		7.15	21.4	37.90	41.92	0		Clear
	1404	2.75	5.5		6.83	21.1	38.77	43.14	-8		silty grey
	1408	2.0	7.5		6.75	21.0	38.73	43.09	-8		
	1413	1.0	8.5		6.73	20.9	38.59	42.61	-8		

Form Date: 01/24/07

Initial CM Date 1/21/2009

GROUNDWATER SAMPLING FORM

TRC

Sample Location	W- MW-6
Client	*Railroad Commission of Texas*
Site	*Wendkirk Oil Field, Coke County, Texas*

Depth to Water (ft)	Before Sampling	51.57	Sample Collection Time	1032
	After Sampling	88.18	Purge Method	BAILER
Total Depth (ft)		96.7	Sample Method	BAILER
Standing Water Column (ft)		45'	Water Description	reddish brown, No odor, No sheen.
One Purge Volume (gal)		7.25	Sampling Personnel	B. CLARK C. MANSURI

Date	Time	Purge Volume (gal)		Depth to Water (ft)	pH (SU)	Temp (C)	Conductivity (u-siemens/cm)	TDS (ppm)	ORP (mV)	Dissolved Oxygen (mg/L)	Turbidity (NTUs)
		This Period	Cumulative								
1/21/09	1000	7.0	7.0	51.57	6.84	20.1	17,660	16,710	-27		MED.
↓	1016	7.0	14.0	NM	6.77	21.3	17,230	16,190	-25		"
↓	1031	7.0	21.0	88.18	6.79	20.9	17,280	16,280	-13		HIGH

Form Date: 01/24/07

Initial CM Date 1/21/09

GROUNDWATER SAMPLING FORM

TRC

Sample Location	W-MW-7
Client	*Railroad Commission of Texas*
Site	*Wendkirk Oil Field, Coke County, Texas*

Depth to Water (ft)	Before Sampling	29.56	Sample Collection Time	1348
	After Sampling	35.66	Purge Method	BAILER
Total Depth (ft)		36.90	Sample Method	BAILER
Standing Water Column (ft)		7.34	Water Description	TAN CLOUDY, NO ODOR, NO SHEEN
One Purge Volume (gal)		1.25	Sampling Personnel	B. Clark C. Mansuri

Date	Time	Purge Volume (gal)		Depth to Water (ft)	pH (SU)	Temp (C)	Conductivity (u-siemens/cm)	TDS (ppm)	ORP (mV)	Dissolved Oxygen (mg/L)	Turbidity (NTUs)
		This Period	Cumulative								
1/20/09	1342	1.0	1.0	29.56	7.44	20.5	2,090	1655	-24		MED.
↓	1345	1.0	2.0	NM	7.35	21.3	2,065	1,628	-20		
	1347	1.0	3.0	NM	7.37	21.1	2,032	1,601	-20		

Form Date: 01/24/07

Initial CM Date 1/20/09

GROUNDWATER SAMPLING FORM

TRC

Sample Location	W-MW-8
Client	*Railroad Commission of Texas*
Site	*Wendkirk Oil Field, Coke County, Texas*

Depth to Water (ft)	Before Sampling	32.14	Sample Collection Time	1310
	After Sampling	35.55	Purge Method	BAILER
Total Depth (ft)		58.7	Sample Method	BAILER
Standing Water Column (ft)		26.5	Water Description	CLEAR TAN, NO ODOR, NO SHEEN
One Purge Volume (gal)		4.25	Sampling Personnel	CM, BC

Date	Time	Purge Volume (gal)		Depth to Water (ft)	pH (SU)	Temp (C)	Conductivity (u-siemens/cm)	TDS (ppm)	ORP (mV)	Dissolved Oxygen (mg/L)	Turbidity (NTUs)
		This Period	Cumulative								
1/20/2009	1236	4.00	4.00	32.14	7.14	20.3	9892	9024	+105		MEDIUM
	1245	4.00	8.00	NM	7.20	20.0	19,590	20,040	+19		
	1256	4.00	12.00	NM	7.14	20.3	20,010	20,390	-6		
	1305	1.00	13.00	NM	7.02	20.6	20,580	21,150	+2		
	1310	—	—	35.55	—	—	—	—	—		

Form Date: 01/24/07

Initial CM Date 1/20/09

Page 1 of 1

GROUNDWATER SAMPLING FORM

TRC

Sample Location	W-MW-9
Client	*Railroad Commission of Texas*
Site	*Wendkirk Oil Field, Coke County, Texas*

Depth to Water (ft)	Before Sampling	15.79	Sample Collection Time	1022
	After Sampling	15.92	Purge Method	BAILER
Total Depth (ft)		29.50	Sample Method	BAILER
Standing Water Column (ft)		~~14.39~~ 13.71	Water Description	Reddish brown, Cloudy, No Odor, No Sheen.
One Purge Volume (gal)		2.25	Sampling Personnel	BC, CM

Date	Time	Purge Volume (gal) This Period	Purge Volume (gal) Cumulative	Depth to Water (ft)	pH (SU)	Temp (C)	Conductivity (u-siemens/cm)	TDS (ppm)	ORP (mV)	Dissolved Oxygen (mg/L)	Turbidity (NTUs)
1-20-2009	1009	2.25	2.25	15.79	7.17	19.1	2031	1604	~~+62~~ 58		HIGH
	1012	2.50	4.75	NM	7.28	19.7	1930	1516	+61		
	1014	2.25	7.00	NM	7.37	19.9	2492	2008	-15		
	1021 → ~~1016~~	0.75	7.75	DRY	7.38	19.6	1852	1452	+28		CLEAR
CM	1027	–	–	15.92	–	–	–	–	–		

Form Date: 01/24/07

Initial CM Date 1/20/09

GROUNDWATER SAMPLING FORM

TRC	Sample Location	W-MW-10
	Client	*Railroad Commission of Texas*
	Site	*Wendkirk Oil Field, Coke County, Texas*

Depth to Water (ft)	Before Sampling	14.04	Sample Collection Time	1434
	After Sampling	15.44	Purge Method	BAILER
Total Depth (ft)		70.00	Sample Method	BAILER
Standing Water Column (ft)		56.	Water Description	CLEAR, COLORLESS
One Purge Volume (gal)		8.00 GAL	Sampling Personnel	CM, BC

Date	Time	Purge Volume (gal)		Depth to Water (ft)	pH (SU)	Temp (C)	Conductivity (u-siemens/cm)	TDS (ppm)	ORP (mV)	Dissolved Oxygen (mg/L)	Turbidity (NTUs)
		This Period	Cumulative								
1/21/09	1353	8.0	8.0	14.04	6.75	22.3	41420	45400	-39	NM	LOW
↓	1410	8.0	16.0	NM	6.61	22.3	43070	47420	-40	↓	
	1425	6.0	22.0	NM	6.62	22.0	42670	46840	-30		
	1432	3.0	25.0	NM	6.59	22.1	42130	46240	-30		
↓	1434	0.5	25.5	15.44	6.65	22.0	42960	47280	-26	↓	

Form Date: 01/24/07

Initial CM Date 1/21/09

GROUNDWATER SAMPLING FORM

TRC

Sample Location	W-MW-11
Client	*Railroad Commission of Texas*
Site	*Wendkirk Oil Field, Coke County, Texas*

Depth to Water (ft)	Before Sampling	21.43	Sample Collection Time	1340
	After Sampling	24.14	Purge Method	Disp Bailer
Total Depth (ft)		30.2	Sample Method	"
Standing Water Column (ft)		9.00	Water Description	Slightly Silty brown
One Purge Volume (gal)		1.5 GAL	Sampling Personnel	BC

Date	Time	Purge Volume (gal) This Period	Purge Volume (gal) Cumulative	~~Depth to Water (ft)~~	pH (SU)	Temp (C)	Conductivity (u-siemens/cm)	TDS (ppm)	ORP (mV)	~~Dissolved Oxygen (mg/L)~~	Turbidity (NTUs)
1/21/09	1325	1.5	1.5		7.12	21.7	21.83	21.99	35		Clear
	1328	1.5	3.0		6.87	21.0	22.64	23.01	37		Silty brown
	1331	1.5	4.5		6.79	21.0	23.15	23.59	52		
	1332	0.75	5.25		6.78	20.9	23.09	23.77	58		
	1333	0.75	6.0		6.76	20.8	23.21	23.75	60		

Form Date: 01/24/07

Initial CM Date 1/21/09

GROUNDWATER SAMPLING FORM

TRC

Sample Location	W-MW-12
Client	*Railroad Commission of Texas*
Site	*Wendkirk Oil Field, Coke County, Texas*

Depth to Water (ft)	Before Sampling	18.60	Sample Collection Time	1536
	After Sampling	31.35	Purge Method	BAILER
Total Depth (ft)		39.80	Sample Method	BAILER
Standing Water Column (ft)		21.2	Water Description	Redish Brown, No odor, No sheen.
One Purge Volume (gal)		3.5 GAL	Sampling Personnel	C MANSURI

Date	Time	Purge Volume (gal)		Depth to Water (ft)	pH (SU)	Temp (C)	Conductivity (u-siemens/cm)	TDS (ppm)	ORP (mV)	Dissolved Oxygen (mg/L)	Turbidity (NTUs)
		This Period	Cumulative								
1/21/09	1514	3.0	3.0	18.60	6.52	22.8	44,400	48,910	-14	NM	Med
	1522	3.0	6.0	NM	6.56	21.9	43,220	47,500	+3	NM	"
	1525	3.0	9.0	NM	6.53	21.6	44,300	48,970	-10	NM	Low
	1535	2.0	11.0	NM	6.51	21.5	44,100	48,790	-7	NM	Low

Form Date: 01/24/07

Initial CM Date 1/21/09

Page 1 of 1

GROUNDWATER SAMPLING FORM

TRC

Sample Location	W-MW-13
Client	*Railroad Commission of Texas*
Site	*Wendkirk Oil Field, Coke County, Texas*

Depth to Water (ft)	Before Sampling	17.33	Sample Collection Time	930
	After Sampling	NM	Purge Method	BAILER
Total Depth (ft)		24.90	Sample Method	BAILER
Standing Water Column (ft)		7.63	Water Description	Blackish Gray to reddish Brown, Cloudy,
One Purge Volume (gal)		1.25	Sampling Personnel	BC, CM

Date	Time	Purge Volume (gal)		Depth to Water (ft)	pH (SU)	Temp (C)	Conductivity (u-siemens/cm)	TDS (ppm)	ORP (mV)	Dissolved Oxygen (mg/L)	Turbidity (NTUs)
		This Period	Cumulative								
1/20/09	922	1.25	1.25	17.33	6.79	19.5	17,430	17,370	+17		HIGH
	925	1.50	2.75	NM	6.81	20.7	17,120	16,980	+12		
	928	1.25	4.00	NM	6.87	19.6	17,030	16,890	+18		
	929	0.75	4.75	NM	6.90	20.1	16,830	16,640	+14		

Form Date: 01/24/07

Initial CM Date 1/20/2009

GROUNDWATER SAMPLING FORM

TRC

Sample Location	W-MW-14
Client	*Railroad Commission of Texas*
Site	*Wendkirk Oil Field, Coke County, Texas*

Depth to Water (ft)	Before Sampling	24.98	Sample Collection Time	1211
	After Sampling	79.11	Purge Method	BAILER
Total Depth (ft)		80.60	Sample Method	BAILER
Standing Water Column (ft)		55.62	Water Description	CLEAR, COLORLESS, NO ODOR, NO SHEEN
One Purge Volume (gal)		9.0 GAL	Sampling Personnel	BC, CM

Date	Time	Purge Volume (gal)		Depth to Water (ft)	pH (SU)	Temp (C)	Conductivity (u-siemens/cm)	TDS (ppm)	ORP (mV)	Dissolved Oxygen (mg/L)	Turbidity (NTUs)
		This Period	Cumulative								
1/20/2009	1150	9.0	9.0	24.98	6.89	19.9	22,140	23,020	+156		LOW
↓	1205	5.0	14.0	DRY	6.91	20.0	23,560	24,730	+4		↓
↓	1211	0.25	14.25	Collect SAMPLE							
				↳ 79.11							

Form Date: 01/24/07

Initial CM Date 1/20/2009

GROUNDWATER SAMPLING FORM

TRC	Sample Location	W-MW-15
	Client	*Railroad Commission of Texas*
	Site	*Wendkirk Oil Field, Coke County, Texas*

Depth to Water (ft)	Before Sampling	25.36	Sample Collection Time	1250
	After Sampling	25.53	Purge Method	BAILER
Total Depth (ft)		40.7	Sample Method	BAILER
Standing Water Column (ft)		15.34	Water Description	BROWN, CLOUDY, NO ODOR, NO SHEEN
One Purge Volume (gal)		2.75	Sampling Personnel	C. MANSURI

Date	Time	Purge Volume (gal)		Depth to Water (ft)	pH (SU)	Temp (C)	Conductivity (u-siemens/cm)	TDS (ppm)	ORP (mV)	Dissolved Oxygen (mg/L)	Turbidity (NTUs)
		This Period	Cumulative								
1/21/09	1230	2.0	2.0	25.36	6.86	22.1	13,400	12,200	-18		HIGH
	1240	2.0	4.0	NM	6.73	21.8	13,180	11,920	-35		
	1245	2.0	6.0	NM	6.84	21.4	12,670	11310	-70		
	1250	1.0	7.0	25.53	6.81	21.7	12,990	11610	-65		

Form Date: 01/24/07

Initial CM Date 1/21/09

GROUNDWATER SAMPLING FORM

TRC

Sample Location	W-MW-16
Client	*Railroad Commission of Texas*
Site	*Wendkirk Oil Field, Coke County, Texas*

Depth to Water (ft)	Before Sampling	15.80	Sample Collection Time	1527
	After Sampling	36.71	Purge Method	BAILER
Total Depth (ft)		35.1	Sample Method	BAILER
Standing Water Column (ft)		19.70	Water Description	FAINT TAN, CLEAR, NO ODOR, NO SHEEN
One Purge Volume (gal)		3.0 GAL	Sampling Personnel	B. CLARK C. MANSURI

Date	Time	Purge Volume (gal) This Period	Purge Volume (gal) Cumulative	Depth to Water (ft)	pH (SU)	Temp (C)	Conductivity (u-siemens/cm)	TDS (ppm)	ORP (mV)	Dissolved Oxygen (mg/L)	Turbidity (NTUs)
1/20/09	1512	3.0	3.0	15.80	7.34	21.5	3,188	2,585	+ 121		MED.
	1515	3.0	6.0	NM	7.30	22.2	3,344	2722	+ 124		MED.
	1518	3.0	9.0	NM	7.20	22.2	4076	3370	+ 125		HIGH
	1520	1.0	10.0	NM	7.22	22.3	4169	3465	+ 124		"
	1522	1.0	11.0	NM	7.13	22.1	4654	3909	- 46		"
	1523	0.25	0.25	35.7 (DRIED)	—	—	—	—	—		—
	1527	— SAMPLED —									

Form Date: 01/24/07

Initial CM Date 1/20/09

GROUNDWATER SAMPLING FORM

TRC	Sample Location	W - MW-17
	Client	*Railroad Commission of Texas*
	Site	*Wendkirk Oil Field, Coke County, Texas*

Depth to Water (ft)	Before Sampling	66.06	Sample Collection Time	1322
	After Sampling	67.59	Purge Method	BAILER
Total Depth (ft)		73.00	Sample Method	BAILER
Standing Water Column (ft)		7.0	Water Description	Reddish Brown, No Odor, No Sheen
One Purge Volume (gal)		1.0	Sampling Personnel	B. CLARK C. MANSUTI

Date	Time	Purge Volume (gal)		Depth to Water (ft)	pH (SU)	Temp (C)	Conductivity (u-siemens/cm)	TDS (ppm)	ORP (mV)	Dissolved Oxygen (mg/L)	Turbidity (NTUs)
		This Period	Cumulative								
1/21/09	1757	1.0	1.0	66.06	6.91	21.6	13,850	12,620	-65		HIGH
	1803	1.0	2.0	72.80	6.85	20.9	14,190	12,990	-55		"
↓ *	1805	WELL DRIED - INSUFFICIENT AMT - FOR SAMPLING									Mod
1/22/09	1322	- GRAB - SAMPLE -		67.59	7.30	21.7	12,970	11,590	+162		LOW

Form Date: 01/24/07

Initial CM Date 1/22/09

Page 1 of 1

GROUNDWATER SAMPLING FORM

TRC	Sample Location	W-MW-18
	Client	*Railroad Commission of Texas*
	Site	*Wendkirk Oil Field, Coke County, Texas*

Depth to Water (ft)	Before Sampling	~~[illegible]~~ 20.12	Sample Collection Time	1410
	After Sampling	60.21 ~~[illegible]~~	Purge Method	Disp. Bailer
Total Depth (ft)		70.2	Sample Method	"
Standing Water Column (ft)		50.	Water Description	silty red
One Purge Volume (gal)		8.5 GAL	Sampling Personnel	BC

Date	Time	Purge Volume (gal) This Period	Purge Volume (gal) Cumulative	~~Depth to Water (ft)~~	pH (SU)	Temp (C)	Conductivity (u-siemens/cm) m	TDS (ppm) t	ORP (mV) BC	~~Dissolved Oxygen (mg/L)~~	~~Turbidity (NTUs)~~ Water
1-21-09	1325 ~~1425~~ BC	9.0	9.0		6.75	21.9	64.35	82.94	0		Silty Red
↓	1341	8.0	17.0		6.77	21.4	64.33	83.03	6		↓
	1401	8.5	25.5		6.76	21.3	64.37	83.10	0		

Form Date: 01/24/07

Initial CM Date 1/21/09

GROUNDWATER SAMPLING FORM

TRC

Sample Location	W-MW-19
Client	*Railroad Commission of Texas*
Site	*Wendkirk Oil Field, Coke County, Texas*

Depth to Water (ft)	Before Sampling	75.22	Sample Collection Time	11:40
	After Sampling	102.00	Purge Method	DISPOSABLE BAILER
Total Depth (ft)		105.50	Sample Method	" "
Standing Water Column (ft)		30.28	Water Description	Silty Grey
One Purge Volume (gal)		5.0 GAL	Sampling Personnel	B. Clark E. Mansuri

Date	Time	Purge Volume (gal) This Period	Purge Volume (gal) Cumulative	~~Depth to Water (ft)~~	pH (SU)	Temp (C)	Conductivity (u-siemens/cm)	TDS (ppm)	ORP (mV)	~~Dissolved Oxygen (mg/L)~~	~~Turbidity (NTUs)~~
1/22/09	1028	5.0	5.0		7.16	21.2	25.63	26.49	46		Silty Grey
↓	1077	5.0	10.0		7.06	21.6	28.16	29.46	-23		↓
	1134	6.0	16.0		6.81	21.4	32.33	34.76	-25		
		*bailed dry									

Form Date: 01/24/07

Initial CM Date 1/22/09

Page 1 of 1

GROUNDWATER SAMPLING FORM

TRC

Sample Location	W-MW-20
Client	*Railroad Commission of Texas*
Site	*Wendkirk Oil Field, Coke County, Texas*

Depth to Water (ft)	Before Sampling	89.19	Sample Collection Time	1200
	After Sampling	109.71	Purge Method	Disp. Bailer
Total Depth (ft)		115.50	Sample Method	"
Standing Water Column (ft)		26.31	Water Description	Redish Brown, Cloudy, No Odor NO Sheen.
One Purge Volume (gal)		4.25	Sampling Personnel	C. Mansuri B. Clark

Date	Time	Purge Volume (gal) This Period	Purge Volume (gal) Cumulative	Depth to Water (ft)	pH (SU)	Temp (C)	Conductivity (u-siemens/cm)	TDS (ppm)	ORP (mV)	Dissolved Oxygen (mg/L)	Turbidity (NTUs)
1/22/09	1023	1.0	1.0	89.19	6.80	21.0	5110	4143	+5		
	1100	4.0	5.0	NM	6.77	20.8	5134	4169	+8		
	1120	2.0	7.0	NM	6.68	21.1	5206	4231	+0		
	1140	2.0	9.0	112.5	6.71	21.2	5155	4178	-2		
	1158	2.5	11.5	113.5	6.76	21.1	5305	4306	+22		
				DRIED							
	1200	GRAB	SAMPLE								

Form Date: 01/24/07

Initial CM Date 1/22/09

GROUNDWATER SAMPLING FORM

TRC

Sample Location	W-OW-1
Client	*Railroad Commission of Texas*
Site	*Wendkirk Oil Field, Coke County, Texas*

Depth to Water (ft)	Before Sampling	66.74	Sample Collection Time	1310
	After Sampling	80.21	Purge Method	BAILER
Total Depth (ft)		97.81	Sample Method	BAILER
Standing Water Column (ft)		31.07	Water Description	yellowish tan, clear, No odor No sheen
One Purge Volume (gal)		5.00 GAL	Sampling Personnel	B. Clark, C. MANSURI

Date	Time	Purge Volume (gal) This Period	Purge Volume (gal) Cumulative	Depth to Water (ft)	pH (SU)	Temp (C)	Conductivity (u-siemens/cm)	TDS (ppm)	ORP (mV)	Dissolved Oxygen (mg/L)	Turbidity (NTUs)
1/22/09	1235	5.0	5.0	66.74	6.42	21.3	64,710	82,890	+146		Med.
↓	1250	5.0	10.0	NM	6.48	21.7	64,400	82,580	+157		"
↓	1305	5.0	15.0	NM	6.50	21.1	64800	83700	120		"

Form Date: 01/24/07

Initial CM Date 1/22/09

ATTACHMENT 2

LABORATORY ANALYTICAL DATA REPORTS AND CHAIN OF CUSTODY FORMS

February 04, 2009

Steve Miller
TRC Environmental Corp.
505 East Huntland Drive Suite 250
Austin, Texas 78752

Order No: 0901133

TEL: (512) 329-6080
FAX: (512) 329-8750

RE: RRC Wendkirk BMP

Dear Steve Miller:

DHL Analytical received 17 sample(s) on 1/23/2009 for the analyses presented in the following report.

There were no problems with the analyses and all data met requirements of NELAC except where noted in the Case Narrative. All non-NELAC methods will be identified accordingly in the case narrative and all estimated uncertainties of test results are within method or EPA specifications.

If you have any questions regarding these tests results, please feel free to call. Thank you for using DHL Analytical.

Sincerely,

John DuPont
Lab Manager

This report was performed under the accreditation of the State of Texas Laboratory Certification Number: T104704211-08A-TX

Table of Contents

Miscellaneous Documents 3

Case Narrative 7

Sample Summary 8

Prep Dates Report 9

Analytical Dates Report 14

Sample Results 19

Analytical QC Summary Report 36

DHL ANALYTICAL

2300 Double Creek Drive • Round Rock, TX 78664
Phone (512) 388-8222 • FAX (512) 388-8229

№ 39163

CHAIN-OF-CUSTODY

CLIENT: TRC
ADDRESS: 505 E. Huntland Dr., Suite 250, AUSTIN
PHONE: 512-329-6080 FAX 512-329-8750
DATA REPORTED TO: SCMiller@trcsolutions.com, mwebre@trcsolutions.com
ADDITIONAL REPORT COPIES TO: cmansuri@trcsolutions.com

DATE: 1/22/2009 PAGE 1 OF 2
PO #: 165033.0000.0000 PH. 1 DHL WORK ORDER #: 0901133
PROJECT LOCATION OR NAME: RRC Wendkirk BMP
CLIENT PROJECT #: 165033 COLLECTOR: C. MANSURI

Authorize 5% surcharge for TRRP report? ☐ Yes ☑ No

S=SOIL W=WATER A=AIR P=PAINT SL=SLUDGE OT=OTHER

ANALYSES: BTEX ☐ MTBE ☐ TRPH 418.1 ☐ TPH 1005 ☐ TPH 1006 ☐ GASOLINE MOD 8015 ☐ DIESEL - MOD 8015 ☐ VOC 8260 ☐ SVOC 8270 ☐ PAH 8270 ☐ HOLDPAH ☐ 8081 PESTICIDES ☐ 8151 HERBICIDES ☐ 8082 PCBS ☐ TCLP - METALS (RCRA) ☐ TCLP VOC ☐ TCLP - PEST ☐ HERB ☐ Semi-VOC ☐ TOTAL METALS (RCRA) ☐ OTHER LIST ☐ LEAD - TOTAL ☐ D.W. 200.8 ☐ TCLP ☐ RCI ☐ TOX ☐ FLASHPOINT ☐ TDS ☒ TSS ☐ % MOISTURE ☐ CYANIDE ☐ pH ☐ HEXAVALENT CHROMIUM ☐ EXPLOSIVES ☐ PECHLORATE ☐ CHLORIDE ☐ ANIONS ☐ ALKALINITY ☒ ELECTRICAL CONDUCTIVITY ☒ CATIONS (Ca, Na, Mg, K) ANIONS (Chloride, Bicarb, Sulfate)

PRESERVATION: HCl, HNO_3, H_2SO_4 ☐ NaOH ☐, ICE, UNPRESERVED

☑ Field Sample I.D.	DHL Lab #	Date	Time	Matrix	Container Type	# of Containers	HCl	HNO_3	H_2SO_4 ☐ NaOH ☐	ICE	UNPRESERVED	TDS	pH	Cl	Ca	Na	Mg	K	FIELD NOTES
W-MW-6	01	1/21/09	1032	W	500, 250	3		X		X	X	X		X	X	X	X	X	
W-MW-3	02	↓	1140	W	500, 250	3		↓		↓	↓	X		X	X	X	X	X	** NOTES **
W-MW-2	03		1142	W	500, 250	3						X		X	X	X	X	X	"Alkalinity" to
W-MW-1	04		1240	W	500, 250	3						X		X	X	X	X	X	include carbonates
W-MW-15	05		1250	W	500, 250	3						X		X	X	X	X	X	and Bicarbonate.
W-MW-11	06		1340	W	500, 250	3						X		X	X	X	X	X	
W-MW-18	07		1410	W	500, 250	3						X		X	X	X	X	X	
W-MW-18-D	08		1410	W	500, 250	3						X		X	X	X	X	X	DUPLICATE
W-MW-05	09		1415	W	500, 250	3						X		X	X	X	X	X	
W-MW-10	10		1434	W	500, 250	3						X		X	X	X	X	X	*** NOTE ***
W-MW-12	11		1536	W	500, 250	3						X		X	X	X	X	X	In Accordance with
W-WW-MAYS-02	12	↓	1640	W	500, 250	3						X		X	X	X	X	X	RRC/TRC Colorado
W-MW-19	13	1/22/09	1140	W	500, 250	3						X		X	X	X	X	X	River Downstream
W-MW-20	14		1200	W	500, 250	3						X		X	X	X	X	X	QAPP
W-OW-1	15	↓	1310	W	500, 250	3		↓		↓	↓	X		X	X	X	X	X	
TOTAL																			

RELINQUISHED BY: (Signature) CHRIS MANSURI DATE/TIME 1/23/09 930 RECEIVED BY: (Signature) (TRC)
RELINQUISHED BY: (Signature) DATE/TIME 1/23/09 0930 RECEIVED BY: (Signature) 1025
RELINQUISHED BY: (Signature) DATE/TIME RECEIVED BY: (Signature)

☐ DHL DISPOSAL @ $5.00 each ☐ Return

TURN AROUND TIME
RUSH ☐ CALL FIRST
1 DAY ☐ CALL FIRST
2 DAY ☐
NORMAL ☑
OTHER ☐ ____

LABORATORY USE ONLY:
RECEIVING TEMP: 0.9 | 3.1° THERM #: 57
CUSTODY SEALS - ☐ BROKEN ☒ INTACT ☐ NOT USED
☐ CARRIER BILL # ____
☐ APC DELIVERY
☐ HAND DELIVERED

DHL ANALYTICAL

2300 Double Creek Drive • Round Rock, TX 78664
Phone (512) 388-8222 • FAX (512) 388-8229

№ 39164

CHAIN-OF-CUSTODY

CLIENT: TRC
ADDRESS: 505 E. HUNTLAND DR, #250, AUSTIN 78752
PHONE: 512-329-6080 FAX
DATA REPORTED TO:
ADDITIONAL REPORT COPIES TO:

DATE: 1/22/2009 PAGE 2 OF 2
PO #: 165033 PHASE 1 DHL WORK ORDER #: 0901133
PROJECT LOCATION OR NAME: RRC Wendkirk BMP
CLIENT PROJECT #: 165033 COLLECTOR: C. MANSURI

Authorize 5% surcharge for TRRP report? ☐ Yes ☑ No

S=SOIL W=WATER A=AIR P=PAINT SL=SLUDGE OT=OTHER

Field Sample I.D.	DHL Lab #	Date	Time	Matrix	Container Type	# of Containers	HCl	HNO_3	H_2SO_4 ☐ NaOH ☐	ICE	UNPRESERVED	BTEX ☐ MTBE ☐	TRPH 418.1 ☐ TPH 1005 ☐ TPH 1006 ☐	GASOLINE MOD 8015 ☐	DIESEL - MOD 8015 ☐	VOC 8260 ☐	SVOC 8270 ☐ PAH 8270 ☐ HOLDPAH ☐	8081 PESTICIDES ☐ 8151 HERBICIDES ☐	8082 PCBS ☐	TCLP - METALS (RCRA) ☐ TCLP VOC ☐	TCLP - PEST ☐ HERB ☐ Semi-VOC ☐	TOTAL METALS (RCRA) ☐ OTHER LIST ☐	LEAD - TOTAL ☐ D.W. 200.8 ☐ TCLP ☐	RCI ☐ TOX ☐ FLASHPOINT ☐	TDS ☐ TSS ☐ % MOISTURE ☐ CYANIDE ☐	pH ☐ HEXAVALENT CHROMIUM ☐	EXPLOSIVES ☐ PECHLORATE ☐	CHLORIDE ☐ ANIONS ☐ ALKALINITY ☐	Electrical Conductivity	Cations (Ca, Na, Mg, K)	Anions (Chloride, Bromide, Sulfate)	FIELD NOTES
W-MW-17	16	1/22/09	1322	W	500, 250	3		X		X	X														X			X	X	X	X	
W-EB-1	17	1/22/09	1335	W	500, 250	3		X		X	X														X			X	X	X	X	
																																*** Alkalinity Includes (Carbonate and Bicarbonate). ***
TOTAL																																

RELINQUISHED BY: (Signature)	DATE/TIME	RECEIVED BY: (Signature)
[signature]	1/23/09 930	[signature] (TRC)
[signature]	1/23/09 925	[signature]

☐ DHL DISPOSAL @ $5.00 each ☐ Return

TURN AROUND TIME
RUSH ☐ CALL FIRST
1 DAY ☐ CALL FIRST
2 DAY ☐
NORMAL ☑
OTHER ☐ ____

LABORATORY USE ONLY:
RECEIVING TEMP: 0.9 / 3.1° THERM #: 57
CUSTODY SEALS - ☐ BROKEN ☑ INTACT ☐ NOT USED
☐ CARRIER BILL #
☐ APC DELIVERY
☑ HAND DELIVERED

CUSTODY SEAL
Date: 11/23/09 Time:
Name:
Company:

Seal Broken By:
Date: 1/23/09

CUSTODY SEAL
Date: 11/23/09 Time:
Name:
Company:

Seal Broken By:
Date: 1/23/09

DHL Analytical

Sample Receipt Checklist

Client Name TRC Environmental Corp. Date Received: 1/23/2009

Work Order Number 0901133 Received by JB

Checklist completed by: Signature 1/23/09 Date Reviewed by JD Initials 01/23/09 Date

Carrier name: Hand Delivered

Shipping container/cooler in good condition?	Yes ☑	No ☐	Not Present ☐
Custody seals intact on shippping container/cooler?	Yes ☑	No ☐	Not Present ☐
Custody seals intact on sample bottles?	Yes ☐	No ☐	Not Present ☑
Chain of custody present?	Yes ☑	No ☐	
Chain of custody signed when relinquished and received?	Yes ☑	No ☐	
Chain of custody agrees with sample labels?	Yes ☑	No ☐	
Samples in proper container/bottle?	Yes ☑	No ☐	
Sample containers intact?	Yes ☑	No ☐	
Sufficient sample volume for indicated test?	Yes ☑	No ☐	
All samples received within holding time?	Yes ☑	No ☐	
Container/Temp Blank temperature in compliance?	Yes ☑	No ☐	3.1 °C , 0.9°
Water - VOA vials have zero headspace?	Yes ☐	No ☐	No VOA vials submitted ☑
Water - pH acceptable upon receipt?	Yes ☑	No ☐	Not Applicable ☐

Adjusted? NO Checked by

Any No response must be detailed in the comments section below.

Client contacted _____ Date contacted: _____ Person contacted _____

Contacted by: _____ Regarding: _____

Comments: _____

Corrective Action _____

CLIENT:	TRC Environmental Corp.
Project:	RRC Wendkirk BMP
Lab Order:	0901133

CASE NARRATIVE

The samples were analyzed using the methods outlined in the following references:

Method SW6020 - Trace Metals: ICP-MS - Water
Method E300 - Anions by IC method - Water
Method M2320 B - Alkalinity
Method M2510B - Specific Conductance
Method M2540C - Total Dissolved Solids

LOG IN

A total of 17 samples were received and logged-in on 1/23/2009. The samples arrived in good condition and were properly packaged.

TOTAL DISSOLVED SOLIDS

For Total Dissolved Solids Analysis, the RPD of the Sample Duplicate (0901138-09 DUP) was above the control limit. This was flagged accordingly in the enclosed QC Summary Report. This Prep Batch contained two sets of Sample Duplicates, and Sample Duplicate (0901133-10 DUP) was within the control limits. The LCS-33182 for this Prep Batch was within control limits. The reference sample selected for the Sample Duplicate (0901138-09 DUP) was not from this work order, and the Sample Duplicate (0901133-10 DUP) was from this work order. No further corrective actions were taken.

TRACE METALS ANALYSIS

For Trace Metals Analysis, the recoveries of the Matrix Spike and Matrix Spike Duplicate (0901133-10 MS/MSD) were below the control limits for Calcium, Magnesium and Sodium. These were flagged accordingly in the enclosed QC Summary Report. The LCS-33148 was within control limits for these analytes. The reference sample selected for the MS/MSD was from this work order. No further corrective actions were taken.

DHL Analytical

Date: 02/04/09

CLIENT: TRC Environmental Corp.
Project: RRC Wendkirk BMP
Lab Order: 0901133

Work Order Sample Summary

Lab Smp ID	Client Sample ID	Tag Number	Date Collected	Date Recv'd
0901133-01	W-MW-6		01/21/09 10:32 AM	01/23/09
0901133-02	W-MW-3		01/21/09 11:40 AM	01/23/09
0901133-03	W-MW-2		01/21/09 11:42 AM	01/23/09
0901133-04	W-MW-1		01/21/09 12:40 PM	01/23/09
0901133-05	W-MW-15		01/21/09 12:50 PM	01/23/09
0901133-06	W-MW-11		01/21/09 01:40 PM	01/23/09
0901133-07	W-MW-18		01/21/09 02:10 PM	01/23/09
0901133-08	W-MW18-D		01/21/09 02:10 PM	01/23/09
0901133-09	W-MW-05		01/21/09 02:15 PM	01/23/09
0901133-10	W-MW-10		01/21/09 02:34 PM	01/23/09
0901133-11	W-MW-12		01/21/09 03:36 PM	01/23/09
0901133-12	W-WW-MAYS-02		01/21/09 04:40 PM	01/23/09
0901133-13	W-MW-19		01/22/09 11:40 AM	01/23/09
0901133-14	W-MW-20		01/22/09 12:00 PM	01/23/09
0901133-15	W-OW-1		01/22/09 01:10 PM	01/23/09
0901133-16	W-MW-17		01/22/09 01:22 PM	01/23/09
0901133-17	W-EB-1		01/22/09 01:35 PM	01/23/09

CLIENT: TRC Environmental Corp.
Project: RRC Wendkirk BMP
Lab Order: 0901133

PREP DATES REPORT

Sample ID	Client Sample ID	Collection Date	Matrix	Test Number	Test Name	Prep Date	Batch ID
0901133-01A	W-MW-6	01/21/09 10:32 AM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
	W-MW-6	01/21/09 10:32 AM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
0901133-01B	W-MW-6	01/21/09 10:32 AM	Aqueous	E300	Anion Preparation	01/26/09 09:00 AM	33157
	W-MW-6	01/21/09 10:32 AM	Aqueous	E300	Anion Preparation	01/26/09 09:00 AM	33157
	W-MW-6	01/21/09 10:32 AM	Aqueous	E300	Anion Preparation	01/26/09 09:00 AM	33157
0901133-01C	W-MW-6	01/21/09 10:32 AM	Aqueous	M2320 B	Alkalinity Preparation	01/26/09 12:30 PM	33166
	W-MW-6	01/21/09 10:32 AM	Aqueous	M2510 B	Conductivity Preparation	01/26/09 03:30 PM	33168
	W-MW-6	01/21/09 10:32 AM	Aqueous	M2540C	TDS Preparation	01/27/09 09:30 AM	33182
0901133-02A	W-MW-3	01/21/09 11:40 AM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
	W-MW-3	01/21/09 11:40 AM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
0901133-02B	W-MW-3	01/21/09 11:40 AM	Aqueous	E300	Anion Preparation	01/26/09 09:00 AM	33157
	W-MW-3	01/21/09 11:40 AM	Aqueous	E300	Anion Preparation	01/26/09 09:00 AM	33157
0901133-02C	W-MW-3	01/21/09 11:40 AM	Aqueous	M2320 B	Alkalinity Preparation	01/26/09 12:30 PM	33166
	W-MW-3	01/21/09 11:40 AM	Aqueous	M2510 B	Conductivity Preparation	01/26/09 03:30 PM	33168
	W-MW-3	01/21/09 11:40 AM	Aqueous	M2540C	TDS Preparation	01/27/09 09:30 AM	33182
0901133-03A	W-MW-2	01/21/09 11:42 AM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
	W-MW-2	01/21/09 11:42 AM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
0901133-03B	W-MW-2	01/21/09 11:42 AM	Aqueous	E300	Anion Preparation	01/26/09 09:00 AM	33157
	W-MW-2	01/21/09 11:42 AM	Aqueous	E300	Anion Preparation	01/26/09 09:00 AM	33157
	W-MW-2	01/21/09 11:42 AM	Aqueous	E300	Anion Preparation	01/26/09 09:00 AM	33157
0901133-03C	W-MW-2	01/21/09 11:42 AM	Aqueous	M2320 B	Alkalinity Preparation	01/26/09 12:30 PM	33166
	W-MW-2	01/21/09 11:42 AM	Aqueous	M2510 B	Conductivity Preparation	01/26/09 03:30 PM	33168
	W-MW-2	01/21/09 11:42 AM	Aqueous	M2540C	TDS Preparation	01/27/09 09:30 AM	33182
0901133-04A	W-MW-1	01/21/09 12:40 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
	W-MW-1	01/21/09 12:40 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
0901133-04B	W-MW-1	01/21/09 12:40 PM	Aqueous	E300	Anion Preparation	01/26/09 09:00 AM	33157
	W-MW-1	01/21/09 12:40 PM	Aqueous	E300	Anion Preparation	01/26/09 09:00 AM	33157
	W-MW-1	01/21/09 12:40 PM	Aqueous	E300	Anion Preparation	01/26/09 09:00 AM	33157
0901133-04C	W-MW-1	01/21/09 12:40 PM	Aqueous	M2320 B	Alkalinity Preparation	01/26/09 12:30 PM	33166

CLIENT: TRC Environmental Corp.
Project: RRC Wendkirk BMP
Lab Order: 0901133

PREP DATES REPORT

Sample ID	Client Sample ID	Collection Date	Matrix	Test Number	Test Name	Prep Date	Batch ID
	W-MW-1	01/21/09 12:40 PM	Aqueous	M2510 B	Conductivity Preparation	01/26/09 03:30 PM	33168
	W-MW-1	01/21/09 12:40 PM	Aqueous	M2540C	TDS Preparation	01/27/09 09:30 AM	33182
0901133-05A	W-MW-15	01/21/09 12:50 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
	W-MW-15	01/21/09 12:50 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
0901133-05B	W-MW-15	01/21/09 12:50 PM	Aqueous	E300	Anion Preparation	01/26/09 09:00 AM	33157
	W-MW-15	01/21/09 12:50 PM	Aqueous	E300	Anion Preparation	01/26/09 09:00 AM	33157
0901133-05C	W-MW-15	01/21/09 12:50 PM	Aqueous	M2320 B	Alkalinity Preparation	01/26/09 12:30 PM	33166
	W-MW-15	01/21/09 12:50 PM	Aqueous	M2510 B	Conductivity Preparation	01/26/09 03:30 PM	33168
	W-MW-15	01/21/09 12:50 PM	Aqueous	M2540C	TDS Preparation	01/27/09 09:30 AM	33182
0901133-06A	W-MW-11	01/21/09 01:40 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
	W-MW-11	01/21/09 01:40 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
0901133-06B	W-MW-11	01/21/09 01:40 PM	Aqueous	E300	Anion Preparation	01/26/09 09:00 AM	33157
	W-MW-11	01/21/09 01:40 PM	Aqueous	E300	Anion Preparation	01/26/09 09:00 AM	33157
	W-MW-11	01/21/09 01:40 PM	Aqueous	E300	Anion Preparation	01/26/09 09:00 AM	33157
0901133-06C	W-MW-11	01/21/09 01:40 PM	Aqueous	M2320 B	Alkalinity Preparation	01/26/09 12:30 PM	33166
	W-MW-11	01/21/09 01:40 PM	Aqueous	M2510 B	Conductivity Preparation	01/26/09 03:30 PM	33168
	W-MW-11	01/21/09 01:40 PM	Aqueous	M2540C	TDS Preparation	01/27/09 09:30 AM	33182
0901133-07A	W-MW-18	01/21/09 02:10 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
	W-MW-18	01/21/09 02:10 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
0901133-07B	W-MW-18	01/21/09 02:10 PM	Aqueous	E300	Anion Preparation	01/26/09 09:00 AM	33157
	W-MW-18	01/21/09 02:10 PM	Aqueous	E300	Anion Preparation	01/26/09 09:00 AM	33157
	W-MW-18	01/21/09 02:10 PM	Aqueous	E300	Anion Preparation	01/26/09 09:00 AM	33157
0901133-07C	W-MW-18	01/21/09 02:10 PM	Aqueous	M2320 B	Alkalinity Preparation	01/26/09 12:30 PM	33166
	W-MW-18	01/21/09 02:10 PM	Aqueous	M2510 B	Conductivity Preparation	01/26/09 03:30 PM	33168
	W-MW-18	01/21/09 02:10 PM	Aqueous	M2540C	TDS Preparation	01/27/09 09:30 AM	33182
0901133-08A	W-MW18-D	01/21/09 02:10 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
	W-MW18-D	01/21/09 02:10 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
0901133-08B	W-MW18-D	01/21/09 02:10 PM	Aqueous	E300	Anion Preparation	01/26/09 09:00 AM	33157
	W-MW18-D	01/21/09 02:10 PM	Aqueous	E300	Anion Preparation	01/26/09 09:00 AM	33157

CLIENT: TRC Environmental Corp.
Project: RRC Wendkirk BMP
Lab Order: 0901133

PREP DATES REPORT

Sample ID	Client Sample ID	Collection Date	Matrix	Test Number	Test Name	Prep Date	Batch ID
	W-MW18-D	01/21/09 02:10 PM	Aqueous	E300	Anion Preparation	01/26/09 09:00 AM	33157
0901133-08C	W-MW18-D	01/21/09 02:10 PM	Aqueous	M2320 B	Alkalinity Preparation	01/26/09 12:30 PM	33166
	W-MW18-D	01/21/09 02:10 PM	Aqueous	M2510 B	Conductivity Preparation	01/26/09 03:30 PM	33168
	W-MW18-D	01/21/09 02:10 PM	Aqueous	M2540C	TDS Preparation	01/27/09 09:30 AM	33182
0901133-09A	W-MW-05	01/21/09 02:15 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
	W-MW-05	01/21/09 02:15 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
0901133-09B	W-MW-05	01/21/09 02:15 PM	Aqueous	E300	Anion Preparation	01/26/09 09:00 AM	33157
	W-MW-05	01/21/09 02:15 PM	Aqueous	E300	Anion Preparation	01/26/09 09:00 AM	33157
	W-MW-05	01/21/09 02:15 PM	Aqueous	E300	Anion Preparation	01/26/09 09:00 AM	33157
0901133-09C	W-MW-05	01/21/09 02:15 PM	Aqueous	M2320 B	Alkalinity Preparation	01/26/09 12:30 PM	33166
	W-MW-05	01/21/09 02:15 PM	Aqueous	M2510 B	Conductivity Preparation	01/26/09 03:30 PM	33168
	W-MW-05	01/21/09 02:15 PM	Aqueous	M2540C	TDS Preparation	01/27/09 09:30 AM	33182
0901133-10A	W-MW-10	01/21/09 02:34 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
	W-MW-10	01/21/09 02:34 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
0901133-10B	W-MW-10	01/21/09 02:34 PM	Aqueous	E300	Anion Preparation	01/26/09 09:00 AM	33157
	W-MW-10	01/21/09 02:34 PM	Aqueous	E300	Anion Preparation	01/26/09 09:00 AM	33157
	W-MW-10	01/21/09 02:34 PM	Aqueous	E300	Anion Preparation	01/26/09 09:00 AM	33157
0901133-10C	W-MW-10	01/21/09 02:34 PM	Aqueous	M2320 B	Alkalinity Preparation	01/26/09 12:30 PM	33166
	W-MW-10	01/21/09 02:34 PM	Aqueous	M2510 B	Conductivity Preparation	01/26/09 03:30 PM	33168
	W-MW-10	01/21/09 02:34 PM	Aqueous	M2540C	TDS Preparation	01/27/09 09:30 AM	33182
0901133-11A	W-MW-12	01/21/09 03:36 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
	W-MW-12	01/21/09 03:36 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
0901133-11B	W-MW-12	01/21/09 03:36 PM	Aqueous	E300	Anion Preparation	01/26/09 09:10 AM	33158
	W-MW-12	01/21/09 03:36 PM	Aqueous	E300	Anion Preparation	01/26/09 09:10 AM	33158
	W-MW-12	01/21/09 03:36 PM	Aqueous	E300	Anion Preparation	01/26/09 09:10 AM	33158
	W-MW-12	01/21/09 03:36 PM	Aqueous	E300	Anion Preparation	01/26/09 09:10 AM	33158
0901133-11C	W-MW-12	01/21/09 03:36 PM	Aqueous	M2320 B	Alkalinity Preparation	01/26/09 12:30 PM	33166
	W-MW-12	01/21/09 03:36 PM	Aqueous	M2510 B	Conductivity Preparation	01/26/09 03:30 PM	33168
	W-MW-12	01/21/09 03:36 PM	Aqueous	M2540C	TDS Preparation	01/27/09 09:30 AM	33182

CLIENT: TRC Environmental Corp.
Project: RRC Wendkirk BMP
Lab Order: 0901133

PREP DATES REPORT

Sample ID	Client Sample ID	Collection Date	Matrix	Test Number	Test Name	Prep Date	Batch ID
0901133-12A	W-WW-MAYS-02	01/21/09 04:40 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
	W-WW-MAYS-02	01/21/09 04:40 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
	W-WW-MAYS-02	01/21/09 04:40 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
0901133-12B	W-WW-MAYS-02	01/21/09 04:40 PM	Aqueous	E300	Anion Preparation	01/26/09 09:10 AM	33158
	W-WW-MAYS-02	01/21/09 04:40 PM	Aqueous	E300	Anion Preparation	01/26/09 09:10 AM	33158
	W-WW-MAYS-02	01/21/09 04:40 PM	Aqueous	E300	Anion Preparation	01/26/09 09:10 AM	33158
	W-WW-MAYS-02	01/21/09 04:40 PM	Aqueous	E300	Anion Preparation	01/26/09 09:10 AM	33158
0901133-12C	W-WW-MAYS-02	01/21/09 04:40 PM	Aqueous	M2320 B	Alkalinity Preparation	01/26/09 12:30 PM	33166
	W-WW-MAYS-02	01/21/09 04:40 PM	Aqueous	M2510 B	Conductivity Preparation	01/26/09 03:30 PM	33168
	W-WW-MAYS-02	01/21/09 04:40 PM	Aqueous	M2540C	TDS Preparation	01/27/09 09:30 AM	33182
0901133-13A	W-MW-19	01/22/09 11:40 AM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
	W-MW-19	01/22/09 11:40 AM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
0901133-13B	W-MW-19	01/22/09 11:40 AM	Aqueous	E300	Anion Preparation	01/26/09 09:10 AM	33158
	W-MW-19	01/22/09 11:40 AM	Aqueous	E300	Anion Preparation	01/26/09 09:10 AM	33158
	W-MW-19	01/22/09 11:40 AM	Aqueous	E300	Anion Preparation	01/26/09 09:10 AM	33158
	W-MW-19	01/22/09 11:40 AM	Aqueous	E300	Anion Preparation	01/26/09 09:10 AM	33158
0901133-13C	W-MW-19	01/22/09 11:40 AM	Aqueous	M2320 B	Alkalinity Preparation	01/26/09 12:30 PM	33166
	W-MW-19	01/22/09 11:40 AM	Aqueous	M2510 B	Conductivity Preparation	01/26/09 03:30 PM	33168
	W-MW-19	01/22/09 11:40 AM	Aqueous	M2540C	TDS Preparation	01/29/09 08:48 AM	33204
0901133-14A	W-MW-20	01/22/09 12:00 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
	W-MW-20	01/22/09 12:00 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
0901133-14B	W-MW-20	01/22/09 12:00 PM	Aqueous	E300	Anion Preparation	01/26/09 09:10 AM	33158
	W-MW-20	01/22/09 12:00 PM	Aqueous	E300	Anion Preparation	01/26/09 09:10 AM	33158
0901133-14C	W-MW-20	01/22/09 12:00 PM	Aqueous	M2320 B	Alkalinity Preparation	01/26/09 12:30 PM	33166
	W-MW-20	01/22/09 12:00 PM	Aqueous	M2510 B	Conductivity Preparation	01/26/09 03:30 PM	33168
	W-MW-20	01/22/09 12:00 PM	Aqueous	M2540C	TDS Preparation	01/29/09 08:48 AM	33204
0901133-15A	W-OW-1	01/22/09 01:10 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
	W-OW-1	01/22/09 01:10 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
	W-OW-1	01/22/09 01:10 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148

CLIENT: TRC Environmental Corp.
Project: RRC Wendkirk BMP
Lab Order: 0901133

PREP DATES REPORT

Sample ID	Client Sample ID	Collection Date	Matrix	Test Number	Test Name	Prep Date	Batch ID
0901133-15B	W-OW-1	01/22/09 01:10 PM	Aqueous	E300	Anion Preparation	01/26/09 09:10 AM	33158
	W-OW-1	01/22/09 01:10 PM	Aqueous	E300	Anion Preparation	01/26/09 09:10 AM	33158
	W-OW-1	01/22/09 01:10 PM	Aqueous	E300	Anion Preparation	01/26/09 09:10 AM	33158
0901133-15C	W-OW-1	01/22/09 01:10 PM	Aqueous	M2320 B	Alkalinity Preparation	01/26/09 12:30 PM	33166
	W-OW-1	01/22/09 01:10 PM	Aqueous	M2510 B	Conductivity Preparation	01/26/09 03:30 PM	33168
	W-OW-1	01/22/09 01:10 PM	Aqueous	M2540C	TDS Preparation	01/29/09 08:48 AM	33204
0901133-16A	W-MW-17	01/22/09 01:22 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
	W-MW-17	01/22/09 01:22 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
0901133-16B	W-MW-17	01/22/09 01:22 PM	Aqueous	E300	Anion Preparation	01/26/09 09:10 AM	33158
	W-MW-17	01/22/09 01:22 PM	Aqueous	E300	Anion Preparation	01/26/09 09:10 AM	33158
0901133-16C	W-MW-17	01/22/09 01:22 PM	Aqueous	M2320 B	Alkalinity Preparation	01/26/09 12:30 PM	33166
	W-MW-17	01/22/09 01:22 PM	Aqueous	M2510 B	Conductivity Preparation	01/26/09 03:30 PM	33168
	W-MW-17	01/22/09 01:22 PM	Aqueous	M2540C	TDS Preparation	01/29/09 08:48 AM	33204
0901133-17A	W-EB-1	01/22/09 01:35 PM	Equip Blank	SW3005A	Aq Prep Metals : ICP-MS	01/26/09 08:49 AM	33148
0901133-17B	W-EB-1	01/22/09 01:35 PM	Equip Blank	E300	Anion Preparation	01/26/09 09:10 AM	33158
0901133-17C	W-EB-1	01/22/09 01:35 PM	Equip Blank	M2320 B	Alkalinity Preparation	01/26/09 12:30 PM	33166
	W-EB-1	01/22/09 01:35 PM	Equip Blank	M2510 B	Conductivity Preparation	01/26/09 03:30 PM	33168
	W-EB-1	01/22/09 01:35 PM	Equip Blank	M2540C	TDS Preparation	01/29/09 08:48 AM	33204

CLIENT: TRC Environmental Corp.
Project: RRC Wendkirk BMP
Lab Order: 0901133

ANALYTICAL DATES REPORT

Sample ID	Client Sample ID	Matrix	Test Number	Test Name	Batch ID	Dilution	Analysis Date	Run ID
0901133-01A	W-MW-6	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	500	01/30/09 06:25 PM	ICP-MS3_090130A
	W-MW-6	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	50	02/02/09 02:48 PM	ICP-MS3_090202B
0901133-01B	W-MW-6	Aqueous	E300	Anions by IC method - Water	33157	100	01/26/09 10:07 AM	IC2_090126A
	W-MW-6	Aqueous	E300	Anions by IC method - Water	33157	1000	01/26/09 01:21 PM	IC2_090126A
	W-MW-6	Aqueous	E300	Anions by IC method - Water	33157	1	01/26/09 03:35 PM	IC2_090126A
0901133-01C	W-MW-6	Aqueous	M2320 B	Alkalinity	33166	1	01/26/09 01:47 PM	TITRATOR_090126A
	W-MW-6	Aqueous	M2510 B	Specific Conductance	33168	1	01/26/09 03:30 AM	WC_090126A
	W-MW-6	Aqueous	M2540C	Total Dissolved Solids	33182	1	01/27/09 09:30 AM	WC_090127A
0901133-02A	W-MW-3	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	500	01/30/09 07:01 PM	ICP-MS3_090130A
	W-MW-3	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	50	02/02/09 02:53 PM	ICP-MS3_090202B
0901133-02B	W-MW-3	Aqueous	E300	Anions by IC method - Water	33157	100	01/26/09 10:21 AM	IC2_090126A
	W-MW-3	Aqueous	E300	Anions by IC method - Water	33157	1	01/26/09 03:49 PM	IC2_090126A
0901133-02C	W-MW-3	Aqueous	M2320 B	Alkalinity	33166	1	01/26/09 02:03 PM	TITRATOR_090126A
	W-MW-3	Aqueous	M2510 B	Specific Conductance	33168	1	01/26/09 03:30 AM	WC_090126A
	W-MW-3	Aqueous	M2540C	Total Dissolved Solids	33182	1	01/27/09 09:30 AM	WC_090127A
0901133-03A	W-MW-2	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	100	01/30/09 07:06 PM	ICP-MS3_090130A
	W-MW-2	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	10	02/02/09 02:58 PM	ICP-MS3_090202B
0901133-03B	W-MW-2	Aqueous	E300	Anions by IC method - Water	33157	100	01/26/09 10:36 AM	IC2_090126A
	W-MW-2	Aqueous	E300	Anions by IC method - Water	33157	10	01/26/09 01:35 PM	IC2_090126A
	W-MW-2	Aqueous	E300	Anions by IC method - Water	33157	1	01/26/09 04:33 PM	IC2_090126A
0901133-03C	W-MW-2	Aqueous	M2320 B	Alkalinity	33166	1	01/26/09 02:09 PM	TITRATOR_090126A
	W-MW-2	Aqueous	M2510 B	Specific Conductance	33168	1	01/26/09 03:30 AM	WC_090126A
	W-MW-2	Aqueous	M2540C	Total Dissolved Solids	33182	1	01/27/09 09:30 AM	WC_090127A
0901133-04A	W-MW-1	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	1000	01/30/09 07:11 PM	ICP-MS3_090130A
	W-MW-1	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	100	02/02/09 03:03 PM	ICP-MS3_090202B
0901133-04B	W-MW-1	Aqueous	E300	Anions by IC method - Water	33157	100	01/26/09 10:51 AM	IC2_090126A
	W-MW-1	Aqueous	E300	Anions by IC method - Water	33157	1000	01/26/09 01:50 PM	IC2_090126A
	W-MW-1	Aqueous	E300	Anions by IC method - Water	33157	1	01/26/09 04:48 PM	IC2_090126A
0901133-04C	W-MW-1	Aqueous	M2320 B	Alkalinity	33166	1	01/26/09 02:21 PM	TITRATOR_090126A

CLIENT: TRC Environmental Corp.
Project: RRC Wendkirk BMP
Lab Order: 0901133

ANALYTICAL DATES REPORT

Sample ID	Client Sample ID	Matrix	Test Number	Test Name	Batch ID	Dilution	Analysis Date	Run ID
	W-MW-1	Aqueous	M2510 B	Specific Conductance	33168	2	01/26/09 03:30 AM	WC_090126A
	W-MW-1	Aqueous	M2540C	Total Dissolved Solids	33182	1	01/27/09 09:30 AM	WC_090127A
0901133-05A	W-MW-15	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	500	01/30/09 07:17 PM	ICP-MS3_090130A
	W-MW-15	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	50	02/02/09 03:30 PM	ICP-MS3_090202B
0901133-05B	W-MW-15	Aqueous	E300	Anions by IC method - Water	33157	100	01/26/09 11:05 AM	IC2_090126A
	W-MW-15	Aqueous	E300	Anions by IC method - Water	33157	1	01/26/09 05:02 PM	IC2_090126A
0901133-05C	W-MW-15	Aqueous	M2320 B	Alkalinity	33166	1	01/26/09 02:30 PM	TITRATOR_090126A
	W-MW-15	Aqueous	M2510 B	Specific Conductance	33168	1	01/26/09 03:30 AM	WC_090126A
	W-MW-15	Aqueous	M2540C	Total Dissolved Solids	33182	1	01/27/09 09:30 AM	WC_090127A
0901133-06A	W-MW-11	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	1000	01/30/09 07:22 PM	ICP-MS3_090130A
	W-MW-11	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	50	02/02/09 03:35 PM	ICP-MS3_090202B
0901133-06B	W-MW-11	Aqueous	E300	Anions by IC method - Water	33157	100	01/26/09 12:07 PM	IC2_090126A
	W-MW-11	Aqueous	E300	Anions by IC method - Water	33157	1000	01/26/09 02:05 PM	IC2_090126A
	W-MW-11	Aqueous	E300	Anions by IC method - Water	33157	1	01/26/09 05:46 PM	IC2_090126A
0901133-06C	W-MW-11	Aqueous	M2320 B	Alkalinity	33166	1	01/26/09 02:38 PM	TITRATOR_090126A
	W-MW-11	Aqueous	M2510 B	Specific Conductance	33168	2	01/26/09 03:30 AM	WC_090126A
	W-MW-11	Aqueous	M2540C	Total Dissolved Solids	33182	1	01/27/09 09:30 AM	WC_090127A
0901133-07A	W-MW-18	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	5000	01/30/09 07:27 PM	ICP-MS3_090130A
	W-MW-18	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	500	02/02/09 02:38 PM	ICP-MS3_090202B
0901133-07B	W-MW-18	Aqueous	E300	Anions by IC method - Water	33157	100	01/26/09 12:22 PM	IC2_090126A
	W-MW-18	Aqueous	E300	Anions by IC method - Water	33157	1000	01/26/09 02:19 PM	IC2_090126A
	W-MW-18	Aqueous	E300	Anions by IC method - Water	33157	10	01/27/09 10:28 AM	IC2_090127A
0901133-07C	W-MW-18	Aqueous	M2320 B	Alkalinity	33166	1	01/26/09 02:48 PM	TITRATOR_090126A
	W-MW-18	Aqueous	M2510 B	Specific Conductance	33168	5	01/26/09 03:30 AM	WC_090126A
	W-MW-18	Aqueous	M2540C	Total Dissolved Solids	33182	1	01/27/09 09:30 AM	WC_090127A
0901133-08A	W-MW18-D	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	5000	01/30/09 07:32 PM	ICP-MS3_090130A
	W-MW18-D	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	500	02/02/09 02:43 PM	ICP-MS3_090202B
0901133-08B	W-MW18-D	Aqueous	E300	Anions by IC method - Water	33157	100	01/26/09 12:37 PM	IC2_090126A
	W-MW18-D	Aqueous	E300	Anions by IC method - Water	33157	1000	01/26/09 02:51 PM	IC2_090126A

CLIENT: TRC Environmental Corp.
Project: RRC Wendkirk BMP
Lab Order: 0901133

ANALYTICAL DATES REPORT

Sample ID	Client Sample ID	Matrix	Test Number	Test Name	Batch ID	Dilution	Analysis Date	Run ID
	W-MW18-D	Aqueous	E300	Anions by IC method - Water	33157	10	01/27/09 10:43 AM	IC2_090127A
0901133-08C	W-MW18-D	Aqueous	M2320 B	Alkalinity	33166	1	01/26/09 03:03 PM	TITRATOR_090126A
	W-MW18-D	Aqueous	M2510 B	Specific Conductance	33168	5	01/26/09 03:30 AM	WC_090126A
	W-MW18-D	Aqueous	M2540C	Total Dissolved Solids	33182	1	01/27/09 09:30 AM	WC_090127A
0901133-09A	W-MW-05	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	1000	01/30/09 07:37 PM	ICP-MS3_090130A
	W-MW-05	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	100	02/02/09 03:51 PM	ICP-MS3_090202B
0901133-09B	W-MW-05	Aqueous	E300	Anions by IC method - Water	33157	100	01/26/09 12:51 PM	IC2_090126A
	W-MW-05	Aqueous	E300	Anions by IC method - Water	33157	1000	01/26/09 03:05 PM	IC2_090126A
	W-MW-05	Aqueous	E300	Anions by IC method - Water	33157	10	01/27/09 10:58 AM	IC2_090127A
0901133-09C	W-MW-05	Aqueous	M2320 B	Alkalinity	33166	1	01/26/09 03:12 PM	TITRATOR_090126A
	W-MW-05	Aqueous	M2510 B	Specific Conductance	33168	4	01/26/09 03:30 AM	WC_090126A
	W-MW-05	Aqueous	M2540C	Total Dissolved Solids	33182	1	01/27/09 09:30 AM	WC_090127A
0901133-10A	W-MW-10	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	1000	01/30/09 06:00 PM	ICP-MS3_090130A
	W-MW-10	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	100	02/02/09 03:56 PM	ICP-MS3_090202B
0901133-10B	W-MW-10	Aqueous	E300	Anions by IC method - Water	33157	100	01/26/09 01:06 PM	IC2_090126A
	W-MW-10	Aqueous	E300	Anions by IC method - Water	33157	1000	01/26/09 03:20 PM	IC2_090126A
	W-MW-10	Aqueous	E300	Anions by IC method - Water	33157	10	01/27/09 11:12 AM	IC2_090127A
0901133-10C	W-MW-10	Aqueous	M2320 B	Alkalinity	33166	1	01/26/09 03:18 PM	TITRATOR_090126A
	W-MW-10	Aqueous	M2510 B	Specific Conductance	33168	4	01/26/09 03:30 AM	WC_090126A
	W-MW-10	Aqueous	M2540C	Total Dissolved Solids	33182	1	01/27/09 09:30 AM	WC_090127A
0901133-11A	W-MW-12	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	1000	01/30/09 07:43 PM	ICP-MS3_090130A
	W-MW-12	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	100	02/02/09 04:02 PM	ICP-MS3_090202B
0901133-11B	W-MW-12	Aqueous	E300	Anions by IC method - Water	33158	100	01/26/09 10:45 AM	IC_090126A
	W-MW-12	Aqueous	E300	Anions by IC method - Water	33158	1000	01/26/09 01:08 PM	IC_090126A
	W-MW-12	Aqueous	E300	Anions by IC method - Water	33158	10	01/26/09 04:47 PM	IC_090126A
	W-MW-12	Aqueous	E300	Anions by IC method - Water	33158	1000	02/03/09 06:11 PM	IC2_090203A
0901133-11C	W-MW-12	Aqueous	M2320 B	Alkalinity	33166	1	01/26/09 03:28 PM	TITRATOR_090126A
	W-MW-12	Aqueous	M2510 B	Specific Conductance	33168	4	01/26/09 03:30 AM	WC_090126A
	W-MW-12	Aqueous	M2540C	Total Dissolved Solids	33182	1	01/27/09 09:30 AM	WC_090127A

CLIENT: TRC Environmental Corp.
Project: RRC Wendkirk BMP
Lab Order: 0901133

ANALYTICAL DATES REPORT

Sample ID	Client Sample ID	Matrix	Test Number	Test Name	Batch ID	Dilution	Analysis Date	Run ID
0901133-12A	W-WW-MAYS-02	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	1000	01/30/09 07:48 PM	ICP-MS3_090130A
	W-WW-MAYS-02	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	2000	02/02/09 02:27 PM	ICP-MS3_090202B
	W-WW-MAYS-02	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	100	02/02/09 04:07 PM	ICP-MS3_090202B
0901133-12B	W-WW-MAYS-02	Aqueous	E300	Anions by IC method - Water	33158	100	01/26/09 11:00 AM	IC_090126A
	W-WW-MAYS-02	Aqueous	E300	Anions by IC method - Water	33158	1000	01/26/09 01:23 PM	IC_090126A
	W-WW-MAYS-02	Aqueous	E300	Anions by IC method - Water	33158	10	01/26/09 05:02 PM	IC_090126A
	W-WW-MAYS-02	Aqueous	E300	Anions by IC method - Water	33158	1000	02/03/09 06:26 PM	IC2_090203A
0901133-12C	W-WW-MAYS-02	Aqueous	M2320 B	Alkalinity	33166	1	01/26/09 03:36 PM	TITRATOR_090126A
	W-WW-MAYS-02	Aqueous	M2510 B	Specific Conductance	33168	4	01/26/09 03:30 AM	WC_090126A
	W-WW-MAYS-02	Aqueous	M2540C	Total Dissolved Solids	33182	1	01/27/09 09:30 AM	WC_090127A
0901133-13A	W-MW-19	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	1000	01/30/09 08:24 PM	ICP-MS3_090130A
	W-MW-19	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	100	02/02/09 04:12 PM	ICP-MS3_090202B
0901133-13B	W-MW-19	Aqueous	E300	Anions by IC method - Water	33158	100	01/26/09 11:16 AM	IC_090126A
	W-MW-19	Aqueous	E300	Anions by IC method - Water	33158	1000	01/26/09 01:38 PM	IC_090126A
	W-MW-19	Aqueous	E300	Anions by IC method - Water	33158	10	01/26/09 05:18 PM	IC_090126A
	W-MW-19	Aqueous	E300	Anions by IC method - Water	33158	1000	02/03/09 06:41 PM	IC2_090203A
0901133-13C	W-MW-19	Aqueous	M2320 B	Alkalinity	33166	1	01/26/09 03:45 PM	TITRATOR_090126A
	W-MW-19	Aqueous	M2510 B	Specific Conductance	33168	2	01/26/09 03:30 AM	WC_090126A
	W-MW-19	Aqueous	M2540C	Total Dissolved Solids	33204	1	01/29/09 09:00 AM	WC_090129A
0901133-14A	W-MW-20	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	100	01/30/09 08:29 PM	ICP-MS3_090130A
	W-MW-20	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	10	02/02/09 04:34 PM	ICP-MS3_090202B
0901133-14B	W-MW-20	Aqueous	E300	Anions by IC method - Water	33158	100	01/26/09 11:32 AM	IC_090126A
	W-MW-20	Aqueous	E300	Anions by IC method - Water	33158	1	01/26/09 02:51 PM	IC_090126A
0901133-14C	W-MW-20	Aqueous	M2320 B	Alkalinity	33166	1	01/26/09 03:53 PM	TITRATOR_090126A
	W-MW-20	Aqueous	M2510 B	Specific Conductance	33168	1	01/26/09 03:30 AM	WC_090126A
	W-MW-20	Aqueous	M2540C	Total Dissolved Solids	33204	1	01/29/09 09:00 AM	WC_090129A
0901133-15A	W-OW-1	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	1000	01/30/09 08:34 PM	ICP-MS3_090130A
	W-OW-1	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	2000	02/02/09 02:32 PM	ICP-MS3_090202B
	W-OW-1	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	100	02/02/09 04:23 PM	ICP-MS3_090202B

CLIENT: TRC Environmental Corp.
Project: RRC Wendkirk BMP
Lab Order: 0901133

ANALYTICAL DATES REPORT

Sample ID	Client Sample ID	Matrix	Test Number	Test Name	Batch ID	Dilution	Analysis Date	Run ID
0901133-15B	W-OW-1	Aqueous	E300	Anions by IC method - Water	33158	100	01/26/09 11:47 AM	IC_090126A
	W-OW-1	Aqueous	E300	Anions by IC method - Water	33158	1000	01/26/09 01:52 PM	IC_090126A
	W-OW-1	Aqueous	E300	Anions by IC method - Water	33158	10	01/26/09 04:15 PM	IC_090126A
0901133-15C	W-OW-1	Aqueous	M2320 B	Alkalinity	33166	1	01/26/09 04:04 PM	TITRATOR_090126A
	W-OW-1	Aqueous	M2510 B	Specific Conductance	33168	5	01/26/09 03:30 AM	WC_090126A
	W-OW-1	Aqueous	M2540C	Total Dissolved Solids	33204	1	01/29/09 09:00 AM	WC_090129A
0901133-16A	W-MW-17	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	500	01/30/09 08:39 PM	ICP-MS3_090130A
	W-MW-17	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33148	100	02/02/09 04:28 PM	ICP-MS3_090202B
0901133-16B	W-MW-17	Aqueous	E300	Anions by IC method - Water	33158	100	01/26/09 12:03 PM	IC_090126A
	W-MW-17	Aqueous	E300	Anions by IC method - Water	33158	1	01/26/09 04:31 PM	IC_090126A
0901133-16C	W-MW-17	Aqueous	M2320 B	Alkalinity	33166	1	01/26/09 04:12 PM	TITRATOR_090126A
	W-MW-17	Aqueous	M2510 B	Specific Conductance	33168	1	01/26/09 03:30 AM	WC_090126A
	W-MW-17	Aqueous	M2540C	Total Dissolved Solids	33204	1	01/29/09 09:00 AM	WC_090129A
0901133-17A	W-EB-1	Equip Blank	SW6020	Trace Metals: ICP-MS - Water	33148	1	01/30/09 05:54 PM	ICP-MS3_090130A
0901133-17B	W-EB-1	Equip Blank	E300	Anions by IC method - Water	33158	1	01/26/09 10:29 AM	IC_090126A
0901133-17C	W-EB-1	Equip Blank	M2320 B	Alkalinity	33166	1	01/26/09 04:28 PM	TITRATOR_090126A
	W-EB-1	Equip Blank	M2510 B	Specific Conductance	33168	1	01/26/09 03:30 AM	WC_090126A
	W-EB-1	Equip Blank	M2540C	Total Dissolved Solids	33204	1	01/29/09 09:00 AM	WC_090129A

DHL Analytical

Date: 02/04/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-MW-6
Project:	RRC Wendkirk BMP	Lab ID:	0901133-01
Project No:	165033	Collection Date:	01/21/09 10:32 AM
Lab Order:	0901133	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		SW6020					Analyst: CZ
Calcium	415	50.0	150		mg/L	500	01/30/09 06:25 PM
Magnesium	329	50.0	150		mg/L	500	01/30/09 06:25 PM
Potassium	58.6	5.00	15.0		mg/L	50	02/02/09 02:48 PM
Sodium	3180	50.0	150		mg/L	500	01/30/09 06:25 PM
Anions by IC method - Water		E300					Analyst: JBC
Bromide	9.52	0.300	1.00		mg/L	1	01/26/09 03:35 PM
Chloride	5190	300	1000		mg/L	1000	01/26/09 01:21 PM
Sulfate	1010	100	300		mg/L	100	01/26/09 10:07 AM
Alkalinity		M2320 B					Analyst: JBC
Alkalinity, Bicarbonate (As CaCO3)	354	10.0	20.0		mg/L	1	01/26/09 01:47 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 01:47 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 01:47 PM
Alkalinity, Total (As CaCO3)	354	10.0	20.0		mg/L	1	01/26/09 01:47 PM
Specific Conductance		M2510 B					Analyst: AAD
Specific Conductance	17800	100	100		µmhos/cm	1	01/26/09 03:30 AM
Total Dissolved Solids		M2540C					Analyst: AAD
Total Dissolved Solids (Residue, Filterable)	10700	10.0	10.0		mg/L	1	01/27/09 09:30 AM

Qualifiers:				
	*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
	B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
	C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
	DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
	E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
			S	Spike Recovery outside control limits

DHL Analytical

Date: 02/04/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-MW-3
Project:	RRC Wendkirk BMP	Lab ID:	0901133-02
Project No:	165033	Collection Date:	01/21/09 11:40 AM
Lab Order:	0901133	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		SW6020					Analyst: CZ
Calcium	492	50.0	150		mg/L	500	01/30/09 07:01 PM
Magnesium	523	50.0	150		mg/L	500	01/30/09 07:01 PM
Potassium	19.2	5.00	15.0		mg/L	50	02/02/09 02:53 PM
Sodium	1040	50.0	150		mg/L	500	01/30/09 07:01 PM
Anions by IC method - Water		E300					Analyst: JBC
Bromide	3.22	0.300	1.00		mg/L	1	01/26/09 03:49 PM
Chloride	1680	30.0	100		mg/L	100	01/26/09 10:21 AM
Sulfate	2770	100	300		mg/L	100	01/26/09 10:21 AM
Alkalinity		M2320 B					Analyst: JBC
Alkalinity, Bicarbonate (As CaCO3)	428	10.0	20.0		mg/L	1	01/26/09 02:03 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 02:03 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 02:03 PM
Alkalinity, Total (As CaCO3)	428	10.0	20.0		mg/L	1	01/26/09 02:03 PM
Specific Conductance		M2510 B					Analyst: AAD
Specific Conductance	9510	100	100		µmhos/cm	1	01/26/09 03:30 AM
Total Dissolved Solids		M2540C					Analyst: AAD
Total Dissolved Solids (Residue, Filterable)	7620	10.0	10.0		mg/L	1	01/27/09 09:30 AM

Qualifiers:				
	*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
	B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
	C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
	DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
	E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
			S	Spike Recovery outside control limits

DHL Analytical

Date: 02/04/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-MW-2
Project:	RRC Wendkirk BMP	Lab ID:	0901133-03
Project No:	165033	Collection Date:	01/21/09 11:42 AM
Lab Order:	0901133	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		**SW6020**					**Analyst: CZ**
Calcium	707	10.0	30.0		mg/L	100	01/30/09 07:06 PM
Magnesium	167	10.0	30.0		mg/L	100	01/30/09 07:06 PM
Potassium	9.53	1.00	3.00		mg/L	10	02/02/09 02:58 PM
Sodium	131	10.0	30.0		mg/L	100	01/30/09 07:06 PM
Anions by IC method - Water		**E300**					**Analyst: JBC**
Bromide	0.509	0.300	1.00	J	mg/L	1	01/26/09 04:33 PM
Chloride	109	3.00	10.0		mg/L	10	01/26/09 01:35 PM
Sulfate	1630	100	300		mg/L	100	01/26/09 10:36 AM
Alkalinity		**M2320 B**					**Analyst: JBC**
Alkalinity, Bicarbonate (As CaCO3)	242	10.0	20.0		mg/L	1	01/26/09 02:09 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 02:09 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 02:09 PM
Alkalinity, Total (As CaCO3)	242	10.0	20.0		mg/L	1	01/26/09 02:09 PM
Specific Conductance		**M2510 B**					**Analyst: AAD**
Specific Conductance	3240	100	100		µmhos/cm	1	01/26/09 03:30 AM
Total Dissolved Solids		**M2540C**					**Analyst: AAD**
Total Dissolved Solids (Residue, Filterable)	3080	10.0	10.0		mg/L	1	01/27/09 09:30 AM

Qualifiers:

*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
		S	Spike Recovery outside control limits

DHL Analytical

Date: 02/04/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-MW-1
Project:	RRC Wendkirk BMP	Lab ID:	0901133-04
Project No:	165033	Collection Date:	01/21/09 12:40 PM
Lab Order:	0901133	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		SW6020					Analyst: CZ
Calcium	695	100	300		mg/L	1000	01/30/09 07:11 PM
Magnesium	703	100	300		mg/L	1000	01/30/09 07:11 PM
Potassium	66.6	10.0	30.0		mg/L	100	02/02/09 03:03 PM
Sodium	4940	100	300		mg/L	1000	01/30/09 07:11 PM
Anions by IC method - Water		E300					Analyst: JBC
Bromide	14.1	0.300	1.00		mg/L	1	01/26/09 04:48 PM
Chloride	7520	300	1000		mg/L	1000	01/26/09 01:50 PM
Sulfate	5040	100	300		mg/L	100	01/26/09 10:51 AM
Alkalinity		M2320 B					Analyst: JBC
Alkalinity, Bicarbonate (As CaCO3)	519	10.0	20.0		mg/L	1	01/26/09 02:21 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 02:21 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 02:21 PM
Alkalinity, Total (As CaCO3)	519	10.0	20.0		mg/L	1	01/26/09 02:21 PM
Specific Conductance		M2510 B					Analyst: AAD
Specific Conductance	31000	200	200		µmhos/cm	2	01/26/09 03:30 AM
Total Dissolved Solids		M2540C					Analyst: AAD
Total Dissolved Solids (Residue, Filterable)	21200	10.0	10.0		mg/L	1	01/27/09 09:30 AM

Qualifiers:				
	*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
	B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
	C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
	DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
	E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
			S	Spike Recovery outside control limits

DHL Analytical

Date: 02/04/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-MW-15
Project:	RRC Wendkirk BMP	Lab ID:	0901133-05
Project No:	165033	Collection Date:	01/21/09 12:50 PM
Lab Order:	0901133	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		SW6020					Analyst: CZ
Calcium	482	50.0	150		mg/L	500	01/30/09 07:17 PM
Magnesium	357	50.0	150		mg/L	500	01/30/09 07:17 PM
Potassium	39.7	5.00	15.0		mg/L	50	02/02/09 03:30 PM
Sodium	1970	50.0	150		mg/L	500	01/30/09 07:17 PM
Anions by IC method - Water		E300					Analyst: JBC
Bromide	6.09	0.300	1.00		mg/L	1	01/26/09 05:02 PM
Chloride	2990	30.0	100		mg/L	100	01/26/09 11:05 AM
Sulfate	2520	100	300		mg/L	100	01/26/09 11:05 AM
Alkalinity		M2320 B					Analyst: JBC
Alkalinity, Bicarbonate (As CaCO3)	402	10.0	20.0		mg/L	1	01/26/09 02:30 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 02:30 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 02:30 PM
Alkalinity, Total (As CaCO3)	402	10.0	20.0		mg/L	1	01/26/09 02:30 PM
Specific Conductance		M2510 B					Analyst: AAD
Specific Conductance	13400	100	100		µmhos/cm	1	01/26/09 03:30 AM
Total Dissolved Solids		M2540C					Analyst: AAD
Total Dissolved Solids (Residue, Filterable)	9660	10.0	10.0		mg/L	1	01/27/09 09:30 AM

Qualifiers:				
	*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
	B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
	C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
	DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
	E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
			S	Spike Recovery outside control limits

DHL Analytical

Date: 02/04/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-MW-11
Project:	RRC Wendkirk BMP	Lab ID:	0901133-06
Project No:	165033	Collection Date:	01/21/09 01:40 PM
Lab Order:	0901133	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		SW6020					Analyst: CZ
Calcium	796	100	300		mg/L	1000	01/30/09 07:22 PM
Magnesium	288	5.00	15.0		mg/L	50	02/02/09 03:35 PM
Potassium	29.7	5.00	15.0		mg/L	50	02/02/09 03:35 PM
Sodium	3920	100	300		mg/L	1000	01/30/09 07:22 PM
Anions by IC method - Water		E300					Analyst: JBC
Bromide	21.9	0.300	1.00		mg/L	1	01/26/09 05:46 PM
Chloride	7380	300	1000		mg/L	1000	01/26/09 02:05 PM
Sulfate	1150	100	300		mg/L	100	01/26/09 12:07 PM
Alkalinity		M2320 B					Analyst: JBC
Alkalinity, Bicarbonate (As CaCO3)	332	10.0	20.0		mg/L	1	01/26/09 02:38 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 02:38 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 02:38 PM
Alkalinity, Total (As CaCO3)	332	10.0	20.0		mg/L	1	01/26/09 02:38 PM
Specific Conductance		M2510 B					Analyst: AAD
Specific Conductance	25600	200	200		µmhos/cm	2	01/26/09 03:30 AM
Total Dissolved Solids		M2540C					Analyst: AAD
Total Dissolved Solids (Residue, Filterable)	15500	10.0	10.0		mg/L	1	01/27/09 09:30 AM

Qualifiers:				
	*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
	B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
	C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
	DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
	E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
			S	Spike Recovery outside control limits

DHL Analytical

Date: 02/04/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-MW-18
Project:	RRC Wendkirk BMP	Lab ID:	0901133-07
Project No:	165033	Collection Date:	01/21/09 02:10 PM
Lab Order:	0901133	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		**SW6020**					**Analyst: KW**
Calcium	1470	50.0	150		mg/L	500	02/02/09 02:38 PM
Magnesium	631	50.0	150		mg/L	500	02/02/09 02:38 PM
Potassium	187	50.0	150		mg/L	500	02/02/09 02:38 PM
Sodium	14000	500	1500		mg/L	5000	01/30/09 07:27 PM
Anions by IC method - Water		**E300**					**Analyst: JBC**
Bromide	43.9	3.00	10.0		mg/L	10	01/27/09 10:28 AM
Chloride	25700	300	1000		mg/L	1000	01/26/09 02:19 PM
Sulfate	3940	100	300		mg/L	100	01/26/09 12:22 PM
Alkalinity		**M2320 B**					**Analyst: JBC**
Alkalinity, Bicarbonate (As CaCO3)	312	10.0	20.0		mg/L	1	01/26/09 02:48 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 02:48 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 02:48 PM
Alkalinity, Total (As CaCO3)	312	10.0	20.0		mg/L	1	01/26/09 02:48 PM
Specific Conductance		**M2510 B**					**Analyst: AAD**
Specific Conductance	79900	500	500		µmhos/cm	5	01/26/09 03:30 AM
Total Dissolved Solids		**M2540C**					**Analyst: AAD**
Total Dissolved Solids (Residue, Filterable)	47500	10.0	10.0		mg/L	1	01/27/09 09:30 AM

Qualifiers:				
	*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
	B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
	C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
	DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
	E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
			S	Spike Recovery outside control limits

DHL Analytical

Date: 02/04/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-MW18-D
Project:	RRC Wendkirk BMP	Lab ID:	0901133-08
Project No:	165033	Collection Date:	01/21/09 02:10 PM
Lab Order:	0901133	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		SW6020					Analyst: KW
Calcium	1550	50.0	150		mg/L	500	02/02/09 02:43 PM
Magnesium	658	50.0	150		mg/L	500	02/02/09 02:43 PM
Potassium	193	50.0	150		mg/L	500	02/02/09 02:43 PM
Sodium	14200	500	1500		mg/L	5000	01/30/09 07:32 PM
Anions by IC method - Water		E300					Analyst: JBC
Bromide	44.0	3.00	10.0		mg/L	10	01/27/09 10:43 AM
Chloride	26500	300	1000		mg/L	1000	01/26/09 02:51 PM
Sulfate	4090	100	300		mg/L	100	01/26/09 12:37 PM
Alkalinity		M2320 B					Analyst: JBC
Alkalinity, Bicarbonate (As CaCO3)	315	10.0	20.0		mg/L	1	01/26/09 03:03 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 03:03 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 03:03 PM
Alkalinity, Total (As CaCO3)	315	10.0	20.0		mg/L	1	01/26/09 03:03 PM
Specific Conductance		M2510 B					Analyst: AAD
Specific Conductance	79100	500	500		µmhos/cm	5	01/26/09 03:30 AM
Total Dissolved Solids		M2540C					Analyst: AAD
Total Dissolved Solids (Residue, Filterable)	47700	10.0	10.0		mg/L	1	01/27/09 09:30 AM

Qualifiers:				
	*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
	B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
	C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
	DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
	E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
			S	Spike Recovery outside control limits

DHL Analytical

Date: 02/04/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-MW-05
Project:	RRC Wendkirk BMP	Lab ID:	0901133-09
Project No:	165033	Collection Date:	01/21/09 02:15 PM
Lab Order:	0901133	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		SW6020					Analyst: CZ
Calcium	905	100	300		mg/L	1000	01/30/09 07:37 PM
Magnesium	349	100	300		mg/L	1000	01/30/09 07:37 PM
Potassium	116	10.0	30.0		mg/L	100	02/02/09 03:51 PM
Sodium	7710	100	300		mg/L	1000	01/30/09 07:37 PM
Anions by IC method - Water		E300					Analyst: JBC
Bromide	25.5	3.00	10.0		mg/L	10	01/27/09 10:58 AM
Chloride	13500	300	1000		mg/L	1000	01/26/09 03:05 PM
Sulfate	2590	100	300		mg/L	100	01/26/09 12:51 PM
Alkalinity		M2320 B					Analyst: JBC
Alkalinity, Bicarbonate (As CaCO3)	328	10.0	20.0		mg/L	1	01/26/09 03:12 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 03:12 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 03:12 PM
Alkalinity, Total (As CaCO3)	328	10.0	20.0		mg/L	1	01/26/09 03:12 PM
Specific Conductance		M2510 B					Analyst: AAD
Specific Conductance	45400	400	400		µmhos/cm	4	01/26/09 03:30 AM
Total Dissolved Solids		M2540C					Analyst: AAD
Total Dissolved Solids (Residue, Filterable)	26200	10.0	10.0		mg/L	1	01/27/09 09:30 AM

Qualifiers:				
	*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
	B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
	C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
	DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
	E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
			S	Spike Recovery outside control limits

DHL Analytical

Date: 02/04/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-MW-10
Project:	RRC Wendkirk BMP	Lab ID:	0901133-10
Project No:	165033	Collection Date:	01/21/09 02:34 PM
Lab Order:	0901133	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		SW6020					Analyst: CZ
Calcium	730	100	300		mg/L	1000	01/30/09 06:00 PM
Magnesium	362	100	300		mg/L	1000	01/30/09 06:00 PM
Potassium	152	10.0	30.0		mg/L	100	02/02/09 03:56 PM
Sodium	9450	100	300		mg/L	1000	01/30/09 06:00 PM
Anions by IC method - Water		E300					Analyst: JBC
Bromide	27.4	3.00	10.0		mg/L	10	01/27/09 11:12 AM
Chloride	13900	300	1000		mg/L	1000	01/26/09 03:20 PM
Sulfate	5980	100	300		mg/L	100	01/26/09 01:06 PM
Alkalinity		M2320 B					Analyst: JBC
Alkalinity, Bicarbonate (As CaCO3)	439	10.0	20.0		mg/L	1	01/26/09 03:18 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 03:18 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 03:18 PM
Alkalinity, Total (As CaCO3)	439	10.0	20.0		mg/L	1	01/26/09 03:18 PM
Specific Conductance		M2510 B					Analyst: AAD
Specific Conductance	51200	400	400		µmhos/cm	4	01/26/09 03:30 AM
Total Dissolved Solids		M2540C					Analyst: AAD
Total Dissolved Solids (Residue, Filterable)	32300	10.0	10.0		mg/L	1	01/27/09 09:30 AM

Qualifiers:				
	*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
	B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
	C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
	DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
	E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
			S	Spike Recovery outside control limits

DHL Analytical

Date: 02/04/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-MW-12
Project:	RRC Wendkirk BMP	Lab ID:	0901133-11
Project No:	165033	Collection Date:	01/21/09 03:36 PM
Lab Order:	0901133	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		SW6020					Analyst: CZ
Calcium	963	100	300		mg/L	1000	01/30/09 07:43 PM
Magnesium	674	100	300		mg/L	1000	01/30/09 07:43 PM
Potassium	127	10.0	30.0		mg/L	100	02/02/09 04:02 PM
Sodium	8840	100	300		mg/L	1000	01/30/09 07:43 PM
Anions by IC method - Water		E300					Analyst: JBC
Bromide	26.5	3.00	10.0		mg/L	10	01/26/09 04:47 PM
Chloride	14800	300	1000		mg/L	1000	02/03/09 06:11 PM
Sulfate	4810	100	300		mg/L	100	01/26/09 10:45 AM
Alkalinity		M2320 B					Analyst: JBC
Alkalinity, Bicarbonate (As CaCO3)	383	10.0	20.0		mg/L	1	01/26/09 03:28 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 03:28 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 03:28 PM
Alkalinity, Total (As CaCO3)	383	10.0	20.0		mg/L	1	01/26/09 03:28 PM
Specific Conductance		M2510 B					Analyst: AAD
Specific Conductance	53400	400	400		µmhos/cm	4	01/26/09 03:30 AM
Total Dissolved Solids		M2540C					Analyst: AAD
Total Dissolved Solids (Residue, Filterable)	33700	10.0	10.0		mg/L	1	01/27/09 09:30 AM

Qualifiers:				
	*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
	B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
	C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
	DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
	E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
			S	Spike Recovery outside control limits

DHL Analytical

Date: 02/04/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-WW-MAYS-02
Project:	RRC Wendkirk BMP	Lab ID:	0901133-12
Project No:	165033	Collection Date:	01/21/09 04:40 PM
Lab Order:	0901133	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		SW6020					Analyst: CZ
Calcium	1160	100	300		mg/L	1000	01/30/09 07:48 PM
Magnesium	608	100	300		mg/L	1000	01/30/09 07:48 PM
Potassium	131	10.0	30.0		mg/L	100	02/02/09 04:07 PM
Sodium	10000	200	600		mg/L	2000	02/02/09 02:27 PM
Anions by IC method - Water		E300					Analyst: JBC
Bromide	85.8	3.00	10.0		mg/L	10	01/26/09 05:02 PM
Chloride	17700	300	1000		mg/L	1000	02/03/09 06:26 PM
Sulfate	3300	100	300		mg/L	100	01/26/09 11:00 AM
Alkalinity		M2320 B					Analyst: JBC
Alkalinity, Bicarbonate (As CaCO3)	270	10.0	20.0		mg/L	1	01/26/09 03:36 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 03:36 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 03:36 PM
Alkalinity, Total (As CaCO3)	270	10.0	20.0		mg/L	1	01/26/09 03:36 PM
Specific Conductance		M2510 B					Analyst: AAD
Specific Conductance	57900	400	400		µmhos/cm	4	01/26/09 03:30 AM
Total Dissolved Solids		M2540C					Analyst: AAD
Total Dissolved Solids (Residue, Filterable)	35600	10.0	10.0		mg/L	1	01/27/09 09:30 AM

Qualifiers:				
	*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
	B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
	C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
	DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
	E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
			S	Spike Recovery outside control limits

DHL Analytical

Date: 02/04/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-MW-19
Project:	RRC Wendkirk BMP	Lab ID:	0901133-13
Project No:	165033	Collection Date:	01/22/09 11:40 AM
Lab Order:	0901133	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		SW6020					Analyst: CZ
Calcium	757	100	300		mg/L	1000	01/30/09 08:24 PM
Magnesium	317	100	300		mg/L	1000	01/30/09 08:24 PM
Potassium	85.2	10.0	30.0		mg/L	100	02/02/09 04:12 PM
Sodium	5410	100	300		mg/L	1000	01/30/09 08:24 PM
Anions by IC method - Water		E300					Analyst: JBC
Bromide	38.7	3.00	10.0		mg/L	10	01/26/09 05:18 PM
Chloride	8760	300	1000		mg/L	1000	02/03/09 06:41 PM
Sulfate	3330	100	300		mg/L	100	01/26/09 11:16 AM
Alkalinity		M2320 B					Analyst: JBC
Alkalinity, Bicarbonate (As CaCO3)	349	10.0	20.0		mg/L	1	01/26/09 03:45 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 03:45 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 03:45 PM
Alkalinity, Total (As CaCO3)	349	10.0	20.0		mg/L	1	01/26/09 03:45 PM
Specific Conductance		M2510 B					Analyst: AAD
Specific Conductance	31700	200	200		µmhos/cm	2	01/26/09 03:30 AM
Total Dissolved Solids		M2540C					Analyst: AAD
Total Dissolved Solids (Residue, Filterable)	21400	10.0	10.0		mg/L	1	01/29/09 09:00 AM

Qualifiers:				
	*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
	B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
	C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
	DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
	E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
			S	Spike Recovery outside control limits

DHL Analytical

Date: 02/04/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-MW-20
Project:	RRC Wendkirk BMP	Lab ID:	0901133-14
Project No:	165033	Collection Date:	01/22/09 12:00 PM
Lab Order:	0901133	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		**SW6020**					**Analyst: CZ**
Calcium	331	10.0	30.0		mg/L	100	01/30/09 08:29 PM
Magnesium	164	10.0	30.0		mg/L	100	01/30/09 08:29 PM
Potassium	19.2	1.00	3.00		mg/L	10	02/02/09 04:34 PM
Sodium	628	10.0	30.0		mg/L	100	01/30/09 08:29 PM
Anions by IC method - Water		**E300**					**Analyst: JBC**
Bromide	2.96	0.300	1.00		mg/L	1	01/26/09 02:51 PM
Chloride	1030	30.0	100		mg/L	100	01/26/09 11:32 AM
Sulfate	1240	100	300		mg/L	100	01/26/09 11:32 AM
Alkalinity		**M2320 B**					**Analyst: JBC**
Alkalinity, Bicarbonate (As CaCO3)	358	10.0	20.0		mg/L	1	01/26/09 03:53 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 03:53 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 03:53 PM
Alkalinity, Total (As CaCO3)	358	10.0	20.0		mg/L	1	01/26/09 03:53 PM
Specific Conductance		**M2510 B**					**Analyst: AAD**
Specific Conductance	5680	100	100		µmhos/cm	1	01/26/09 03:30 AM
Total Dissolved Solids		**M2540C**					**Analyst: AAD**
Total Dissolved Solids (Residue, Filterable)	4120	10.0	10.0		mg/L	1	01/29/09 09:00 AM

Qualifiers:				
	*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
	B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
	C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
	DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
	E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
			S	Spike Recovery outside control limits

DHL Analytical

Date: 02/04/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-OW-1
Project:	RRC Wendkirk BMP	Lab ID:	0901133-15
Project No:	165033	Collection Date:	01/22/09 01:10 PM
Lab Order:	0901133	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		SW6020					Analyst: CZ
Calcium	4060	100	300		mg/L	1000	01/30/09 08:34 PM
Magnesium	1130	100	300		mg/L	1000	01/30/09 08:34 PM
Potassium	66.5	10.0	30.0		mg/L	100	02/02/09 04:23 PM
Sodium	10600	200	600		mg/L	2000	02/02/09 02:32 PM
Anions by IC method - Water		E300					Analyst: JBC
Bromide	147	3.00	10.0		mg/L	10	01/26/09 04:15 PM
Chloride	29500	300	1000		mg/L	1000	01/26/09 01:52 PM
Sulfate	1410	100	300		mg/L	100	01/26/09 11:47 AM
Alkalinity		M2320 B					Analyst: JBC
Alkalinity, Bicarbonate (As CaCO3)	303	10.0	20.0		mg/L	1	01/26/09 04:04 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 04:04 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 04:04 PM
Alkalinity, Total (As CaCO3)	303	10.0	20.0		mg/L	1	01/26/09 04:04 PM
Specific Conductance		M2510 B					Analyst: AAD
Specific Conductance	80100	500	500		µmhos/cm	5	01/26/09 03:30 AM
Total Dissolved Solids		M2540C					Analyst: AAD
Total Dissolved Solids (Residue, Filterable)	52000	10.0	10.0		mg/L	1	01/29/09 09:00 AM

Qualifiers:				
	*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
	B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
	C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
	DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
	E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
			S	Spike Recovery outside control limits

DHL Analytical

Date: 02/04/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-MW-17
Project:	RRC Wendkirk BMP	Lab ID:	0901133-16
Project No:	165033	Collection Date:	01/22/09 01:22 PM
Lab Order:	0901133	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		SW6020					Analyst: CZ
Calcium	396	50.0	150		mg/L	500	01/30/09 08:39 PM
Magnesium	195	50.0	150		mg/L	500	01/30/09 08:39 PM
Potassium	48.6	10.0	30.0		mg/L	100	02/02/09 04:28 PM
Sodium	2350	50.0	150		mg/L	500	01/30/09 08:39 PM
Anions by IC method - Water		E300					Analyst: JBC
Bromide	5.83	0.300	1.00		mg/L	1	01/26/09 04:31 PM
Chloride	3600	30.0	100		mg/L	100	01/26/09 12:03 PM
Sulfate	2350	100	300		mg/L	100	01/26/09 12:03 PM
Alkalinity		M2320 B					Analyst: JBC
Alkalinity, Bicarbonate (As CaCO3)	341	10.0	20.0		mg/L	1	01/26/09 04:12 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 04:12 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 04:12 PM
Alkalinity, Total (As CaCO3)	341	10.0	20.0		mg/L	1	01/26/09 04:12 PM
Specific Conductance		M2510 B					Analyst: AAD
Specific Conductance	14000	100	100		µmhos/cm	1	01/26/09 03:30 AM
Total Dissolved Solids		M2540C					Analyst: AAD
Total Dissolved Solids (Residue, Filterable)	9780	10.0	10.0		mg/L	1	01/29/09 09:00 AM

Qualifiers:				
	*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
	B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
	C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
	DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
	E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
			S	Spike Recovery outside control limits

DHL Analytical

Date: 02/04/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-EB-1
Project:	RRC Wendkirk BMP	Lab ID:	0901133-17
Project No:	165033	Collection Date:	01/22/09 01:35 PM
Lab Order:	0901133	Matrix:	Equip Blank

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		SW6020					Analyst: CZ
Calcium	ND	0.100	0.300		mg/L	1	01/30/09 05:54 PM
Magnesium	ND	0.100	0.300		mg/L	1	01/30/09 05:54 PM
Potassium	ND	0.100	0.300		mg/L	1	01/30/09 05:54 PM
Sodium	0.112	0.100	0.300	J	mg/L	1	01/30/09 05:54 PM
Anions by IC method - Water		E300					Analyst: JBC
Bromide	ND	0.300	1.00		mg/L	1	01/26/09 10:29 AM
Chloride	ND	0.300	1.00		mg/L	1	01/26/09 10:29 AM
Sulfate	ND	1.00	3.00		mg/L	1	01/26/09 10:29 AM
Alkalinity		M2320 B					Analyst: JBC
Alkalinity, Bicarbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 04:28 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 04:28 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 04:28 PM
Alkalinity, Total (As CaCO3)	ND	10.0	20.0		mg/L	1	01/26/09 04:28 PM
Specific Conductance		M2510 B					Analyst: AAD
Specific Conductance	ND	100	100		µmhos/cm	1	01/26/09 03:30 AM
Total Dissolved Solids		M2540C					Analyst: AAD
Total Dissolved Solids (Residue, Filterable)	19.0	10.0	10.0		mg/L	1	01/29/09 09:00 AM

Qualifiers:				
	*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
	B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
	C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
	DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
	E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
			S	Spike Recovery outside control limits

CLIENT: TRC Environmental Corp.
Work Order: 0901133
Project: RRC Wendkirk BMP

ANALYTICAL QC SUMMARY REPORT

RunID: ICP-MS3_090130A

Sample ID:	MB-33148	Batch ID:	33148		TestNo:		SW6020		Units:		mg/L
SampType:	MBLK	Run ID:	ICP-MS3_090130A		Analysis Date:		01/30/09 05:39 PM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Calcium		ND	0.300								
Magnesium		ND	0.300								
Potassium		ND	0.300								
Sodium		ND	0.300								

Sample ID:	LCS-33148	Batch ID:	33148		TestNo:		SW6020		Units:		mg/L
SampType:	LCS	Run ID:	ICP-MS3_090130A		Analysis Date:		01/30/09 05:44 PM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Calcium		4.59	0.300	5.00	0	91.8	80	120			
Magnesium		4.83	0.300	5.00	0	96.6	80	120			
Potassium		4.80	0.300	5.00	0	95.9	80	120			
Sodium		4.76	0.300	5.00	0	95.1	80	120			

Sample ID:	LCSD-33148	Batch ID:	33148		TestNo:		SW6020		Units:		mg/L
SampType:	LCSD	Run ID:	ICP-MS3_090130A		Analysis Date:		01/30/09 05:49 PM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Calcium		4.55	0.300	5.00	0	91.1	80	120	0.809	15	
Magnesium		4.88	0.300	5.00	0	97.5	80	120	0.969	15	
Potassium		4.91	0.300	5.00	0	98.1	80	120	2.25	15	
Sodium		4.84	0.300	5.00	0	96.9	80	120	1.85	15	

Sample ID:	0901133-10A SD	Batch ID:	33148		TestNo:		SW6020		Units:		mg/L
SampType:	SD	Run ID:	ICP-MS3_090130A		Analysis Date:		01/30/09 06:05 PM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Calcium		705	1500	0	730				3.50	10	
Magnesium		0	1500	0	362				0	10	
Sodium		9930	1500	0	9450				5.00	10	

Sample ID:	0901133-10A PDS	Batch ID:	33148		TestNo:		SW6020		Units:		mg/L
SampType:	PDS	Run ID:	ICP-MS3_090130A		Analysis Date:		01/30/09 06:10 PM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Calcium		5360	300	5000	730	92.7	75	125			
Magnesium		5140	300	5000	362	95.6	75	125			
Sodium		14100	300	5000	9450	93.7	75	125			

Sample ID:	0901133-10A MS	Batch ID:	33148		TestNo:		SW6020		Units:		mg/L
SampType:	MS	Run ID:	ICP-MS3_090130A		Analysis Date:		01/30/09 06:15 PM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Calcium		714	300	5.00	730	-324	80	120			S
Magnesium		357	300	5.00	362	-94.0	80	120			S
Sodium		9120	300	5.00	9450	-6520	80	120			S

Sample ID:	0901133-10A MSD	Batch ID:	33148	TestNo:	SW6020	Units:	mg/L
SampType:	MSD	Run ID:	ICP-MS3_090130A	Analysis Date:	01/30/09 06:20 PM	Prep Date:	01/26/09

Qualifiers:				
	B	Analyte detected in the associated Method Blank	R	RPD outside accepted control limits
	DF	Dilution Factor	RL	Reporting Limit
	J	Analyte detected between MDL and RL	S	Spike Recovery outside control limits
	MDL	Method Detection Limit	J	Analyte detected between SDL and RL
	ND	Not Detected at the Method Detection Limit	N	Parameter not NELAC certified

CLIENT: TRC Environmental Corp.
Work Order: 0901133
Project: RRC Wendkirk BMP

ANALYTICAL QC SUMMARY REPORT

RunID: ICP-MS3_090130A

Analyte	Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Calcium	728	300	5.00	730	-46.0	80	120	1.93	15	S
Magnesium	362	300	5.00	362	20.0	80	120	1.58	15	S
Sodium	9390	300	5.00	9450	-1080	80	120	2.94	15	S

Qualifiers:

B	Analyte detected in the associated Method Blank	R	RPD outside accepted control limits
DF	Dilution Factor	RL	Reporting Limit
J	Analyte detected between MDL and RL	S	Spike Recovery outside control limits
MDL	Method Detection Limit	J	Analyte detected between SDL and RL
ND	Not Detected at the Method Detection Limit	N	Parameter not NELAC certified

CLIENT: TRC Environmental Corp.
Work Order: 0901133
Project: RRC Wendkirk BMP

ANALYTICAL QC SUMMARY REPORT

RunID: ICP-MS3_090130A

Sample ID:	ICV1-090130	Batch ID:	R41638		TestNo:		SW6020		Units:		mg/L
SampType:	ICV	Run ID:	ICP-MS3_090130A		Analysis Date:		01/30/09 05:09 PM		Prep Date:		
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Calcium		2.50	0.300	2.50	0	99.9	90	110			
Magnesium		2.74	0.300	2.50	0	110	90	110			
Potassium		2.62	0.300	2.50	0	105	90	110			
Sodium		2.75	0.300	2.50	0	110	90	110			

Sample ID:	CCV1-090130	Batch ID:	R41638		TestNo:		SW6020		Units:		mg/L
SampType:	CCV	Run ID:	ICP-MS3_090130A		Analysis Date:		01/30/09 06:31 PM		Prep Date:		
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Calcium		4.89	0.300	5.00	0	97.8	90	110			
Magnesium		5.20	0.300	5.00	0	104	90	110			
Potassium		5.24	0.300	5.00	0	105	90	110			
Sodium		5.26	0.300	5.00	0	105	90	110			

Sample ID:	CCV2-090130	Batch ID:	R41638		TestNo:		SW6020		Units:		mg/L
SampType:	CCV	Run ID:	ICP-MS3_090130A		Analysis Date:		01/30/09 07:53 PM		Prep Date:		
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Calcium		4.90	0.300	5.00	0	97.9	90	110			
Magnesium		5.06	0.300	5.00	0	101	90	110			
Sodium		5.09	0.300	5.00	0	102	90	110			

Sample ID:	CCV3-090130	Batch ID:	R41638		TestNo:		SW6020		Units:		mg/L
SampType:	CCV	Run ID:	ICP-MS3_090130A		Analysis Date:		01/30/09 08:44 PM		Prep Date:		
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Calcium		4.86	0.300	5.00	0	97.2	90	110			
Magnesium		5.09	0.300	5.00	0	102	90	110			
Sodium		5.01	0.300	5.00	0	100	90	110			

Qualifiers:				
	B	Analyte detected in the associated Method Blank	R	RPD outside accepted control limits
	DF	Dilution Factor	RL	Reporting Limit
	J	Analyte detected between MDL and RL	S	Spike Recovery outside control limits
	MDL	Method Detection Limit	J	Analyte detected between SDL and RL
	ND	Not Detected at the Method Detection Limit	N	Parameter not NELAC certified

CLIENT: TRC Environmental Corp.
Work Order: 0901133
Project: RRC Wendkirk BMP

ANALYTICAL QC SUMMARY REPORT

RunID: ICP-MS3_090202B

Sample ID:	ICV1-090202	Batch ID:	R41661		TestNo:		SW6020		Units:		mg/L
SampType:	ICV	Run ID:	ICP-MS3_090202B		Analysis Date:		02/02/09 12:34 PM		Prep Date:		
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Calcium		2.43	0.300	2.50	0	97.0	90	110			
Magnesium		2.58	0.300	2.50	0	103	90	110			
Potassium		2.52	0.300	2.50	0	101	90	110			
Sodium		2.65	0.300	2.50	0	106	90	110			

Sample ID:	CCV2-090202	Batch ID:	R41661		TestNo:		SW6020		Units:		mg/L
SampType:	CCV	Run ID:	ICP-MS3_090202B		Analysis Date:		02/02/09 02:09 PM		Prep Date:		
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Calcium		4.74	0.300	5.00	0	94.8	90	110			
Magnesium		4.88	0.300	5.00	0	97.6	90	110			
Potassium		5.01	0.300	5.00	0	100	90	110			
Sodium		4.86	0.300	5.00	0	97.3	90	110			

Sample ID:	CCV3-090202	Batch ID:	R41661		TestNo:		SW6020		Units:		mg/L
SampType:	CCV	Run ID:	ICP-MS3_090202B		Analysis Date:		02/02/09 03:40 PM		Prep Date:		
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Calcium		4.70	0.300	5.00	0	94.1	90	110			
Magnesium		4.95	0.300	5.00	0	98.9	90	110			
Potassium		4.97	0.300	5.00	0	99.4	90	110			
Sodium		5.05	0.300	5.00	0	101	90	110			

Sample ID:	CCV4-090202	Batch ID:	R41661		TestNo:		SW6020		Units:		mg/L
SampType:	CCV	Run ID:	ICP-MS3_090202B		Analysis Date:		02/02/09 04:39 PM		Prep Date:		
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Calcium		4.68	0.300	5.00	0	93.6	90	110			
Magnesium		4.85	0.300	5.00	0	97.0	90	110			
Potassium		4.99	0.300	5.00	0	99.9	90	110			

Qualifiers:

B	Analyte detected in the associated Method Blank	R	RPD outside accepted control limits
DF	Dilution Factor	RL	Reporting Limit
J	Analyte detected between MDL and RL	S	Spike Recovery outside control limits
MDL	Method Detection Limit	J	Analyte detected between SDL and RL
ND	Not Detected at the Method Detection Limit	N	Parameter not NELAC certified

CLIENT: TRC Environmental Corp.
Work Order: 0901133
Project: RRC Wendkirk BMP

ANALYTICAL QC SUMMARY REPORT

RunID: IC_090126A

Sample ID:	LCS-33158	Batch ID:	33158		TestNo:		E300		Units:		mg/L
SampType:	LCS	Run ID:	IC_090126A		Analysis Date:		01/26/09 09:42 AM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		20.1	1.00	20.00	0	101	90	110			
Chloride		10.1	1.00	10.00	0	101	90	110			
Sulfate		30.2	3.00	30.00	0	101	90	110			

Sample ID:	LCSD-33158	Batch ID:	33158		TestNo:		E300		Units:		mg/L
SampType:	LCSD	Run ID:	IC_090126A		Analysis Date:		01/26/09 09:57 AM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		20.1	1.00	20.00	0	101	90	110	0.0756	20	
Chloride		10.1	1.00	10.00	0	101	90	110	0.0148	20	
Sulfate		30.2	3.00	30.00	0	101	90	110	0.0302	20	

Sample ID:	MB-33158	Batch ID:	33158		TestNo:		E300		Units:		mg/L
SampType:	MBLK	Run ID:	IC_090126A		Analysis Date:		01/26/09 10:13 AM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		ND	1.00	0							
Chloride		ND	1.00	0							
Sulfate		ND	3.00	0							

Sample ID:	0901133-14B MS	Batch ID:	33158		TestNo:		E300		Units:		mg/L
SampType:	MS	Run ID:	IC_090126A		Analysis Date:		01/26/09 12:36 PM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Chloride		1690	100	1000	619.3	107	90	110			
Sulfate		3750	300	3000	741.6	100	90	110			

Sample ID:	0901133-14B MSD	Batch ID:	33158		TestNo:		E300		Units:		mg/L
SampType:	MSD	Run ID:	IC_090126A		Analysis Date:		01/26/09 12:52 PM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Chloride		1650	100	1000	619.3	103	90	110	2.49	20	
Sulfate		3750	300	3000	741.6	100	90	110	0.0104	20	

Sample ID:	0901133-14B MS	Batch ID:	33158		TestNo:		E300		Units:		mg/L
SampType:	MS	Run ID:	IC_090126A		Analysis Date:		01/26/09 03:44 PM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		20.3	1.00	20.00	1.780	92.4	90	110			

Sample ID:	0901133-14B MSD	Batch ID:	33158		TestNo:		E300		Units:		mg/L
SampType:	MSD	Run ID:	IC_090126A		Analysis Date:		01/26/09 03:59 PM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		20.3	1.00	20.00	1.780	92.7	90	110	0.359	20	

Qualifiers:				
	B	Analyte detected in the associated Method Blank	R	RPD outside accepted control limits
	DF	Dilution Factor	RL	Reporting Limit
	J	Analyte detected between MDL and RL	S	Spike Recovery outside control limits
	MDL	Method Detection Limit	J	Analyte detected between SDL and RL
	ND	Not Detected at the Method Detection Limit	N	Parameter not NELAC certified

CLIENT: TRC Environmental Corp.
Work Order: 0901133
Project: RRC Wendkirk BMP

ANALYTICAL QC SUMMARY REPORT

RunID: IC_090126A

Sample ID:	ICV-090126	Batch ID:	R41546		TestNo:		E300		Units:		mg/L
SampType:	ICV	Run ID:	IC_090126A		Analysis Date:		01/26/09 09:21 AM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		51.5	1.00	50.00	0	103	90	110			
Chloride		25.9	1.00	25.00	0	103	90	110			
Sulfate		77.2	3.00	75.00	0	103	90	110			

Sample ID:	CCV1-090126	Batch ID:	R41546		TestNo:		E300		Units:		mg/L
SampType:	CCV	Run ID:	IC_090126A		Analysis Date:		01/26/09 12:19 PM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		20.0	1.00	20.00	0	100	90	110			
Chloride		10.2	1.00	10.00	0	102	90	110			
Sulfate		30.0	3.00	30.00	0	99.9	90	110			

Sample ID:	CCV2-090126	Batch ID:	R41546		TestNo:		E300		Units:		mg/L
SampType:	CCV	Run ID:	IC_090126A		Analysis Date:		01/26/09 03:22 PM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		20.5	1.00	20.00	0	102	90	110			
Chloride		10.6	1.00	10.00	0	106	90	110			
Sulfate		31.5	3.00	30.00	0	105	90	110			

Sample ID:	CCV3-090126	Batch ID:	R41546		TestNo:		E300		Units:		mg/L
SampType:	CCV	Run ID:	IC_090126A		Analysis Date:		01/26/09 06:03 PM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		20.4	1.00	20.00	0	102	90	110			
Chloride		10.5	1.00	10.00	0	105	90	110			
Sulfate		31.1	3.00	30.00	0	104	90	110			

Qualifiers:

B	Analyte detected in the associated Method Blank	R	RPD outside accepted control limits
DF	Dilution Factor	RL	Reporting Limit
J	Analyte detected between MDL and RL	S	Spike Recovery outside control limits
MDL	Method Detection Limit	J	Analyte detected between SDL and RL
ND	Not Detected at the Method Detection Limit	N	Parameter not NELAC certified

CLIENT: TRC Environmental Corp.
Work Order: 0901133
Project: RRC Wendkirk BMP

ANALYTICAL QC SUMMARY REPORT

RunID: IC2_090126A

Sample ID:	LCS-33157	Batch ID:	33157		TestNo:		E300		Units:		mg/L
SampType:	LCS	Run ID:	IC2_090126A		Analysis Date:		01/26/09 09:21 AM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		18.7	1.00	20.00	0	93.4	90	110			
Chloride		9.17	1.00	10.00	0	91.7	90	110			
Sulfate		28.3	3.00	30.00	0	94.4	90	110			

Sample ID:	LCSD-33157	Batch ID:	33157		TestNo:		E300		Units:		mg/L
SampType:	LCSD	Run ID:	IC2_090126A		Analysis Date:		01/26/09 09:35 AM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		18.7	1.00	20.00	0	93.6	90	110	0.202	20	
Chloride		9.17	1.00	10.00	0	91.7	90	110	0.0262	20	
Sulfate		28.3	3.00	30.00	0	94.2	90	110	0.263	20	

Sample ID:	MB-33157	Batch ID:	33157		TestNo:		E300		Units:		mg/L
SampType:	MBLK	Run ID:	IC2_090126A		Analysis Date:		01/26/09 09:50 AM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		ND	1.00								
Chloride		ND	1.00								
Sulfate		ND	3.00								

Sample ID:	0901133-02B MS	Batch ID:	33157		TestNo:		E300		Units:		mg/L
SampType:	MS	Run ID:	IC2_090126A		Analysis Date:		01/26/09 11:22 AM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Chloride		1990	100	1000	1008	98.4	90	110			
Sulfate		4580	300	3000	1662	97.2	90	110			

Sample ID:	0901133-02B MSD	Batch ID:	33157		TestNo:		E300		Units:		mg/L
SampType:	MSD	Run ID:	IC2_090126A		Analysis Date:		01/26/09 11:36 AM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Chloride		2010	100	1000	1008	99.8	90	110	0.656	20	
Sulfate		4580	300	3000	1662	97.2	90	110	0.0100	20	

Sample ID:	0901133-02B MS	Batch ID:	33157		TestNo:		E300		Units:		mg/L
SampType:	MS	Run ID:	IC2_090126A		Analysis Date:		01/26/09 04:04 PM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		20.5	1.00	20.00	1.920	93.0	90	110			

Sample ID:	0901133-02B MSD	Batch ID:	33157		TestNo:		E300		Units:		mg/L
SampType:	MSD	Run ID:	IC2_090126A		Analysis Date:		01/26/09 04:19 PM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		20.7	1.00	20.00	1.920	93.8	90	110	0.775	20	

Qualifiers:				
	B	Analyte detected in the associated Method Blank	R	RPD outside accepted control limits
	DF	Dilution Factor	RL	Reporting Limit
	J	Analyte detected between MDL and RL	S	Spike Recovery outside control limits
	MDL	Method Detection Limit	J	Analyte detected between SDL and RL
	ND	Not Detected at the Method Detection Limit	N	Parameter not NELAC certified

CLIENT: TRC Environmental Corp.
Work Order: 0901133
Project: RRC Wendkirk BMP

ANALYTICAL QC SUMMARY REPORT

RunID: IC2_090126A

Sample ID:	ICV-090126	Batch ID:	R41544		TestNo:		E300		Units:		mg/L
SampType:	ICV	Run ID:	IC2_090126A		Analysis Date:		01/26/09 09:04 AM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		48.5	1.00	50.00	0	97.0	90	110			
Chloride		24.1	1.00	25.00	0	96.3	90	110			
Sulfate		73.5	3.00	75.00	0	97.9	90	110			

Sample ID:	CCV1-090126	Batch ID:	R41544		TestNo:		E300		Units:		mg/L
SampType:	CCV	Run ID:	IC2_090126A		Analysis Date:		01/26/09 11:51 AM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		18.8	1.00	20.00	0	94.2	90	110			
Chloride		9.33	1.00	10.00	0	93.3	90	110			
Sulfate		28.4	3.00	30.00	0	94.5	90	110			

Sample ID:	CCV2-090126	Batch ID:	R41544		TestNo:		E300		Units:		mg/L
SampType:	CCV	Run ID:	IC2_090126A		Analysis Date:		01/26/09 02:34 PM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		18.8	1.00	20.00	0	93.8	90	110			
Chloride		9.21	1.00	10.00	0	92.1	90	110			
Sulfate		28.2	3.00	30.00	0	94.1	90	110			

Sample ID:	CCV3-090126	Batch ID:	R41544		TestNo:		E300		Units:		mg/L
SampType:	CCV	Run ID:	IC2_090126A		Analysis Date:		01/26/09 05:32 PM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		18.8	1.00	20.00	0	94.1	90	110			
Chloride		10.0	1.00	10.00	0	100	90	110			
Sulfate		31.0	3.00	30.00	0	103	90	110			

Sample ID:	CCV4-090126	Batch ID:	R41544		TestNo:		E300		Units:		mg/L
SampType:	CCV	Run ID:	IC2_090126A		Analysis Date:		01/26/09 07:14 PM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		18.8	1.00	20.00	0	94.1	90	110			

Qualifiers:				
	B	Analyte detected in the associated Method Blank	R	RPD outside accepted control limits
	DF	Dilution Factor	RL	Reporting Limit
	J	Analyte detected between MDL and RL	S	Spike Recovery outside control limits
	MDL	Method Detection Limit	J	Analyte detected between SDL and RL
	ND	Not Detected at the Method Detection Limit	N	Parameter not NELAC certified

CLIENT: TRC Environmental Corp.
Work Order: 0901133
Project: RRC Wendkirk BMP

ANALYTICAL QC SUMMARY REPORT

RunID: IC2_090127A

Sample ID:	ICV-090127	Batch ID:	R41565		TestNo:		E300		Units:		mg/L
SampType:	ICV	Run ID:	IC2_090127A		Analysis Date:		01/27/09 09:19 AM		Prep Date:		01/27/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		48.5	1.00	50.00	0	97.1	90	110			
Chloride		24.5	1.00	25.00	0	97.9	90	110			

Sample ID:	CCV1-090127	Batch ID:	R41565		TestNo:		E300		Units:		mg/L
SampType:	CCV	Run ID:	IC2_090127A		Analysis Date:		01/27/09 12:26 PM		Prep Date:		01/27/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		18.7	1.00	20.00	0	93.4	90	110			
Chloride		9.26	1.00	10.00	0	92.6	90	110			

Qualifiers:				
	B	Analyte detected in the associated Method Blank	R	RPD outside accepted control limits
	DF	Dilution Factor	RL	Reporting Limit
	J	Analyte detected between MDL and RL	S	Spike Recovery outside control limits
	MDL	Method Detection Limit	J	Analyte detected between SDL and RL
	ND	Not Detected at the Method Detection Limit	N	Parameter not NELAC certified

CLIENT: TRC Environmental Corp.
Work Order: 0901133
Project: RRC Wendkirk BMP

ANALYTICAL QC SUMMARY REPORT

RunID: IC2_090203A

Sample ID:	ICV-090203	Batch ID:	R41687		TestNo:		E300		Units:		mg/L
SampType:	ICV	Run ID:	IC2_090203A		Analysis Date:		02/03/09 09:21 AM		Prep Date:		02/03/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		50.3	1.00	50.00	0	101	90	110			
Chloride		24.9	1.00	25.00	0	99.5	90	110			
Sulfate		76.2	3.00	75.00	0	102	90	110			

Sample ID:	CCV2-090203	Batch ID:	R41687		TestNo:		E300		Units:		mg/L
SampType:	CCV	Run ID:	IC2_090203A		Analysis Date:		02/03/09 04:11 PM		Prep Date:		02/03/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		19.6	1.00	20.00	0	98.1	90	110			
Chloride		9.59	1.00	10.00	0	95.9	90	110			
Sulfate		29.5	3.00	30.00	0	98.3	90	110			

Sample ID:	CCV4-090203	Batch ID:	R41687		TestNo:		E300		Units:		mg/L
SampType:	CCV	Run ID:	IC2_090203A		Analysis Date:		02/03/09 06:55 PM		Prep Date:		02/03/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Chloride		9.60	1.00	10.00	0	96.0	90	110			

Qualifiers:				
	B	Analyte detected in the associated Method Blank	R	RPD outside accepted control limits
	DF	Dilution Factor	RL	Reporting Limit
	J	Analyte detected between MDL and RL	S	Spike Recovery outside control limits
	MDL	Method Detection Limit	J	Analyte detected between SDL and RL
	ND	Not Detected at the Method Detection Limit	N	Parameter not NELAC certified

CLIENT: TRC Environmental Corp.
Work Order: 0901133
Project: RRC Wendkirk BMP

ANALYTICAL QC SUMMARY REPORT

RunID: TITRATOR_090126A

Sample ID:	MB-33166	Batch ID:	33166		TestNo:		M2320 B		Units:		mg/L
SampType:	MBLK	Run ID:	TITRATOR_090126A		Analysis Date:		01/26/09 01:35 PM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Alkalinity, Bicarbonate (As CaCO3)		ND	20.0								
Alkalinity, Carbonate (As CaCO3)		ND	20.0								
Alkalinity, Hydroxide (As CaCO3)		ND	20.0								
Alkalinity, Total (As CaCO3)		ND	20.0								

Sample ID:	LCS-33166	Batch ID:	33166		TestNo:		M2320 B		Units:		mg/L
SampType:	LCS	Run ID:	TITRATOR_090126A		Analysis Date:		01/26/09 01:39 PM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Alkalinity, Total (As CaCO3)		54.9	20.0	50.00	0	110	74	129			

Sample ID:	0901133-01C DUP	Batch ID:	33166		TestNo:		M2320 B		Units:		mg/L
SampType:	DUP	Run ID:	TITRATOR_090126A		Analysis Date:		01/26/09 01:55 PM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Alkalinity, Bicarbonate (As CaCO3)		352	20.0	0	353.9				0.538	20	
Alkalinity, Carbonate (As CaCO3)		0	20.0	0	0				0	20	
Alkalinity, Hydroxide (As CaCO3)		0	20.0	0	0				0	20	
Alkalinity, Total (As CaCO3)		352	20.0	0	353.9				0.538	20	

Sample ID:	0901133-16C DUP	Batch ID:	33166		TestNo:		M2320 B		Units:		mg/L
SampType:	DUP	Run ID:	TITRATOR_090126A		Analysis Date:		01/26/09 04:20 PM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Alkalinity, Bicarbonate (As CaCO3)		340	20.0	0	340.6				0.118	20	
Alkalinity, Carbonate (As CaCO3)		0	20.0	0	0				0	20	
Alkalinity, Hydroxide (As CaCO3)		0	20.0	0	0				0	20	
Alkalinity, Total (As CaCO3)		340	20.0	0	340.6				0.118	20	

Qualifiers:

B	Analyte detected in the associated Method Blank	R	RPD outside accepted control limits
DF	Dilution Factor	RL	Reporting Limit
J	Analyte detected between MDL and RL	S	Spike Recovery outside control limits
MDL	Method Detection Limit	J	Analyte detected between SDL and RL
ND	Not Detected at the Method Detection Limit	N	Parameter not NELAC certified

CLIENT: TRC Environmental Corp.
Work Order: 0901133
Project: RRC Wendkirk BMP

ANALYTICAL QC SUMMARY REPORT

RunID: TITRATOR_090126A

Sample ID:	ICV-090126	Batch ID:	R41552		TestNo:		M2320 B		Units:		mg/L
SampType:	ICV	Run ID:	TITRATOR_090126A		Analysis Date:		01/26/09 01:34 PM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Alkalinity, Bicarbonate (As CaCO3)		7.20	20.0	0							
Alkalinity, Carbonate (As CaCO3)		93.6	20.0	0							
Alkalinity, Hydroxide (As CaCO3)		0	20.0	0							
Alkalinity, Total (As CaCO3)		101	20.0	100.0	0	101	98	102			

Sample ID:	CCV1-090126	Batch ID:	R41552		TestNo:		M2320 B		Units:		mg/L
SampType:	CCV	Run ID:	TITRATOR_090126A		Analysis Date:		01/26/09 02:53 PM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Alkalinity, Bicarbonate (As CaCO3)		17.0	20.0	0							
Alkalinity, Carbonate (As CaCO3)		87.8	20.0	0							
Alkalinity, Hydroxide (As CaCO3)		0	20.0	0							
Alkalinity, Total (As CaCO3)		105	20.0	100.0	0	105	90	110			

Sample ID:	CCV2-090126	Batch ID:	R41552		TestNo:		M2320 B		Units:		mg/L
SampType:	CCV	Run ID:	TITRATOR_090126A		Analysis Date:		01/26/09 04:25 PM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Alkalinity, Bicarbonate (As CaCO3)		24.6	20.0	0							
Alkalinity, Carbonate (As CaCO3)		78.1	20.0	0							
Alkalinity, Hydroxide (As CaCO3)		0	20.0	0							
Alkalinity, Total (As CaCO3)		103	20.0	100.0	0	103	90	110			

Sample ID:	CCV3-090126	Batch ID:	R41552		TestNo:		M2320 B		Units:		mg/L
SampType:	CCV	Run ID:	TITRATOR_090126A		Analysis Date:		01/26/09 04:33 PM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Alkalinity, Bicarbonate (As CaCO3)		24.7	20.0	0							
Alkalinity, Carbonate (As CaCO3)		77.9	20.0	0							
Alkalinity, Hydroxide (As CaCO3)		0	20.0	0							
Alkalinity, Total (As CaCO3)		103	20.0	100.0	0	103	90	110			

Qualifiers:				
	B	Analyte detected in the associated Method Blank	R	RPD outside accepted control limits
	DF	Dilution Factor	RL	Reporting Limit
	J	Analyte detected between MDL and RL	S	Spike Recovery outside control limits
	MDL	Method Detection Limit	J	Analyte detected between SDL and RL
	ND	Not Detected at the Method Detection Limit	N	Parameter not NELAC certified

CLIENT: TRC Environmental Corp.
Work Order: 0901133
Project: RRC Wendkirk BMP

ANALYTICAL QC SUMMARY REPORT

RunID: WC_090126A

Sample ID:	MB-33168	Batch ID:	33168		TestNo:		M2510 B		Units:		µmhos/cm
SampType:	MBLK	Run ID:	WC_090126A		Analysis Date:		01/26/09 03:30 AM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Specific Conductance		ND	100								

Sample ID:	LCS-33168	Batch ID:	33168		TestNo:		M2510 B		Units:		µmhos/cm
SampType:	LCS	Run ID:	WC_090126A		Analysis Date:		01/26/09 03:30 AM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Specific Conductance		1380	100	1413	0	97.4	95	105			

Sample ID:	0901133-01C-DUP	Batch ID:	33168		TestNo:		M2510 B		Units:		µmhos/cm
SampType:	DUP	Run ID:	WC_090126A		Analysis Date:		01/26/09 03:30 AM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Specific Conductance		17900	100	0	17850				0.336	2	

Sample ID:	0901133-11C-DUP	Batch ID:	33168		TestNo:		M2510 B		Units:		µmhos/cm
SampType:	DUP	Run ID:	WC_090126A		Analysis Date:		01/26/09 03:30 AM		Prep Date:		01/26/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Specific Conductance		54200	400	0	53440				1.41	2	

Qualifiers:				
	B	Analyte detected in the associated Method Blank	R	RPD outside accepted control limits
	DF	Dilution Factor	RL	Reporting Limit
	J	Analyte detected between MDL and RL	S	Spike Recovery outside control limits
	MDL	Method Detection Limit	J	Analyte detected between SDL and RL
	ND	Not Detected at the Method Detection Limit	N	Parameter not NELAC certified

CLIENT: TRC Environmental Corp.
Work Order: 0901133
Project: RRC Wendkirk BMP

ANALYTICAL QC SUMMARY REPORT

RunID: WC_090126A

Sample ID:	ICV-090126	Batch ID:	CONDW-01/26/09	TestNo:		M2510 B			Units:	µmhos/cm	
SampType:	ICV	Run ID:	WC_090126A	Analysis Date:		01/26/09 03:30 AM			Prep Date:	01/26/09	
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Specific Conductance		12900	10.0	12880	0	100	95	105			

Sample ID:	CCV1-090126	Batch ID:	CONDW-01/26/09	TestNo:		M2510 B			Units:	µmhos/cm	
SampType:	CCV	Run ID:	WC_090126A	Analysis Date:		01/26/09 03:30 AM			Prep Date:	01/26/09	
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Specific Conductance		12800	10.0	12880	0	99.1	95	105			

Sample ID:	CCV2-090126	Batch ID:	CONDW-01/26/09	TestNo:		M2510 B			Units:	µmhos/cm	
SampType:	CCV	Run ID:	WC_090126A	Analysis Date:		01/26/09 03:30 AM			Prep Date:	01/26/09	
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Specific Conductance		12600	10.0	12880	0	97.9	95	105			

Sample ID:	CCV3-090126	Batch ID:	CONDW-01/26/09	TestNo:		M2510 B			Units:	µmhos/cm	
SampType:	CCV	Run ID:	WC_090126A	Analysis Date:		01/26/09 03:30 AM			Prep Date:	01/26/09	
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Specific Conductance		12600	10.0	12880	0	98.1	95	105			

Sample ID:	CCV4-090126	Batch ID:	CONDW-01/26/09	TestNo:		M2510 B			Units:	µmhos/cm	
SampType:	CCV	Run ID:	WC_090126A	Analysis Date:		01/26/09 03:30 AM			Prep Date:	01/26/09	
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Specific Conductance		12400	10.0	12880	0	96.1	95	105			

Qualifiers:

B	Analyte detected in the associated Method Blank	R	RPD outside accepted control limits
DF	Dilution Factor	RL	Reporting Limit
J	Analyte detected between MDL and RL	S	Spike Recovery outside control limits
MDL	Method Detection Limit	J	Analyte detected between SDL and RL
ND	Not Detected at the Method Detection Limit	N	Parameter not NELAC certified

CLIENT: TRC Environmental Corp.
Work Order: 0901133
Project: RRC Wendkirk BMP

ANALYTICAL QC SUMMARY REPORT

RunID: WC_090127A

Sample ID:	MB-33182	Batch ID:	33182		TestNo:		M2540C		Units:		mg/L
SampType:	MBLK	Run ID:	WC_090127A		Analysis Date:		01/27/09 09:30 AM		Prep Date:		01/27/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Total Dissolved Solids (Residue, Fi		ND	10.0								

Sample ID:	LCS-33182	Batch ID:	33182		TestNo:		M2540C		Units:		mg/L
SampType:	LCS	Run ID:	WC_090127A		Analysis Date:		01/27/09 09:30 AM		Prep Date:		01/27/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Total Dissolved Solids (Residue, Fi		693	10.0	745.6	0	92.9	90	113			

Sample ID:	0901133-10C-DUP	Batch ID:	33182		TestNo:		M2540C		Units:		mg/L
SampType:	DUP	Run ID:	WC_090127A		Analysis Date:		01/27/09 09:30 AM		Prep Date:		01/27/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Total Dissolved Solids (Residue, Fi		32000	10.0	0	32320				0.933	5	

Sample ID:	0901138-09B-DUP	Batch ID:	33182		TestNo:		M2540C		Units:		mg/L
SampType:	DUP	Run ID:	WC_090127A		Analysis Date:		01/27/09 09:30 AM		Prep Date:		01/27/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Total Dissolved Solids (Residue, Fi		14400	10.0	0	15740				8.75	5	R

Qualifiers:				
	B	Analyte detected in the associated Method Blank	R	RPD outside accepted control limits
	DF	Dilution Factor	RL	Reporting Limit
	J	Analyte detected between MDL and RL	S	Spike Recovery outside control limits
	MDL	Method Detection Limit	J	Analyte detected between SDL and RL
	ND	Not Detected at the Method Detection Limit	N	Parameter not NELAC certified

CLIENT: TRC Environmental Corp.
Work Order: 0901133
Project: RRC Wendkirk BMP

ANALYTICAL QC SUMMARY REPORT

RunID: WC_090129A

Sample ID:	MB-33204	Batch ID:	33204		TestNo:		M2540C		Units:		mg/L
SampType:	MBLK	Run ID:	WC_090129A		Analysis Date:		01/29/09 09:00 AM		Prep Date:		01/29/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Total Dissolved Solids (Residue, Fi		ND	10.0								

Sample ID:	LCS-33204	Batch ID:	33204		TestNo:		M2540C		Units:		mg/L
SampType:	LCS	Run ID:	WC_090129A		Analysis Date:		01/29/09 09:00 AM		Prep Date:		01/29/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Total Dissolved Solids (Residue, Fi		788	10.0	745.6	0	106	90	113			

Sample ID:	0901133-15C-DUP	Batch ID:	33204		TestNo:		M2540C		Units:		mg/L
SampType:	DUP	Run ID:	WC_090129A		Analysis Date:		01/29/09 09:00 AM		Prep Date:		01/29/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Total Dissolved Solids (Residue, Fi		51300	10.0	0	51980				1.24	5	

Qualifiers:				
	B	Analyte detected in the associated Method Blank	R	RPD outside accepted control limits
	DF	Dilution Factor	RL	Reporting Limit
	J	Analyte detected between MDL and RL	S	Spike Recovery outside control limits
	MDL	Method Detection Limit	J	Analyte detected between SDL and RL
	ND	Not Detected at the Method Detection Limit	N	Parameter not NELAC certified

DHL ANALYTICAL

February 12, 2009

Steve Miller
TRC Environmental Corp.
505 East Huntland Drive
Austin, Texas 78752

TEL: (512) 329-6080
FAX: (512) 329-8750

RE: RRC Wendkirk BMP
Revision Number 1 for Work Order 0901115

Dear Steve Miller,

DHL Analytical received 16 samples on 1/21/2009 for the analyses presented in the following REVISED report. This revision consists of correcting the Sample Label (W-SG-4314102-D1) to (W-SG-4314102-01). Please replace the original report with this revised report.

There were no problems with the analyses and all data met requirements of NELAC except where noted in the Case Narrative. All non-NELAC methods will be identified accordingly in the case narrative and all estimated uncertainties of test results are within method or EPA specifications.

If you have any questions regarding these test results, please feel free to call. Thank you for using DHL Analytical.

Sincerely,

John Dupont
General Manager

This report was performed under the accreditation of the State of Texas Laboratory Certification Number: T104704211-08B-TX

Table of Contents

Miscellaneous Documents 3

Case Narrative 8

Sample Summary 9

Prep Dates Report 10

Analytical Dates Report 15

Sample Results 20

Analytical QC Summary Report 36

DHL ANALYTICAL

2300 Double Creek Drive • Round Rock, TX 78664
Phone (512) 388-8222 • FAX (512) 388-8229

№ 39161

CHAIN-OF-CUSTODY

CLIENT: TRC
ADDRESS: 505 E. HUNTLAND DR., SUITE 250
PHONE: (512) 684-3140 FAX (512) 329-8750
DATA REPORTED TO: SCMILLER@trcsolutions.com
ADDITIONAL REPORT COPIES TO: mwebre@trcsolutions, cmansuri@trcsolutions

DATE: 1/20/2009 PAGE 1 OF 2
PO #: 165033 - 000001 DHL WORK ORDER #: 0901115
PROJECT LOCATION OR NAME:
CLIENT PROJECT #: 165033.0000.0000 COLLECTOR: CM, BC

Authorize 5% surcharge for TRRP report? ☐ Yes ☑ No

S=SOIL W=WATER A=AIR P=PAINT SL=SLUDGE OT=OTHER

Field Sample I.D.	DHL Lab #	Date	Time	Matrix	Container Type	# of Containers	HCl	HNO_3	H_2SO_4 ☐ NaOH ☐	ICE	UNPRESERVED	BTEX ☐ MTBE ☐	TRPH 418.1 ☐ TPH 1005 ☐ TPH 1006 ☐	GASOLINE MOD 8015 ☐	DIESEL - MOD 8015 ☐	~~VOC 8260~~ Electrical Conductivity	SVOC 8270 ☐ PAH 8270 ☐ HOLDPAH ☐	8081 PESTICIDES ☐ 8151 HERBICIDES ☐	8082 PCBS ☐	TCLP - METALS (RCRA) ☐ TCLP VOC ☐	TCLP - PEST ☐ HERB ☐ Semi-VOC ☐	TOTAL METALS (RCRA) ☐ OTHER LIST ☐	LEAD - TOTAL ☐ D.W. 200.8 ☐ TCLP ☐	RCI ☐ TOX ☐ FLASHPOINT ☐	TDS ☑ TSS ☐ % MOISTURE ☐ CYANIDE ☐	pH ☐ HEXAVALENT CHROMIUM ☐	EXPLOSIVES ☐ PECHLORATE ☐	CHLORIDE ☐ ANIONS ☐ ALKALINITY ☐	ANIONS (Chloride, Sulfate, Bromide)	CATIONS (Ca, Na, Mg, K)	ALKALINITY (Carbonate, Bicarbonate)	FIELD NOTES
W-RS-14	01	1-19-09	1115	W	500 ml, 250 ml	3		X		X	X					X									X				X	X	X	
W-RS-14-D	02		1115													X									X				X	X	X	
W-RS-15	03		1150													X									X				X	X	X	
W-RS-16	04		1245													X									X				X	X	X	
W-RS-17	05		1320													X									X				X	X	X	*NOTE*
W-RS-13	06		1425													X									X				X	X	X	In accordance
W-RS-12	07		1443													X									X				X	X	X	with QAPP for
W-SG-4314102-D1	08		1704													X									X				X	X	X	RRC/TRC
W-MW-13 (CM)	09	1/20/09	930					X		X						X									X				X	X	X	Colorado River
W-MW-9	10		1022			3										X									X				X	X	X	Downstream of
W-MW-14	11		1211													X									X				X	X	X	Spence Reservoir
W-MW-8	12		1310													X									X				X	X	X	*** ***
W-MW-7	13		1348													X									X				X	X	X	
W-SP-01 (CM) ~~BALS RANGE SEEP~~	14		1444													X									X				X	X	X	→ W-SP-01
W-MW-16	15		1527													X									X				X	X	X	
TOTAL																																

RELINQUISHED BY: (Signature)	DATE/TIME	RECEIVED BY: (Signature)
[signature]	1.20.09 1817	Fed ex
Fed ex	1/21/09 9:30	[signature]

☐ DHL DISPOSAL @ $5.00 each ☐ Return

TURN AROUND TIME
RUSH ☐ CALL FIRST
1 DAY ☐ CALL FIRST
2 DAY ☐
NORMAL ☑
OTHER ☐ ____

LABORATORY USE ONLY:
RECEIVING TEMP: 2.8/1.8 THERM #: 57
CUSTODY SEALS - ☐ BROKEN ☑ INTACT ☐ NOT USED
☑ CARRIER BILL # Fed ex
☐ APC DELIVERY
☐ HAND DELIVERED

DHL ANALYTICAL

2300 Double Creek Drive • Round Rock, TX 78664
Phone (512) 388-8222 • FAX (512) 388-8229

№ 39162

CHAIN-OF-CUSTODY

CLIENT: TRC
ADDRESS: 505 E. HUNTLAND DR., SUITE 250, AUSTIN 78752
PHONE: (512) 329-6050 FAX
DATA REPORTED TO:
ADDITIONAL REPORT COPIES TO:

DATE: 1/20/2009 PAGE 2 OF 2
PO #: 165033.0000.0000 DHL WORK ORDER #: 0901115
PROJECT LOCATION OR NAME: TRC WENDKIRK BMP
CLIENT PROJECT #: COLLECTOR: C. MANSURI, B. CLARK

Authorize 5% surcharge for TRRP report? ☐ Yes ☑ No

S=SOIL W=WATER A=AIR P=PAINT SL=SLUDGE OT=OTHER

PRESERVATION: HCl, HNO_3, H_2SO_4 ☐ NaOH ☐, ICE, UNPRESERVED

ANALYSES: BTEX ☐ MTBE ☐; TRPH 418.1 ☐; TPH 1005 ☐; TPH 1006 ☐; GASOLINE MOD 8015 ☐; DIESEL - MOD 8015 ☐; VOC 8260 ☐; SVOC 8270 ☐; PAH 8270 ☐; HOLDPAH ☐; 8081 PESTICIDES ☐; 8151 HERBICIDES ☐; 8082 PCBS ☐; TCLP - PEST ☐; TCLP - METALS (RCRA) ☐; TCLP VOC ☐; TOTAL METALS (RCRA) ☐; HERB ☐; Semi-VOC ☐; LEAD - TOTAL ☐; OTHER LIST ☐; RCI ☐; TOX ☐; D.W. 200.8 ☐; TCLP ☐; TDS ☑; TSS ☐; FLASHPOINT ☐; pH ☐; % MOISTURE ☐; CYANIDE ☐; HEXAVALENT CHROMIUM ☐; EXPLOSIVES ☐; PECHLORATE ☐; CHLORIDE ☐; ANIONS ☐; ALKALINITY ☑; ELECTRICAL CONDUCTIVITY; ANIONS (Cl, Br); CATIONS (Ca, Na, Mg, K)

Field Sample I.D.	DHL Lab #	Date	Time	Matrix	Container Type	# of Containers	HCl	HNO_3	H_2SO_4 ☐ NaOH ☐	ICE	UNPRESERVED	TDS ☑	Anions	Cations	FIELD NOTES
w-MW-4	16	1/20/09	1620	W	500, 350	3		X		X	X	X	X	X	
															** NOTE **
															Alkalinity includes
															Carbonate and
															Bicarbonates.
TOTAL															

RELINQUISHED BY: (Signature) DATE/TIME RECEIVED BY: (Signature)
RELINQUISHED BY: (Signature) 1.20.09 1017 DATE/TIME RECEIVED BY: (Signature) Fed-ex
RELINQUISHED BY: (Signature) Fed-ex DATE/TIME 1/21/09 9:00 RECEIVED BY: (Signature)

☐ DHL DISPOSAL @ $5.00 each ☐ Return

TURN AROUND TIME
RUSH ☐ CALL FIRST
1 DAY ☐ CALL FIRST
2 DAY ☐
NORMAL ☑
OTHER ☐

LABORATORY USE ONLY:
RECEIVING TEMP: 2.8/1.8 THERM #: 57
CUSTODY SEALS - ☐ BROKEN ☑ INTACT ☐ NOT USED
☑ CARRIER BILL # Fedex
☐ APC DELIVERY
☐ HAND DELIVERED

FedEx Express US Airbill

8660 4930 2486

0200 Form ID No.

FedEx Retrieval Copy

1 From

Date 1-20-09 Sender's FedEx Account Number 1402-46697

Sender's Name CHRIS MANSURI Phone 512 329-6080

Company TRC

Address 505 E. Huntland Dr 250 Dept./Floor/Suite/Room

City Austin State TX ZIP 78752

2 Your Internal Billing Reference 165033.01

3 To

Recipient's Name Rodeviy Phone 512 388-8222

Company DHL Analytical

Recipient's Address 2300 Double Creek Drive Dept./Floor/Suite/Room

We cannot deliver to P.O. boxes or P.O. ZIP codes.

Address

To request a package be held at a specific FedEx location, print FedEx address here.

City Round Rock State TX ZIP 78664

8660 4930 2486

4a Express Package Service — Packages up to 150 lbs.

1 [X] FedEx Priority Overnight — Next business morning.* Friday shipments will be delivered on Monday unless SATURDAY Delivery is selected.

5 [ ] FedEx Standard Overnight — Next business afternoon.* Saturday Delivery NOT available.

6 [ ] FedEx First Overnight — Earliest next business morning delivery to select locations.* Saturday Delivery NOT available.

3 [ ] FedEx 2Day — Second business day.* Thursday shipments will be delivered on Monday unless SATURDAY Delivery is selected.

20 [ ] FedEx Express Saver — Third business day.* Saturday Delivery NOT available.

FedEx Envelope rate not available. Minimum charge. One-pound rate.

* To most locations.

4b Express Freight Service — Packages over 150 lbs.

7 [ ] FedEx 1Day Freight* — Next business day.** Friday shipments will be delivered on Monday unless SATURDAY Delivery is selected.

8 [ ] FedEx 2Day Freight — Second business day.** Thursday shipments will be delivered on Monday unless SATURDAY Delivery is selected.

83 [ ] FedEx 3Day Freight — Third business day.** Saturday Delivery NOT available.

* Call for Confirmation.

** To most locations.

5 Packaging

6 [ ] FedEx Envelope* 2 [ ] FedEx Pak* — Includes FedEx Small Pak, FedEx Large Pak, and FedEx Sturdy Pak. 3 [ ] FedEx Box 4 [ ] FedEx Tube 4 [X] Other

* Declared value limit $500.

6 Special Handling — Include FedEx address in Section 3.

3 [ ] SATURDAY Delivery — Not available for FedEx Standard Overnight, FedEx First Overnight, FedEx Express Saver, or FedEx 3Day Freight.

1 [ ] HOLD Weekday at FedEx Location — Not available for FedEx First Overnight.

31 [ ] HOLD Saturday at FedEx Location — Available ONLY for FedEx Priority Overnight and FedEx 2Day to select locations.

Does this shipment contain dangerous goods? One box must be checked.

[X] No 4 [ ] Yes — As per attached Shipper's Declaration. [ ] Yes — Shipper's Declaration not required. 6 [ ] Dry Ice — Dry Ice 9 UN 1845 [ ] Cargo Aircraft Only

Dangerous goods (including dry ice) cannot be shipped in FedEx packaging.

7 Payment — Bill to: Enter FedEx Acct. No. or Credit Card No. below. Obtain Recip. Acct. No.

1 [X] Sender — Acct. No. in Section 1 will be billed. 2 [ ] Recipient 3 [ ] Third Party 4 [ ] Credit Card 5 [ ] Cash/Check

Total Packages 2 Total Weight

Our liability is limited to $100 unless you declare a higher value. See the current FedEx Service Guide for details. Credit Card Auth.

8 Residential Delivery Signature Options — If you require a signature, check Direct or Indirect.

[ ] No Signature Required — Package may be left without obtaining a signature for delivery. 10 [ ] Direct Signature — Someone at recipient's address may sign for delivery. Fee applies. 34 [ ] Indirect Signature — If no one is available at recipient's address, someone at a neighboring address may sign for delivery. Fee applies.

520

Rev. Date 10/06 • Part #159281 • ©1994–2006 FedEx • PRINTED IN U.S.A. SRY

CUSTODY SEAL

DATE 1-20-09

SIGNATURE

QEC Quality Environmental Containers

800-255-3950 • 304-255-3900

fedex.com 1.800.GoFedEx 1.800.463.3339

FedEx® US Airbill
Express

8660 4930 2486

0200 Form ID No.

FedEx Copy

1 From

Date 1-20-09 Sender's FedEx Account Number 1402466697

Sender's Name CHRIS MANSURI Phone 512 529-6080

Company TRC

Address 565 E Huntland Dr 250 Dept./Floor/Suite/Room

City Austin State TX ZIP 78752

2 Your Internal Billing Reference 165033.01

3 To

Recipient's Name Recieving Phone 512 388-8222

Company DHL Analytical

Recipient's Address @ 2300 Double Creek Drive Dept./Floor/Suite/Room

We cannot deliver to P.O. boxes or P.O. ZIP codes.

Address

To request a package be held at a specific FedEx location, print FedEx address here.

City Round Rock State TX ZIP 78664

8660 4930 2486

4a Express Package Service *Packages up to 150 lbs.*

1 [X] FedEx Priority Overnight — Next business morning.* Friday shipments will be delivered on Monday unless SATURDAY Delivery is selected.

5 [ ] FedEx Standard Overnight — Next business afternoon.* Saturday Delivery NOT available.

6 [ ] FedEx First Overnight — Earliest next business morning delivery to select locations.* Saturday Delivery NOT available.

3 [ ] FedEx 2Day — Second business day.* Thursday shipments will be delivered on Monday unless SATURDAY Delivery is selected.

20 [ ] FedEx Express Saver — Third business day.* Saturday Delivery NOT available.

FedEx Envelope rate not available. Minimum charge: One-pound rate.

* To most locations.

4b Express Freight Service *Packages over 150 lbs.*

7 [ ] FedEx 1Day Freight* — Next business day.** Friday shipments will be delivered on Monday unless SATURDAY Delivery is selected.

8 [ ] FedEx 2Day Freight — Second business day.** Thursday shipments will be delivered on Monday unless SATURDAY Delivery is selected.

83 [ ] FedEx 3Day Freight — Third business day.** Saturday Delivery NOT available.

* Call for Confirmation: ** To most locations.

5 Packaging

6 [ ] FedEx Envelope* 2 [ ] FedEx Pak* — Includes FedEx Small Pak, FedEx Large Pak, and FedEx Sturdy Pak. 3 [ ] FedEx Box 4 [ ] FedEx Tube 1 [X] Other

* Declared value limit $500.

6 Special Handling Include FedEx address in Section 3

3 [ ] SATURDAY DELIVERY

1 [ ] HOLD Weekday at FedEx Location — Not available for FedEx First Overnight.

31 [ ] HOLD Saturday at FedEx Location — Available ONLY for FedEx Priority Overnight and FedEx 2Day to select locations.

Does this shipment contain dangerous goods? One box must be checked

[X] No 4 [ ] Yes — As per attached Shipper's Declaration. [ ] Yes — Shipper's Declaration not required. 6 [ ] Dry Ice — Dry Ice, 9, UN 1845 ____ x ____ kg

Dangerous goods (including dry ice) cannot be shipped in FedEx packaging. [ ] Cargo Aircraft Only

7 Payment *Bill to:* Enter FedEx Acct. No. or Credit Card No. below. Obtain Recip. Acct. No. [ ]

1 [X] Sender — Acct. No. in Section 1 will be billed. 2 [ ] Recipient 3 [ ] Third Party 4 [ ] Credit Card 5 [ ] Cash/Check

FedEx Acct. No. Credit Card No. Exp. Date

Total Packages 2 Total Weight Total Declared Value† $ .00

†Our liability is limited to $100 unless you declare a higher value. See the current FedEx Service Guide for details. Credit Card Auth.

8 Residential Delivery Signature Options If you require a signature, check Direct or Indirect.

[ ] No Signature Required — Package may be left without obtaining a signature for delivery.

10 [ ] Direct Signature — Someone at recipient's address may sign for delivery. *Fee applies.*

34 [ ] Indirect Signature — If no one is available at recipient's address, someone at a neighboring address may sign for delivery. *Fee applies.*

520

Rev. Date 10/05 Part #158281 ©1994–2006 FedEx • PRINTED IN U.S.A. SRY

fedex.com 1.800.GoFedEx 1.800.463.3339

CUSTODY SE...
DATE
SIGNATURE

20.09

QEC Quality Environmental Containers
800-255-3950 • 304-255-3900

DHL Analytical

Sample Receipt Checklist

Client Name TRC Environmental Corp. Date Received: 1/21/2009

Work Order Number 0901115 Received by JB

Checklist completed by: [signature] 1/21/09 (Signature / Date) Reviewed by (DL) 1/21/09 (Initials / Date)

Carrier name: FedEx 1day

Shipping container/cooler in good condition?	Yes ☑	No ☐	Not Present ☐
Custody seals intact on shippping container/cooler?	Yes ☑	No ☐	Not Present ☐
Custody seals intact on sample bottles?	Yes ☐	No ☐	Not Present ☑
Chain of custody present?	Yes ☑	No ☐	
Chain of custody signed when relinquished and received?	Yes ☑	No ☐	
Chain of custody agrees with sample labels?	Yes ☑	No ☐	
Samples in proper container/bottle?	Yes ☑	No ☐	
Sample containers intact?	Yes ☑	No ☐	
Sufficient sample volume for indicated test?	Yes ☑	No ☐	
All samples received within holding time?	Yes ☑	No ☐	
Container/Temp Blank temperature in compliance?	Yes ☑	No ☐	2.8 °C
Water - VOA vials have zero headspace?	Yes ☐	No ☐	No VOA vials submitted ☑
Water - pH acceptable upon receipt?	Yes ☑	No ☐	Not Applicable ☐

Adjusted? NO Checked by [signature]

Any No response must be detailed in the comments section below.

Client contacted _____ Date contacted: _____ Person contacted _____

Contacted by: _____ Regarding: _____

Comments: _____

Corrective Action _____

CLIENT: TRC Environmental Corp.
Project: RRC Wendkirk BMP
Lab Order: 0901115

CASE NARRATIVE

Samples were analyzed using the methods outlined in the following references:

Test Methods for Evaluating Solid Waste, Physical/Chemical Methods, SW846, 3rd Edition.

Method SW6020 - Metals Analysis
Method E300 - Anions Analysis
Method M2320 B (18th Edition) - Alkalinity Analysis
Method M2510 B (18th Edition) - Specific Conductance
Method M2540C (18th Edition) - TDS Analysis

LOG IN

Samples were received and log-in performed on 1/21/09. A total of 16 samples were received. The samples arrived in good condition and were properly packaged.

METALS ANALYSIS

For Metals analysis performed on 1/29/09 the matrix spike and matrix spike duplicate recoveries were out of control limits for a few analytes. These are flagged accordingly in the QC summary report. The reference sample selected for the matrix spike and matrix spike duplicate was from this work order. The LCS was within control limits for these analytes. No further corrective actions were taken.

For Metals analysis performed on 1/29/09 the RPD for the serial dilution was slightly above control limits for Calcium. This is flagged accordingly. The PDS was within control limits for this analyte. No further corrective actions were taken.

CLIENT: TRC Environmental Corp.
Project: RRC Wendkirk BMP
Lab Order: 0901115

Work Order Sample Summary

Lab Smp ID	Client Sample ID	Tag Number	Date Collected	Date Recv'd
0901115-01	W-RS-14		01/19/09 11:15 AM	01/21/09
0901115-02	W-RS-14-D		01/19/09 11:15 AM	01/21/09
0901115-03	W-RS-15		01/19/09 11:50 AM	01/21/09
0901115-04	W-RS-16		01/19/09 12:45 PM	01/21/09
0901115-05	W-RS-17		01/19/09 01:20 PM	01/21/09
0901115-06	W-RS-13		01/19/09 02:25 PM	01/21/09
0901115-07	W-RS-12		01/19/09 02:43 PM	01/21/09
0901115-08	W-SG-4314102-01		01/19/09 05:04 PM	01/21/09
0901115-09	W-MW-13		01/20/09 09:30 AM	01/21/09
0901115-10	W-MW-9		01/20/09 10:22 AM	01/21/09
0901115-11	W-MW-14		01/20/09 12:11 PM	01/21/09
0901115-12	W-MW-8		01/20/09 01:10 PM	01/21/09
0901115-13	W-MW-7		01/20/09 01:48 PM	01/21/09
0901115-14	W-SP-01		01/20/09 02:44 PM	01/21/09
0901115-15	W-MW-16		01/20/09 03:27 PM	01/21/09
0901115-16	W-MW-4		01/20/09 03:20 PM	01/21/09

CLIENT: TRC Environmental Corp.
Project: RRC Wendkirk BMP
Lab Order: 0901115

PREP DATES REPORT

Sample ID	Client Sample ID	Collection Date	Matrix	Test Number	Test Name	Prep Date	Batch ID
0901115-01A	W-RS-14	01/19/09 11:15 AM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/23/09 09:19 AM	33129
	W-RS-14	01/19/09 11:15 AM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/23/09 09:19 AM	33129
0901115-01B	W-RS-14	01/19/09 11:15 AM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
	W-RS-14	01/19/09 11:15 AM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
	W-RS-14	01/19/09 11:15 AM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
0901115-01C	W-RS-14	01/19/09 11:15 AM	Aqueous	M2320 B	Alkalinity Preparation	01/22/09 12:00 PM	33121
	W-RS-14	01/19/09 11:15 AM	Aqueous	M2510 B	Conductivity Preparation	01/22/09 09:40 AM	33107
	W-RS-14	01/19/09 11:15 AM	Aqueous	M2540C	TDS Preparation	01/22/09 11:51 AM	33116
0901115-02A	W-RS-14-D	01/19/09 11:15 AM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/23/09 09:19 AM	33129
	W-RS-14-D	01/19/09 11:15 AM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/23/09 09:19 AM	33129
0901115-02B	W-RS-14-D	01/19/09 11:15 AM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
	W-RS-14-D	01/19/09 11:15 AM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
	W-RS-14-D	01/19/09 11:15 AM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
0901115-02C	W-RS-14-D	01/19/09 11:15 AM	Aqueous	M2320 B	Alkalinity Preparation	01/22/09 12:00 PM	33121
	W-RS-14-D	01/19/09 11:15 AM	Aqueous	M2510 B	Conductivity Preparation	01/22/09 09:40 AM	33107
	W-RS-14-D	01/19/09 11:15 AM	Aqueous	M2540C	TDS Preparation	01/22/09 11:51 AM	33116
0901115-03A	W-RS-15	01/19/09 11:50 AM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/23/09 09:19 AM	33129
	W-RS-15	01/19/09 11:50 AM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/23/09 09:19 AM	33129
0901115-03B	W-RS-15	01/19/09 11:50 AM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
	W-RS-15	01/19/09 11:50 AM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
	W-RS-15	01/19/09 11:50 AM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
0901115-03C	W-RS-15	01/19/09 11:50 AM	Aqueous	M2320 B	Alkalinity Preparation	01/22/09 12:00 PM	33121
	W-RS-15	01/19/09 11:50 AM	Aqueous	M2510 B	Conductivity Preparation	01/22/09 09:40 AM	33107
	W-RS-15	01/19/09 11:50 AM	Aqueous	M2540C	TDS Preparation	01/22/09 11:51 AM	33116
0901115-04A	W-RS-16	01/19/09 12:45 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/23/09 09:19 AM	33129
	W-RS-16	01/19/09 12:45 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/23/09 09:19 AM	33129
0901115-04B	W-RS-16	01/19/09 12:45 PM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
	W-RS-16	01/19/09 12:45 PM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
	W-RS-16	01/19/09 12:45 PM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097

CLIENT: TRC Environmental Corp.
Project: RRC Wendkirk BMP
Lab Order: 0901115

PREP DATES REPORT

Sample ID	Client Sample ID	Collection Date	Matrix	Test Number	Test Name	Prep Date	Batch ID
0901115-04C	W-RS-16	01/19/09 12:45 PM	Aqueous	M2320 B	Alkalinity Preparation	01/22/09 12:00 PM	33121
	W-RS-16	01/19/09 12:45 PM	Aqueous	M2510 B	Conductivity Preparation	01/22/09 09:40 AM	33107
	W-RS-16	01/19/09 12:45 PM	Aqueous	M2540C	TDS Preparation	01/22/09 11:51 AM	33116
0901115-05A	W-RS-17	01/19/09 01:20 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/23/09 09:19 AM	33129
	W-RS-17	01/19/09 01:20 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/23/09 09:19 AM	33129
0901115-05B	W-RS-17	01/19/09 01:20 PM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
	W-RS-17	01/19/09 01:20 PM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
	W-RS-17	01/19/09 01:20 PM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
0901115-05C	W-RS-17	01/19/09 01:20 PM	Aqueous	M2320 B	Alkalinity Preparation	01/22/09 12:00 PM	33121
	W-RS-17	01/19/09 01:20 PM	Aqueous	M2510 B	Conductivity Preparation	01/22/09 09:40 AM	33107
	W-RS-17	01/19/09 01:20 PM	Aqueous	M2540C	TDS Preparation	01/22/09 11:51 AM	33116
0901115-06A	W-RS-13	01/19/09 02:25 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/23/09 09:19 AM	33129
	W-RS-13	01/19/09 02:25 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/23/09 09:19 AM	33129
0901115-06B	W-RS-13	01/19/09 02:25 PM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
	W-RS-13	01/19/09 02:25 PM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
	W-RS-13	01/19/09 02:25 PM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
0901115-06C	W-RS-13	01/19/09 02:25 PM	Aqueous	M2320 B	Alkalinity Preparation	01/22/09 12:00 PM	33121
	W-RS-13	01/19/09 02:25 PM	Aqueous	M2510 B	Conductivity Preparation	01/22/09 09:40 AM	33107
	W-RS-13	01/19/09 02:25 PM	Aqueous	M2540C	TDS Preparation	01/22/09 11:51 AM	33116
0901115-07A	W-RS-12	01/19/09 02:43 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/23/09 09:19 AM	33129
	W-RS-12	01/19/09 02:43 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/23/09 09:19 AM	33129
0901115-07B	W-RS-12	01/19/09 02:43 PM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
	W-RS-12	01/19/09 02:43 PM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
	W-RS-12	01/19/09 02:43 PM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
0901115-07C	W-RS-12	01/19/09 02:43 PM	Aqueous	M2320 B	Alkalinity Preparation	01/22/09 12:00 PM	33121
	W-RS-12	01/19/09 02:43 PM	Aqueous	M2510 B	Conductivity Preparation	01/22/09 09:40 AM	33107
	W-RS-12	01/19/09 02:43 PM	Aqueous	M2540C	TDS Preparation	01/22/09 11:51 AM	33116
0901115-08A	W-SG-4314102-01	01/19/09 05:04 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/23/09 09:19 AM	33129
	W-SG-4314102-01	01/19/09 05:04 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/23/09 09:19 AM	33129

CLIENT: TRC Environmental Corp.
Project: RRC Wendkirk BMP
Lab Order: 0901115

PREP DATES REPORT

Sample ID	Client Sample ID	Collection Date	Matrix	Test Number	Test Name	Prep Date	Batch ID
0901115-08B	W-SG-4314102-01	01/19/09 05:04 PM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
	W-SG-4314102-01	01/19/09 05:04 PM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
0901115-08C	W-SG-4314102-01	01/19/09 05:04 PM	Aqueous	M2320 B	Alkalinity Preparation	01/22/09 12:00 PM	33121
	W-SG-4314102-01	01/19/09 05:04 PM	Aqueous	M2510 B	Conductivity Preparation	01/22/09 09:40 AM	33107
	W-SG-4314102-01	01/19/09 05:04 PM	Aqueous	M2540C	TDS Preparation	01/22/09 11:51 AM	33116
0901115-09A	W-MW-13	01/20/09 09:30 AM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/23/09 09:19 AM	33129
	W-MW-13	01/20/09 09:30 AM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/23/09 09:19 AM	33129
0901115-09B	W-MW-13	01/20/09 09:30 AM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
	W-MW-13	01/20/09 09:30 AM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
	W-MW-13	01/20/09 09:30 AM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
	W-MW-13	01/20/09 09:30 AM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
0901115-09C	W-MW-13	01/20/09 09:30 AM	Aqueous	M2320 B	Alkalinity Preparation	01/22/09 12:00 PM	33121
	W-MW-13	01/20/09 09:30 AM	Aqueous	M2510 B	Conductivity Preparation	01/22/09 09:40 AM	33107
	W-MW-13	01/20/09 09:30 AM	Aqueous	M2540C	TDS Preparation	01/22/09 11:51 AM	33116
0901115-10A	W-MW-9	01/20/09 10:22 AM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/23/09 09:19 AM	33129
	W-MW-9	01/20/09 10:22 AM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/23/09 09:19 AM	33129
0901115-10B	W-MW-9	01/20/09 10:22 AM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
	W-MW-9	01/20/09 10:22 AM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
	W-MW-9	01/20/09 10:22 AM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
0901115-10C	W-MW-9	01/20/09 10:22 AM	Aqueous	M2320 B	Alkalinity Preparation	01/22/09 12:00 PM	33121
	W-MW-9	01/20/09 10:22 AM	Aqueous	M2510 B	Conductivity Preparation	01/22/09 09:40 AM	33107
	W-MW-9	01/20/09 10:22 AM	Aqueous	M2540C	TDS Preparation	01/23/09 03:00 PM	33143
0901115-11A	W-MW-14	01/20/09 12:11 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/23/09 09:19 AM	33129
	W-MW-14	01/20/09 12:11 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/23/09 09:19 AM	33129
0901115-11B	W-MW-14	01/20/09 12:11 PM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
	W-MW-14	01/20/09 12:11 PM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
	W-MW-14	01/20/09 12:11 PM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
	W-MW-14	01/20/09 12:11 PM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
0901115-11C	W-MW-14	01/20/09 12:11 PM	Aqueous	M2320 B	Alkalinity Preparation	01/22/09 12:00 PM	33121

CLIENT: TRC Environmental Corp.
Project: RRC Wendkirk BMP
Lab Order: 0901115

PREP DATES REPORT

Sample ID	Client Sample ID	Collection Date	Matrix	Test Number	Test Name	Prep Date	Batch ID
	W-MW-14	01/20/09 12:11 PM	Aqueous	M2510 B	Conductivity Preparation	01/22/09 09:40 AM	33107
	W-MW-14	01/20/09 12:11 PM	Aqueous	M2540C	TDS Preparation	01/23/09 03:00 PM	33143
0901115-12A	W-MW-8	01/20/09 01:10 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/23/09 09:19 AM	33129
	W-MW-8	01/20/09 01:10 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/23/09 09:19 AM	33129
0901115-12B	W-MW-8	01/20/09 01:10 PM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
	W-MW-8	01/20/09 01:10 PM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
0901115-12C	W-MW-8	01/20/09 01:10 PM	Aqueous	M2320 B	Alkalinity Preparation	01/22/09 12:00 PM	33121
	W-MW-8	01/20/09 01:10 PM	Aqueous	M2510 B	Conductivity Preparation	01/22/09 09:40 AM	33107
	W-MW-8	01/20/09 01:10 PM	Aqueous	M2540C	TDS Preparation	01/23/09 03:00 PM	33143
0901115-13A	W-MW-7	01/20/09 01:48 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/23/09 09:19 AM	33129
	W-MW-7	01/20/09 01:48 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/23/09 09:19 AM	33129
0901115-13B	W-MW-7	01/20/09 01:48 PM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
	W-MW-7	01/20/09 01:48 PM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
0901115-13C	W-MW-7	01/20/09 01:48 PM	Aqueous	M2320 B	Alkalinity Preparation	01/22/09 12:00 PM	33121
	W-MW-7	01/20/09 01:48 PM	Aqueous	M2510 B	Conductivity Preparation	01/22/09 09:40 AM	33107
	W-MW-7	01/20/09 01:48 PM	Aqueous	M2540C	TDS Preparation	01/23/09 03:00 PM	33143
0901115-14A	W-SP-01	01/20/09 02:44 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/23/09 09:19 AM	33129
0901115-14B	W-SP-01	01/20/09 02:44 PM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
	W-SP-01	01/20/09 02:44 PM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
0901115-14C	W-SP-01	01/20/09 02:44 PM	Aqueous	M2320 B	Alkalinity Preparation	01/22/09 12:00 PM	33121
	W-SP-01	01/20/09 02:44 PM	Aqueous	M2510 B	Conductivity Preparation	01/22/09 09:40 AM	33107
	W-SP-01	01/20/09 02:44 PM	Aqueous	M2540C	TDS Preparation	01/23/09 03:00 PM	33143
0901115-15A	W-MW-16	01/20/09 03:27 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/23/09 09:19 AM	33129
0901115-15B	W-MW-16	01/20/09 03:27 PM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
	W-MW-16	01/20/09 03:27 PM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
	W-MW-16	01/20/09 03:27 PM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
0901115-15C	W-MW-16	01/20/09 03:27 PM	Aqueous	M2320 B	Alkalinity Preparation	01/22/09 12:00 PM	33121
	W-MW-16	01/20/09 03:27 PM	Aqueous	M2510 B	Conductivity Preparation	01/22/09 09:40 AM	33107
	W-MW-16	01/20/09 03:27 PM	Aqueous	M2540C	TDS Preparation	01/23/09 03:00 PM	33143

CLIENT: TRC Environmental Corp.
Project: RRC Wendkirk BMP
Lab Order: 0901115

PREP DATES REPORT

Sample ID	Client Sample ID	Collection Date	Matrix	Test Number	Test Name	Prep Date	Batch ID
0901115-16A	W-MW-4	01/20/09 03:20 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/23/09 09:19 AM	33129
	W-MW-4	01/20/09 03:20 PM	Aqueous	SW3005A	Aq Prep Metals : ICP-MS	01/23/09 09:19 AM	33129
0901115-16B	W-MW-4	01/20/09 03:20 PM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
	W-MW-4	01/20/09 03:20 PM	Aqueous	E300	Anion Preparation	01/21/09 02:30 PM	33097
0901115-16C	W-MW-4	01/20/09 03:20 PM	Aqueous	M2320 B	Alkalinity Preparation	01/22/09 12:00 PM	33121
	W-MW-4	01/20/09 03:20 PM	Aqueous	M2510 B	Conductivity Preparation	01/22/09 09:40 AM	33107
	W-MW-4	01/20/09 03:20 PM	Aqueous	M2540C	TDS Preparation	01/23/09 03:00 PM	33143

CLIENT: TRC Environmental Corp.
Project: RRC Wendkirk BMP
Lab Order: 0901115

ANALYTICAL DATES REPORT

Sample ID	Client Sample ID	Matrix	Test Number	Test Name	Batch ID	Dilution	Analysis Date	Run ID
0901115-01A	W-RS-14	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33129	125	01/29/09 12:45 PM	ICP-MS2_090129A
	W-RS-14	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33129	25	01/29/09 02:42 PM	ICP-MS2_090129A
0901115-01B	W-RS-14	Aqueous	E300	Anions by IC method - Water	33097	1	01/21/09 03:48 PM	IC2_090121A
	W-RS-14	Aqueous	E300	Anions by IC method - Water	33097	10	01/22/09 09:59 AM	IC2_090122A
	W-RS-14	Aqueous	E300	Anions by IC method - Water	33097	100	01/22/09 03:42 PM	IC2_090122A
0901115-01C	W-RS-14	Aqueous	M2320 B	Alkalinity	33121	1	01/22/09 01:48 PM	TITRATOR_090122A
	W-RS-14	Aqueous	M2510 B	Specific Conductance	33107	1	01/22/09 09:30 AM	WC_090122A
	W-RS-14	Aqueous	M2540C	Total Dissolved Solids	33116	1	01/22/09 01:15 PM	WC_090122B
0901115-02A	W-RS-14-D	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33129	125	01/29/09 12:51 PM	ICP-MS2_090129A
	W-RS-14-D	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33129	25	01/29/09 02:47 PM	ICP-MS2_090129A
0901115-02B	W-RS-14-D	Aqueous	E300	Anions by IC method - Water	33097	1	01/21/09 04:02 PM	IC2_090121A
	W-RS-14-D	Aqueous	E300	Anions by IC method - Water	33097	10	01/22/09 10:13 AM	IC2_090122A
	W-RS-14-D	Aqueous	E300	Anions by IC method - Water	33097	100	01/22/09 03:57 PM	IC2_090122A
0901115-02C	W-RS-14-D	Aqueous	M2320 B	Alkalinity	33121	1	01/22/09 01:51 PM	TITRATOR_090122A
	W-RS-14-D	Aqueous	M2510 B	Specific Conductance	33107	1	01/22/09 09:30 AM	WC_090122A
	W-RS-14-D	Aqueous	M2540C	Total Dissolved Solids	33116	1	01/22/09 01:15 PM	WC_090122B
0901115-03A	W-RS-15	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33129	125	01/29/09 12:56 PM	ICP-MS2_090129A
	W-RS-15	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33129	25	01/29/09 02:53 PM	ICP-MS2_090129A
0901115-03B	W-RS-15	Aqueous	E300	Anions by IC method - Water	33097	1	01/21/09 04:17 PM	IC2_090121A
	W-RS-15	Aqueous	E300	Anions by IC method - Water	33097	10	01/22/09 10:28 AM	IC2_090122A
	W-RS-15	Aqueous	E300	Anions by IC method - Water	33097	100	01/22/09 04:12 PM	IC2_090122A
0901115-03C	W-RS-15	Aqueous	M2320 B	Alkalinity	33121	1	01/22/09 01:53 PM	TITRATOR_090122A
	W-RS-15	Aqueous	M2510 B	Specific Conductance	33107	1	01/22/09 09:30 AM	WC_090122A
	W-RS-15	Aqueous	M2540C	Total Dissolved Solids	33116	1	01/22/09 01:15 PM	WC_090122B
0901115-04A	W-RS-16	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33129	125	01/29/09 01:02 PM	ICP-MS2_090129A
	W-RS-16	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33129	25	01/29/09 02:58 PM	ICP-MS2_090129A
0901115-04B	W-RS-16	Aqueous	E300	Anions by IC method - Water	33097	1	01/21/09 04:32 PM	IC2_090121A
	W-RS-16	Aqueous	E300	Anions by IC method - Water	33097	10	01/22/09 10:43 AM	IC2_090122A
	W-RS-16	Aqueous	E300	Anions by IC method - Water	33097	100	01/22/09 04:26 PM	IC2_090122A

CLIENT: TRC Environmental Corp.
Project: RRC Wendkirk BMP
Lab Order: 0901115

ANALYTICAL DATES REPORT

Sample ID	Client Sample ID	Matrix	Test Number	Test Name	Batch ID	Dilution	Analysis Date	Run ID
0901115-04C	W-RS-16	Aqueous	M2320 B	Alkalinity	33121	1	01/22/09 01:56 PM	TITRATOR_090122A
	W-RS-16	Aqueous	M2510 B	Specific Conductance	33107	1	01/22/09 09:30 AM	WC_090122A
	W-RS-16	Aqueous	M2540C	Total Dissolved Solids	33116	1	01/22/09 01:15 PM	WC_090122B
0901115-05A	W-RS-17	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33129	125	01/29/09 01:07 PM	ICP-MS2_090129A
	W-RS-17	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33129	25	01/29/09 03:04 PM	ICP-MS2_090129A
0901115-05B	W-RS-17	Aqueous	E300	Anions by IC method - Water	33097	1	01/21/09 05:09 PM	IC2_090121A
	W-RS-17	Aqueous	E300	Anions by IC method - Water	33097	10	01/22/09 10:57 AM	IC2_090122A
	W-RS-17	Aqueous	E300	Anions by IC method - Water	33097	100	01/22/09 04:41 PM	IC2_090122A
0901115-05C	W-RS-17	Aqueous	M2320 B	Alkalinity	33121	1	01/22/09 01:59 PM	TITRATOR_090122A
	W-RS-17	Aqueous	M2510 B	Specific Conductance	33107	1	01/22/09 09:30 AM	WC_090122A
	W-RS-17	Aqueous	M2540C	Total Dissolved Solids	33116	1	01/22/09 01:15 PM	WC_090122B
0901115-06A	W-RS-13	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33129	125	01/29/09 01:13 PM	ICP-MS2_090129A
	W-RS-13	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33129	25	01/29/09 03:21 PM	ICP-MS2_090129A
0901115-06B	W-RS-13	Aqueous	E300	Anions by IC method - Water	33097	1	01/21/09 05:24 PM	IC2_090121A
	W-RS-13	Aqueous	E300	Anions by IC method - Water	33097	10	01/22/09 11:12 AM	IC2_090122A
	W-RS-13	Aqueous	E300	Anions by IC method - Water	33097	100	01/22/09 04:56 PM	IC2_090122A
0901115-06C	W-RS-13	Aqueous	M2320 B	Alkalinity	33121	1	01/22/09 02:02 PM	TITRATOR_090122A
	W-RS-13	Aqueous	M2510 B	Specific Conductance	33107	1	01/22/09 09:30 AM	WC_090122A
	W-RS-13	Aqueous	M2540C	Total Dissolved Solids	33116	1	01/22/09 01:15 PM	WC_090122B
0901115-07A	W-RS-12	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33129	125	01/29/09 01:18 PM	ICP-MS2_090129A
	W-RS-12	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33129	25	01/29/09 03:27 PM	ICP-MS2_090129A
0901115-07B	W-RS-12	Aqueous	E300	Anions by IC method - Water	33097	1	01/21/09 05:39 PM	IC2_090121A
	W-RS-12	Aqueous	E300	Anions by IC method - Water	33097	10	01/22/09 11:27 AM	IC2_090122A
	W-RS-12	Aqueous	E300	Anions by IC method - Water	33097	100	01/22/09 05:10 PM	IC2_090122A
0901115-07C	W-RS-12	Aqueous	M2320 B	Alkalinity	33121	1	01/22/09 02:10 PM	TITRATOR_090122A
	W-RS-12	Aqueous	M2510 B	Specific Conductance	33107	1	01/22/09 09:30 AM	WC_090122A
	W-RS-12	Aqueous	M2540C	Total Dissolved Solids	33116	1	01/22/09 01:15 PM	WC_090122B
0901115-08A	W-SG-4314102-01	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33129	500	01/29/09 11:37 AM	ICP-MS2_090129A
	W-SG-4314102-01	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33129	25	01/29/09 02:15 PM	ICP-MS2_090129A

CLIENT: TRC Environmental Corp.
Project: RRC Wendkirk BMP
Lab Order: 0901115

ANALYTICAL DATES REPORT

Sample ID	Client Sample ID	Matrix	Test Number	Test Name	Batch ID	Dilution	Analysis Date	Run ID
0901115-08B	W-SG-4314102-01	Aqueous	E300	Anions by IC method - Water	33097	1	01/21/09 05:53 PM	IC2_090121A
	W-SG-4314102-01	Aqueous	E300	Anions by IC method - Water	33097	100	01/22/09 11:58 AM	IC2_090122A
0901115-08C	W-SG-4314102-01	Aqueous	M2320 B	Alkalinity	33121	1	01/22/09 02:17 PM	TITRATOR_090122A
	W-SG-4314102-01	Aqueous	M2510 B	Specific Conductance	33107	1	01/22/09 09:30 AM	WC_090122A
	W-SG-4314102-01	Aqueous	M2540C	Total Dissolved Solids	33116	1	01/22/09 01:15 PM	WC_090122B
0901115-09A	W-MW-13	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33129	500	01/29/09 12:34 PM	ICP-MS2_090129A
	W-MW-13	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33129	25	01/29/09 03:32 PM	ICP-MS2_090129A
0901115-09B	W-MW-13	Aqueous	E300	Anions by IC method - Water	33097	1	01/21/09 06:08 PM	IC2_090121A
	W-MW-13	Aqueous	E300	Anions by IC method - Water	33097	100	01/22/09 12:29 PM	IC2_090122A
	W-MW-13	Aqueous	E300	Anions by IC method - Water	33097	1000	01/22/09 05:40 PM	IC2_090122A
	W-MW-13	Aqueous	E300	Anions by IC method - Water	33097	1000	02/02/09 11:21 AM	IC2_090202A
0901115-09C	W-MW-13	Aqueous	M2320 B	Alkalinity	33121	1	01/22/09 02:22 PM	TITRATOR_090122A
	W-MW-13	Aqueous	M2510 B	Specific Conductance	33107	1	01/22/09 09:30 AM	WC_090122A
	W-MW-13	Aqueous	M2540C	Total Dissolved Solids	33116	1	01/22/09 01:15 PM	WC_090122B
0901115-10A	W-MW-9	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33129	50	01/29/09 01:46 PM	ICP-MS2_090129A
	W-MW-9	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33129	1	01/26/09 08:53 PM	ICP-MS3_090126A
0901115-10B	W-MW-9	Aqueous	E300	Anions by IC method - Water	33097	1	01/21/09 06:23 PM	IC2_090121A
	W-MW-9	Aqueous	E300	Anions by IC method - Water	33097	10	01/22/09 12:43 PM	IC2_090122A
	W-MW-9	Aqueous	E300	Anions by IC method - Water	33097	10	02/02/09 10:51 AM	IC2_090202A
0901115-10C	W-MW-9	Aqueous	M2320 B	Alkalinity	33121	1	01/22/09 02:28 PM	TITRATOR_090122A
	W-MW-9	Aqueous	M2510 B	Specific Conductance	33107	1	01/22/09 09:30 AM	WC_090122A
	W-MW-9	Aqueous	M2540C	Total Dissolved Solids	33143	1	01/23/09 03:00 AM	WC_090123B
0901115-11A	W-MW-14	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33129	1000	01/29/09 12:07 PM	ICP-MS2_090129A
	W-MW-14	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33129	100	01/29/09 03:38 PM	ICP-MS2_090129A
0901115-11B	W-MW-14	Aqueous	E300	Anions by IC method - Water	33097	1	01/21/09 07:07 PM	IC2_090121A
	W-MW-14	Aqueous	E300	Anions by IC method - Water	33097	100	01/22/09 01:27 PM	IC2_090122A
	W-MW-14	Aqueous	E300	Anions by IC method - Water	33097	1000	01/22/09 05:55 PM	IC2_090122A
	W-MW-14	Aqueous	E300	Anions by IC method - Water	33097	1000	02/02/09 11:06 AM	IC2_090202A
0901115-11C	W-MW-14	Aqueous	M2320 B	Alkalinity	33121	1	01/22/09 02:34 PM	TITRATOR_090122A

CLIENT: TRC Environmental Corp.
Project: RRC Wendkirk BMP
Lab Order: 0901115

ANALYTICAL DATES REPORT

Sample ID	Client Sample ID	Matrix	Test Number	Test Name	Batch ID	Dilution	Analysis Date	Run ID
	W-MW-14	Aqueous	M2510 B	Specific Conductance	33107	2	01/22/09 09:30 AM	WC_090122A
	W-MW-14	Aqueous	M2540C	Total Dissolved Solids	33143	1	01/23/09 03:00 AM	WC_090123B
0901115-12A	W-MW-8	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33129	1000	01/29/09 12:12 PM	ICP-MS2_090129A
	W-MW-8	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33129	100	01/29/09 03:43 PM	ICP-MS2_090129A
0901115-12B	W-MW-8	Aqueous	E300	Anions by IC method - Water	33097	1	01/21/09 07:21 PM	IC2_090121A
	W-MW-8	Aqueous	E300	Anions by IC method - Water	33097	100	01/22/09 01:42 PM	IC2_090122A
0901115-12C	W-MW-8	Aqueous	M2320 B	Alkalinity	33121	1	01/22/09 02:40 PM	TITRATOR_090122A
	W-MW-8	Aqueous	M2510 B	Specific Conductance	33107	2	01/22/09 09:30 AM	WC_090122A
	W-MW-8	Aqueous	M2540C	Total Dissolved Solids	33143	1	01/23/09 03:00 AM	WC_090123B
0901115-13A	W-MW-7	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33129	50	01/29/09 01:51 PM	ICP-MS2_090129A
	W-MW-7	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33129	25	01/29/09 03:49 PM	ICP-MS2_090129A
0901115-13B	W-MW-7	Aqueous	E300	Anions by IC method - Water	33097	1	01/21/09 08:05 PM	IC2_090121A
	W-MW-7	Aqueous	E300	Anions by IC method - Water	33097	10	01/22/09 01:57 PM	IC2_090122A
0901115-13C	W-MW-7	Aqueous	M2320 B	Alkalinity	33121	1	01/22/09 02:44 PM	TITRATOR_090122A
	W-MW-7	Aqueous	M2510 B	Specific Conductance	33107	1	01/22/09 09:30 AM	WC_090122A
	W-MW-7	Aqueous	M2540C	Total Dissolved Solids	33143	1	01/23/09 03:00 AM	WC_090123B
0901115-14A	W-SP-01	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33129	50	01/29/09 01:57 PM	ICP-MS2_090129A
0901115-14B	W-SP-01	Aqueous	E300	Anions by IC method - Water	33097	1	01/21/09 08:49 PM	IC2_090121A
	W-SP-01	Aqueous	E300	Anions by IC method - Water	33097	10	01/22/09 02:58 PM	IC2_090122A
0901115-14C	W-SP-01	Aqueous	M2320 B	Alkalinity	33121	1	01/22/09 02:49 PM	TITRATOR_090122A
	W-SP-01	Aqueous	M2510 B	Specific Conductance	33107	1	01/22/09 09:30 AM	WC_090122A
	W-SP-01	Aqueous	M2540C	Total Dissolved Solids	33143	1	01/23/09 03:00 AM	WC_090123B
0901115-15A	W-MW-16	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33129	100	01/29/09 01:24 PM	ICP-MS2_090129A
0901115-15B	W-MW-16	Aqueous	E300	Anions by IC method - Water	33097	1	01/21/09 09:04 PM	IC2_090121A
	W-MW-16	Aqueous	E300	Anions by IC method - Water	33097	10	01/22/09 03:13 PM	IC2_090122A
	W-MW-16	Aqueous	E300	Anions by IC method - Water	33097	100	01/22/09 06:09 PM	IC2_090122A
0901115-15C	W-MW-16	Aqueous	M2320 B	Alkalinity	33121	1	01/22/09 02:53 PM	TITRATOR_090122A
	W-MW-16	Aqueous	M2510 B	Specific Conductance	33107	1	01/22/09 09:30 AM	WC_090122A
	W-MW-16	Aqueous	M2540C	Total Dissolved Solids	33143	1	01/23/09 03:00 AM	WC_090123B

CLIENT: TRC Environmental Corp.
Project: RRC Wendkirk BMP
Lab Order: 0901115

ANALYTICAL DATES REPORT

Sample ID	Client Sample ID	Matrix	Test Number	Test Name	Batch ID	Dilution	Analysis Date	Run ID
0901115-16A	W-MW-4	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33129	500	01/29/09 12:40 PM	ICP-MS2_090129A
	W-MW-4	Aqueous	SW6020	Trace Metals: ICP-MS - Water	33129	25	01/29/09 03:54 PM	ICP-MS2_090129A
0901115-16B	W-MW-4	Aqueous	E300	Anions by IC method - Water	33097	1	01/21/09 09:19 PM	IC2_090121A
	W-MW-4	Aqueous	E300	Anions by IC method - Water	33097	100	01/22/09 03:28 PM	IC2_090122A
0901115-16C	W-MW-4	Aqueous	M2320 B	Alkalinity	33121	1	01/22/09 03:06 PM	TITRATOR_090122A
	W-MW-4	Aqueous	M2510 B	Specific Conductance	33107	1	01/22/09 09:30 AM	WC_090122A
	W-MW-4	Aqueous	M2540C	Total Dissolved Solids	33143	1	01/23/09 03:00 AM	WC_090123B

DHL Analytical

Date: 02/12/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-RS-14
Project:	RRC Wendkirk BMP	Lab ID:	0901115-01
Project No:	165033.0000.0000	Collection Date:	01/19/09 11:15 AM
Lab Order:	0901115	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		SW6020					Analyst: CZ
Calcium	192	2.50	7.50		mg/L	25	01/29/09 02:42 PM
Magnesium	125	2.50	7.50		mg/L	25	01/29/09 02:42 PM
Potassium	19.9	2.50	7.50		mg/L	25	01/29/09 02:42 PM
Sodium	834	12.5	37.5		mg/L	125	01/29/09 12:45 PM
Anions by IC method - Water		E300					Analyst: JBC
Bromide	3.92	0.300	1.00		mg/L	1	01/21/09 03:48 PM
Chloride	1280	30.0	100		mg/L	100	01/22/09 03:42 PM
Sulfate	744	10.0	30.0		mg/L	10	01/22/09 09:59 AM
Alkalinity		M2320 B					Analyst: JBC
Alkalinity, Bicarbonate (As CaCO3)	182	10.0	20.0		mg/L	1	01/22/09 01:48 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 01:48 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 01:48 PM
Alkalinity, Total (As CaCO3)	182	10.0	20.0		mg/L	1	01/22/09 01:48 PM
Specific Conductance		M2510 B					Analyst: AAD
Specific Conductance	5230	10.0	10.0		µmhos/cm	1	01/22/09 09:30 AM
Total Dissolved Solids		M2540C					Analyst: AAD
Total Dissolved Solids (Residue, Filterable)	3360	10.0	10.0		mg/L	1	01/22/09 01:15 PM

Qualifiers:

*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
		S	Spike Recovery outside control limits

DHL Analytical

Date: 02/12/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-RS-14-D
Project:	RRC Wendkirk BMP	Lab ID:	0901115-02
Project No:	165033.0000.0000	Collection Date:	01/19/09 11:15 AM
Lab Order:	0901115	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		SW6020					Analyst: CZ
Calcium	187	2.50	7.50		mg/L	25	01/29/09 02:47 PM
Magnesium	121	2.50	7.50		mg/L	25	01/29/09 02:47 PM
Potassium	19.0	2.50	7.50		mg/L	25	01/29/09 02:47 PM
Sodium	824	12.5	37.5		mg/L	125	01/29/09 12:51 PM
Anions by IC method - Water		E300					Analyst: JBC
Bromide	3.98	0.300	1.00		mg/L	1	01/21/09 04:02 PM
Chloride	1330	30.0	100		mg/L	100	01/22/09 03:57 PM
Sulfate	753	10.0	30.0		mg/L	10	01/22/09 10:13 AM
Alkalinity		M2320 B					Analyst: JBC
Alkalinity, Bicarbonate (As CaCO3)	183	10.0	20.0		mg/L	1	01/22/09 01:51 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 01:51 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 01:51 PM
Alkalinity, Total (As CaCO3)	183	10.0	20.0		mg/L	1	01/22/09 01:51 PM
Specific Conductance		M2510 B					Analyst: AAD
Specific Conductance	5360	10.0	10.0		µmhos/cm	1	01/22/09 09:30 AM
Total Dissolved Solids		M2540C					Analyst: AAD
Total Dissolved Solids (Residue, Filterable)	3270	10.0	10.0		mg/L	1	01/22/09 01:15 PM

Qualifiers:				
	*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
	B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
	C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
	DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
	E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
			S	Spike Recovery outside control limits

DHL Analytical

Date: 02/12/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-RS-15
Project:	RRC Wendkirk BMP	Lab ID:	0901115-03
Project No:	165033.0000.0000	Collection Date:	01/19/09 11:50 AM
Lab Order:	0901115	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		SW6020					Analyst: CZ
Calcium	200	2.50	7.50		mg/L	25	01/29/09 02:53 PM
Magnesium	125	2.50	7.50		mg/L	25	01/29/09 02:53 PM
Potassium	19.6	2.50	7.50		mg/L	25	01/29/09 02:53 PM
Sodium	834	12.5	37.5		mg/L	125	01/29/09 12:56 PM
Anions by IC method - Water		E300					Analyst: JBC
Bromide	4.09	0.300	1.00		mg/L	1	01/21/09 04:17 PM
Chloride	1370	30.0	100		mg/L	100	01/22/09 04:12 PM
Sulfate	767	10.0	30.0		mg/L	10	01/22/09 10:28 AM
Alkalinity		M2320 B					Analyst: JBC
Alkalinity, Bicarbonate (As CaCO3)	189	10.0	20.0		mg/L	1	01/22/09 01:53 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 01:53 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 01:53 PM
Alkalinity, Total (As CaCO3)	189	10.0	20.0		mg/L	1	01/22/09 01:53 PM
Specific Conductance		M2510 B					Analyst: AAD
Specific Conductance	5430	10.0	10.0		µmhos/cm	1	01/22/09 09:30 AM
Total Dissolved Solids		M2540C					Analyst: AAD
Total Dissolved Solids (Residue, Filterable)	3340	10.0	10.0		mg/L	1	01/22/09 01:15 PM

Qualifiers:				
	*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
	B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
	C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
	DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
	E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
			S	Spike Recovery outside control limits

DHL Analytical

Date: 02/12/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-RS-16
Project:	RRC Wendkirk BMP	Lab ID:	0901115-04
Project No:	165033.0000.0000	Collection Date:	01/19/09 12:45 PM
Lab Order:	0901115	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		SW6020					Analyst: CZ
Calcium	194	2.50	7.50		mg/L	25	01/29/09 02:58 PM
Magnesium	121	2.50	7.50		mg/L	25	01/29/09 02:58 PM
Potassium	18.5	2.50	7.50		mg/L	25	01/29/09 02:58 PM
Sodium	810	12.5	37.5		mg/L	125	01/29/09 01:02 PM
Anions by IC method - Water		E300					Analyst: JBC
Bromide	4.33	0.300	1.00		mg/L	1	01/21/09 04:32 PM
Chloride	1450	30.0	100		mg/L	100	01/22/09 04:26 PM
Sulfate	803	10.0	30.0		mg/L	10	01/22/09 10:43 AM
Alkalinity		M2320 B					Analyst: JBC
Alkalinity, Bicarbonate (As CaCO3)	190	10.0	20.0		mg/L	1	01/22/09 01:56 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 01:56 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 01:56 PM
Alkalinity, Total (As CaCO3)	190	10.0	20.0		mg/L	1	01/22/09 01:56 PM
Specific Conductance		M2510 B					Analyst: AAD
Specific Conductance	5580	10.0	10.0		µmhos/cm	1	01/22/09 09:30 AM
Total Dissolved Solids		M2540C					Analyst: AAD
Total Dissolved Solids (Residue, Filterable)	3580	10.0	10.0		mg/L	1	01/22/09 01:15 PM

Qualifiers:				
	*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
	B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
	C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
	DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
	E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
			S	Spike Recovery outside control limits

DHL Analytical

Date: 02/12/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-RS-17
Project:	RRC Wendkirk BMP	Lab ID:	0901115-05
Project No:	165033.0000.0000	Collection Date:	01/19/09 01:20 PM
Lab Order:	0901115	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		SW6020					Analyst: CZ
Calcium	213	2.50	7.50		mg/L	25	01/29/09 03:04 PM
Magnesium	128	2.50	7.50		mg/L	25	01/29/09 03:04 PM
Potassium	20.7	2.50	7.50		mg/L	25	01/29/09 03:04 PM
Sodium	873	12.5	37.5		mg/L	125	01/29/09 01:07 PM
Anions by IC method - Water		E300					Analyst: JBC
Bromide	4.39	0.300	1.00		mg/L	1	01/21/09 05:09 PM
Chloride	1440	30.0	100		mg/L	100	01/22/09 04:41 PM
Sulfate	798	10.0	30.0		mg/L	10	01/22/09 10:57 AM
Alkalinity		M2320 B					Analyst: JBC
Alkalinity, Bicarbonate (As CaCO3)	190	10.0	20.0		mg/L	1	01/22/09 01:59 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 01:59 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 01:59 PM
Alkalinity, Total (As CaCO3)	190	10.0	20.0		mg/L	1	01/22/09 01:59 PM
Specific Conductance		M2510 B					Analyst: AAD
Specific Conductance	5740	10.0	10.0		µmhos/cm	1	01/22/09 09:30 AM
Total Dissolved Solids		M2540C					Analyst: AAD
Total Dissolved Solids (Residue, Filterable)	3680	10.0	10.0		mg/L	1	01/22/09 01:15 PM

Qualifiers:				
	*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
	B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
	C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
	DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
	E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
			S	Spike Recovery outside control limits

DHL Analytical

Date: 02/12/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-RS-13
Project:	RRC Wendkirk BMP	Lab ID:	0901115-06
Project No:	165033.0000.0000	Collection Date:	01/19/09 02:25 PM
Lab Order:	0901115	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		SW6020					Analyst: CZ
Calcium	182	2.50	7.50		mg/L	25	01/29/09 03:21 PM
Magnesium	123	2.50	7.50		mg/L	25	01/29/09 03:21 PM
Potassium	20.1	2.50	7.50		mg/L	25	01/29/09 03:21 PM
Sodium	810	12.5	37.5		mg/L	125	01/29/09 01:13 PM
Anions by IC method - Water		E300					Analyst: JBC
Bromide	4.02	0.300	1.00		mg/L	1	01/21/09 05:24 PM
Chloride	1310	30.0	100		mg/L	100	01/22/09 04:56 PM
Sulfate	770	10.0	30.0		mg/L	10	01/22/09 11:12 AM
Alkalinity		M2320 B					Analyst: JBC
Alkalinity, Bicarbonate (As CaCO3)	153	10.0	20.0		mg/L	1	01/22/09 02:02 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 02:02 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 02:02 PM
Alkalinity, Total (As CaCO3)	153	10.0	20.0		mg/L	1	01/22/09 02:02 PM
Specific Conductance		M2510 B					Analyst: AAD
Specific Conductance	5380	10.0	10.0		µmhos/cm	1	01/22/09 09:30 AM
Total Dissolved Solids		M2540C					Analyst: AAD
Total Dissolved Solids (Residue, Filterable)	3080	10.0	10.0		mg/L	1	01/22/09 01:15 PM

Qualifiers:				
	*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
	B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
	C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
	DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
	E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
			S	Spike Recovery outside control limits

DHL Analytical

Date: 02/12/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-RS-12
Project:	RRC Wendkirk BMP	Lab ID:	0901115-07
Project No:	165033.0000.0000	Collection Date:	01/19/09 02:43 PM
Lab Order:	0901115	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		SW6020					Analyst: CZ
Calcium	179	2.50	7.50		mg/L	25	01/29/09 03:27 PM
Magnesium	112	2.50	7.50		mg/L	25	01/29/09 03:27 PM
Potassium	17.7	2.50	7.50		mg/L	25	01/29/09 03:27 PM
Sodium	724	12.5	37.5		mg/L	125	01/29/09 01:18 PM
Anions by IC method - Water		E300					Analyst: JBC
Bromide	3.81	0.300	1.00		mg/L	1	01/21/09 05:39 PM
Chloride	1200	30.0	100		mg/L	100	01/22/09 05:10 PM
Sulfate	727	10.0	30.0		mg/L	10	01/22/09 11:27 AM
Alkalinity		M2320 B					Analyst: JBC
Alkalinity, Bicarbonate (As CaCO3)	182	10.0	20.0		mg/L	1	01/22/09 02:10 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 02:10 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 02:10 PM
Alkalinity, Total (As CaCO3)	182	10.0	20.0		mg/L	1	01/22/09 02:10 PM
Specific Conductance		M2510 B					Analyst: AAD
Specific Conductance	5020	10.0	10.0		µmhos/cm	1	01/22/09 09:30 AM
Total Dissolved Solids		M2540C					Analyst: AAD
Total Dissolved Solids (Residue, Filterable)	3160	10.0	10.0		mg/L	1	01/22/09 01:15 PM

Qualifiers:

*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
		S	Spike Recovery outside control limits

DHL Analytical

Date: 02/12/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-SG-4314102-01
Project:	RRC Wendkirk BMP	Lab ID:	0901115-08
Project No:	165033.0000.0000	Collection Date:	01/19/09 05:04 PM
Lab Order:	0901115	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		SW6020					Analyst: CZ
Calcium	667	50.0	150		mg/L	500	01/29/09 11:37 AM
Magnesium	457	50.0	150		mg/L	500	01/29/09 11:37 AM
Potassium	18.9	2.50	7.50		mg/L	25	01/29/09 02:15 PM
Sodium	2650	50.0	150		mg/L	500	01/29/09 11:37 AM
Anions by IC method - Water		E300					Analyst: JBC
Bromide	13.2	0.300	1.00		mg/L	1	01/21/09 05:53 PM
Chloride	4510	30.0	100		mg/L	100	01/22/09 11:58 AM
Sulfate	2760	100	300		mg/L	100	01/22/09 11:58 AM
Alkalinity		M2320 B					Analyst: JBC
Alkalinity, Bicarbonate (As CaCO3)	600	10.0	20.0		mg/L	1	01/22/09 02:17 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 02:17 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 02:17 PM
Alkalinity, Total (As CaCO3)	600	10.0	20.0		mg/L	1	01/22/09 02:17 PM
Specific Conductance		M2510 B					Analyst: AAD
Specific Conductance	16400	10.0	10.0		µmhos/cm	1	01/22/09 09:30 AM
Total Dissolved Solids		M2540C					Analyst: AAD
Total Dissolved Solids (Residue, Filterable)	12000	10.0	10.0		mg/L	1	01/22/09 01:15 PM

Qualifiers:				
	*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
	B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
	C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
	DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
	E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
			S	Spike Recovery outside control limits

DHL Analytical

Date: 02/12/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-MW-13
Project:	RRC Wendkirk BMP	Lab ID:	0901115-09
Project No:	165033.0000.0000	Collection Date:	01/20/09 09:30 AM
Lab Order:	0901115	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		**SW6020**					**Analyst: CZ**
Calcium	814	50.0	150		mg/L	500	01/29/09 12:34 PM
Magnesium	303	50.0	150		mg/L	500	01/29/09 12:34 PM
Potassium	26.4	2.50	7.50		mg/L	25	01/29/09 03:32 PM
Sodium	3260	50.0	150		mg/L	500	01/29/09 12:34 PM
Anions by IC method - Water		**E300**					**Analyst: JBC**
Bromide	20.3	0.300	1.00		mg/L	1	01/21/09 06:08 PM
Chloride	4810	300	1000		mg/L	1000	02/02/09 11:21 AM
Sulfate	2180	1000	3000	J	mg/L	1000	02/02/09 11:21 AM
Alkalinity		**M2320 B**					**Analyst: JBC**
Alkalinity, Bicarbonate (As CaCO3)	392	10.0	20.0		mg/L	1	01/22/09 02:22 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 02:22 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 02:22 PM
Alkalinity, Total (As CaCO3)	392	10.0	20.0		mg/L	1	01/22/09 02:22 PM
Specific Conductance		**M2510 B**					**Analyst: AAD**
Specific Conductance	18100	10.0	10.0		µmhos/cm	1	01/22/09 09:30 AM
Total Dissolved Solids		**M2540C**					**Analyst: AAD**
Total Dissolved Solids (Residue, Filterable)	12700	10.0	10.0		mg/L	1	01/22/09 01:15 PM

Qualifiers:				
	*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
	B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
	C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
	DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
	E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
			S	Spike Recovery outside control limits

DHL Analytical

Date: 02/12/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-MW-9
Project:	RRC Wendkirk BMP	Lab ID:	0901115-10
Project No:	165033.0000.0000	Collection Date:	01/20/09 10:22 AM
Lab Order:	0901115	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		SW6020					Analyst: CZ
Calcium	80.4	5.00	15.0		mg/L	50	01/29/09 01:46 PM
Magnesium	38.1	5.00	15.0		mg/L	50	01/29/09 01:46 PM
Potassium	7.14	0.100	0.300		mg/L	1	01/26/09 08:53 PM
Sodium	389	5.00	15.0		mg/L	50	01/29/09 01:46 PM
Anions by IC method - Water		E300					Analyst: JBC
Bromide	0.796	0.300	1.00	J	mg/L	1	01/21/09 06:23 PM
Chloride	157	3.00	10.0		mg/L	10	02/02/09 10:51 AM
Sulfate	278	10.0	30.0		mg/L	10	02/02/09 10:51 AM
Alkalinity		M2320 B					Analyst: JBC
Alkalinity, Bicarbonate (As CaCO3)	623	10.0	20.0		mg/L	1	01/22/09 02:28 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 02:28 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 02:28 PM
Alkalinity, Total (As CaCO3)	623	10.0	20.0		mg/L	1	01/22/09 02:28 PM
Specific Conductance		M2510 B					Analyst: AAD
Specific Conductance	2070	10.0	10.0		µmhos/cm	1	01/22/09 09:30 AM
Total Dissolved Solids		M2540C					Analyst: AAD
Total Dissolved Solids (Residue, Filterable)	1400	10.0	10.0		mg/L	1	01/23/09 03:00 AM

Qualifiers:				
	*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
	B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
	C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
	DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
	E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
			S	Spike Recovery outside control limits

DHL Analytical

Date: 02/12/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-MW-14
Project:	RRC Wendkirk BMP	Lab ID:	0901115-11
Project No:	165033.0000.0000	Collection Date:	01/20/09 12:11 PM
Lab Order:	0901115	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		**SW6020**					**Analyst: CZ**
Calcium	576	10.0	30.0		mg/L	100	01/29/09 03:38 PM
Magnesium	315	10.0	30.0		mg/L	100	01/29/09 03:38 PM
Potassium	90.8	10.0	30.0		mg/L	100	01/29/09 03:38 PM
Sodium	5960	100	300		mg/L	1000	01/29/09 12:07 PM
Anions by IC method - Water		**E300**					**Analyst: JBC**
Bromide	11.1	0.300	1.00		mg/L	1	01/21/09 07:07 PM
Chloride	5240	300	1000		mg/L	1000	02/02/09 11:06 AM
Sulfate	6540	1000	3000		mg/L	1000	02/02/09 11:06 AM
Alkalinity		**M2320 B**					**Analyst: JBC**
Alkalinity, Bicarbonate (As CaCO3)	465	10.0	20.0		mg/L	1	01/22/09 02:34 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 02:34 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 02:34 PM
Alkalinity, Total (As CaCO3)	465	10.0	20.0		mg/L	1	01/22/09 02:34 PM
Specific Conductance		**M2510 B**					**Analyst: AAD**
Specific Conductance	26800	20.0	20.0		µmhos/cm	2	01/22/09 09:30 AM
Total Dissolved Solids		**M2540C**					**Analyst: AAD**
Total Dissolved Solids (Residue, Filterable)	19300	10.0	10.0		mg/L	1	01/23/09 03:00 AM

Qualifiers:				
	*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
	B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
	C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
	DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
	E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
			S	Spike Recovery outside control limits

DHL Analytical

Date: 02/12/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-MW-8
Project:	RRC Wendkirk BMP	Lab ID:	0901115-12
Project No:	165033.0000.0000	Collection Date:	01/20/09 01:10 PM
Lab Order:	0901115	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		SW6020					Analyst: CZ
Calcium	501	10.0	30.0		mg/L	100	01/29/09 03:43 PM
Magnesium	195	10.0	30.0		mg/L	100	01/29/09 03:43 PM
Potassium	82.3	10.0	30.0		mg/L	100	01/29/09 03:43 PM
Sodium	5050	100	300		mg/L	1000	01/29/09 12:12 PM
Anions by IC method - Water		E300					Analyst: JBC
Bromide	10.3	0.300	1.00		mg/L	1	01/21/09 07:21 PM
Chloride	5050	30.0	100		mg/L	100	01/22/09 01:42 PM
Sulfate	5630	100	300		mg/L	100	01/22/09 01:42 PM
Alkalinity		M2320 B					Analyst: JBC
Alkalinity, Bicarbonate (As CaCO3)	423	10.0	20.0		mg/L	1	01/22/09 02:40 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 02:40 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 02:40 PM
Alkalinity, Total (As CaCO3)	423	10.0	20.0		mg/L	1	01/22/09 02:40 PM
Specific Conductance		M2510 B					Analyst: AAD
Specific Conductance	24900	20.0	20.0		µmhos/cm	2	01/22/09 09:30 AM
Total Dissolved Solids		M2540C					Analyst: AAD
Total Dissolved Solids (Residue, Filterable)	17800	10.0	10.0		mg/L	1	01/23/09 03:00 AM

Qualifiers:				
	*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
	B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
	C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
	DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
	E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
			S	Spike Recovery outside control limits

DHL Analytical

Date: 02/12/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-MW-7
Project:	RRC Wendkirk BMP	Lab ID:	0901115-13
Project No:	165033.0000.0000	Collection Date:	01/20/09 01:48 PM
Lab Order:	0901115	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		**SW6020**					**Analyst: CZ**
Calcium	128	2.50	7.50		mg/L	25	01/29/09 03:49 PM
Magnesium	32.4	2.50	7.50		mg/L	25	01/29/09 03:49 PM
Potassium	13.6	2.50	7.50		mg/L	25	01/29/09 03:49 PM
Sodium	346	5.00	15.0		mg/L	50	01/29/09 01:51 PM
Anions by IC method - Water		**E300**					**Analyst: JBC**
Bromide	0.652	0.300	1.00	J	mg/L	1	01/21/09 08:05 PM
Chloride	202	3.00	10.0		mg/L	10	01/22/09 01:57 PM
Sulfate	575	10.0	30.0		mg/L	10	01/22/09 01:57 PM
Alkalinity		**M2320 B**					**Analyst: JBC**
Alkalinity, Bicarbonate (As CaCO3)	290	10.0	20.0		mg/L	1	01/22/09 02:44 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 02:44 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 02:44 PM
Alkalinity, Total (As CaCO3)	290	10.0	20.0		mg/L	1	01/22/09 02:44 PM
Specific Conductance		**M2510 B**					**Analyst: AAD**
Specific Conductance	2150	10.0	10.0		µmhos/cm	1	01/22/09 09:30 AM
Total Dissolved Solids		**M2540C**					**Analyst: AAD**
Total Dissolved Solids (Residue, Filterable)	1460	10.0	10.0		mg/L	1	01/23/09 03:00 AM

Qualifiers:				
	*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
	B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
	C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
	DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
	E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
			S	Spike Recovery outside control limits

DHL Analytical

Date: 02/12/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-SP-01
Project:	RRC Wendkirk BMP	Lab ID:	0901115-14
Project No:	165033.0000.0000	Collection Date:	01/20/09 02:44 PM
Lab Order:	0901115	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		SW6020					Analyst: CZ
Calcium	124	5.00	15.0		mg/L	50	01/29/09 01:57 PM
Magnesium	82.8	5.00	15.0		mg/L	50	01/29/09 01:57 PM
Potassium	23.2	5.00	15.0		mg/L	50	01/29/09 01:57 PM
Sodium	361	5.00	15.0		mg/L	50	01/29/09 01:57 PM
Anions by IC method - Water		E300					Analyst: JBC
Bromide	1.31	0.300	1.00		mg/L	1	01/21/09 08:49 PM
Chloride	462	3.00	10.0		mg/L	10	01/22/09 02:58 PM
Sulfate	443	10.0	30.0		mg/L	10	01/22/09 02:58 PM
Alkalinity		M2320 B					Analyst: JBC
Alkalinity, Bicarbonate (As CaCO3)	350	10.0	20.0		mg/L	1	01/22/09 02:49 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 02:49 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 02:49 PM
Alkalinity, Total (As CaCO3)	350	10.0	20.0		mg/L	1	01/22/09 02:49 PM
Specific Conductance		M2510 B					Analyst: AAD
Specific Conductance	2520	10.0	10.0		µmhos/cm	1	01/22/09 09:30 AM
Total Dissolved Solids		M2540C					Analyst: AAD
Total Dissolved Solids (Residue, Filterable)	1630	10.0	10.0		mg/L	1	01/23/09 03:00 AM

Qualifiers:				
	*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
	B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
	C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
	DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
	E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
			S	Spike Recovery outside control limits

DHL Analytical

Date: 02/12/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-MW-16
Project:	RRC Wendkirk BMP	Lab ID:	0901115-15
Project No:	165033.0000.0000	Collection Date:	01/20/09 03:27 PM
Lab Order:	0901115	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		SW6020					Analyst: CZ
Calcium	286	10.0	30.0		mg/L	100	01/29/09 01:24 PM
Magnesium	183	10.0	30.0		mg/L	100	01/29/09 01:24 PM
Potassium	35.0	10.0	30.0		mg/L	100	01/29/09 01:24 PM
Sodium	807	10.0	30.0		mg/L	100	01/29/09 01:24 PM
Anions by IC method - Water		E300					Analyst: JBC
Bromide	4.95	0.300	1.00		mg/L	1	01/21/09 09:04 PM
Chloride	1390	30.0	100		mg/L	100	01/22/09 06:09 PM
Sulfate	893	10.0	30.0		mg/L	10	01/22/09 03:13 PM
Alkalinity		M2320 B					Analyst: JBC
Alkalinity, Bicarbonate (As CaCO3)	286	10.0	20.0		mg/L	1	01/22/09 02:53 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 02:53 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 02:53 PM
Alkalinity, Total (As CaCO3)	286	10.0	20.0		mg/L	1	01/22/09 02:53 PM
Specific Conductance		M2510 B					Analyst: AAD
Specific Conductance	5300	10.0	10.0		µmhos/cm	1	01/22/09 09:30 AM
Total Dissolved Solids		M2540C					Analyst: AAD
Total Dissolved Solids (Residue, Filterable)	3610	10.0	10.0		mg/L	1	01/23/09 03:00 AM

Qualifiers:				
	*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
	B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
	C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
	DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
	E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
			S	Spike Recovery outside control limits

DHL Analytical

Date: 02/12/09

CLIENT:	TRC Environmental Corp.	Client Sample ID:	W-MW-4
Project:	RRC Wendkirk BMP	Lab ID:	0901115-16
Project No:	165033.0000.0000	Collection Date:	01/20/09 03:20 PM
Lab Order:	0901115	Matrix:	Aqueous

Analyses	Result	MDL	RL	Qual	Units	DF	Date Analyzed
Trace Metals: ICP-MS - Water		SW6020					Analyst: CZ
Calcium	743	50.0	150		mg/L	500	01/29/09 12:40 PM
Magnesium	395	50.0	150		mg/L	500	01/29/09 12:40 PM
Potassium	51.6	2.50	7.50		mg/L	25	01/29/09 03:54 PM
Sodium	2310	50.0	150		mg/L	500	01/29/09 12:40 PM
Anions by IC method - Water		E300					Analyst: JBC
Bromide	8.33	0.300	1.00		mg/L	1	01/21/09 09:19 PM
Chloride	4220	30.0	100		mg/L	100	01/22/09 03:28 PM
Sulfate	1830	100	300		mg/L	100	01/22/09 03:28 PM
Alkalinity		M2320 B					Analyst: JBC
Alkalinity, Bicarbonate (As CaCO3)	458	10.0	20.0		mg/L	1	01/22/09 03:06 PM
Alkalinity, Carbonate (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 03:06 PM
Alkalinity, Hydroxide (As CaCO3)	ND	10.0	20.0		mg/L	1	01/22/09 03:06 PM
Alkalinity, Total (As CaCO3)	458	10.0	20.0		mg/L	1	01/22/09 03:06 PM
Specific Conductance		M2510 B					Analyst: AAD
Specific Conductance	14500	10.0	10.0		µmhos/cm	1	01/22/09 09:30 AM
Total Dissolved Solids		M2540C					Analyst: AAD
Total Dissolved Solids (Residue, Filterable)	10100	10.0	10.0		mg/L	1	01/23/09 03:00 AM

Qualifiers:				
	*	Value exceeds TCLP Maximum Concentration Level	J	Analyte detected between MDL and RL
	B	Analyte detected in the associated Method Blank	MDL	Method Detection Limit
	C	Sample Result or QC discussed in the Case Narrative	N	Parameter not NELAC certified
	DF	Dilution Factor	ND	Not Detected at the Method Detection Limit
	E	TPH pattern not Gas or Diesel Range Pattern	RL	Reporting Limit
			S	Spike Recovery outside control limits

CLIENT: TRC Environmental Corp.
Work Order: 0901115
Project: RRC Wendkirk BMP

ANALYTICAL QC SUMMARY REPORT

RunID: ICP-MS2_090129A

Sample ID:	MB-33129	Batch ID:	33129		TestNo:		SW6020		Units:		mg/L
SampType:	MBLK	Run ID:	ICP-MS2_090129A		Analysis Date:		01/29/09 11:21 AM		Prep Date:		01/23/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Calcium		ND	0.300								
Magnesium		ND	0.300								
Potassium		ND	0.300								
Sodium		ND	0.300								

Sample ID:	LCS-33129	Batch ID:	33129		TestNo:		SW6020		Units:		mg/L
SampType:	LCS	Run ID:	ICP-MS2_090129A		Analysis Date:		01/29/09 11:27 AM		Prep Date:		01/23/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Calcium		4.80	0.300	5.00	0	96.1	80	120			
Magnesium		4.89	0.300	5.00	0	97.7	80	120			
Potassium		4.94	0.300	5.00	0	98.8	80	120			
Sodium		4.99	0.300	5.00	0	99.7	80	120			

Sample ID:	LCSD-33129	Batch ID:	33129		TestNo:		SW6020		Units:		mg/L
SampType:	LCSD	Run ID:	ICP-MS2_090129A		Analysis Date:		01/29/09 11:32 AM		Prep Date:		01/23/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Calcium		4.81	0.300	5.00	0	96.2	80	120	0.0832	15	
Magnesium		4.89	0.300	5.00	0	97.8	80	120	0.0818	15	
Potassium		4.96	0.300	5.00	0	99.2	80	120	0.384	15	
Sodium		4.97	0.300	5.00	0	99.4	80	120	0.301	15	

Sample ID:	0901115-08A SD	Batch ID:	33129		TestNo:		SW6020		Units:		mg/L
SampType:	SD	Run ID:	ICP-MS2_090129A		Analysis Date:		01/29/09 11:43 AM		Prep Date:		01/23/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Calcium		591	750	0	667				12.1	10	R
Magnesium		449	750	0	457				1.80	10	
Sodium		2530	750	0	2650				4.64	10	

Sample ID:	0901115-08A PDS	Batch ID:	33129		TestNo:		SW6020		Units:		mg/L
SampType:	PDS	Run ID:	ICP-MS2_090129A		Analysis Date:		01/29/09 11:50 AM		Prep Date:		01/23/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Calcium		3190	150	2500	667	101	75	125			
Magnesium		2920	150	2500	457	98.5	75	125			
Sodium		5080	150	2500	2650	97.1	75	125			

Sample ID:	0901115-08A MS	Batch ID:	33129		TestNo:		SW6020		Units:		mg/L
SampType:	MS	Run ID:	ICP-MS2_090129A		Analysis Date:		01/29/09 11:56 AM		Prep Date:		01/23/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Calcium		656	150	5.00	667	-210	80	120			S
Magnesium		451	150	5.00	457	-134	80	120			S
Sodium		2600	150	5.00	2650	-1010	80	120			S

Sample ID:	0901115-08A MSD	Batch ID:	33129	TestNo:	SW6020	Units:	mg/L
SampType:	MSD	Run ID:	ICP-MS2_090129A	Analysis Date:	01/29/09 12:01 PM	Prep Date:	01/23/09

Qualifiers:

B	Analyte detected in the associated Method Blank	R	RPD outside accepted control limits
DF	Dilution Factor	RL	Reporting Limit
J	Analyte detected between MDL and RL	S	Spike Recovery outside control limits
MDL	Method Detection Limit	J	Analyte detected between SDL and RL
ND	Not Detected at the Method Detection Limit	N	Parameter not NELAC certified

CLIENT: TRC Environmental Corp.
Work Order: 0901115
Project: RRC Wendkirk BMP

ANALYTICAL QC SUMMARY REPORT

RunID: ICP-MS2_090129A

Analyte	Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Calcium	666	150	5.00	667	-30.0	80	120	1.36	15	S
Magnesium	454	150	5.00	457	-72.0	80	120	0.685	15	S
Sodium	2600	150	5.00	2650	-920	80	120	0.173	15	S

Sample ID: 0901115-08A SD Batch ID: 33129 TestNo: SW6020 Units: mg/L
SampType: SD Run ID: ICP-MS2_090129A Analysis Date: 01/29/09 02:20 PM Prep Date: 01/23/09

Analyte	Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Potassium	17.6	37.5	0	18.9				6.93	10	

Sample ID: 0901115-08A PDS Batch ID: 33129 TestNo: SW6020 Units: mg/L
SampType: PDS Run ID: ICP-MS2_090129A Analysis Date: 01/29/09 02:26 PM Prep Date: 01/23/09

Analyte	Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Potassium	143	7.50	125	18.9	99.7	75	125			

Sample ID: 0901115-08A MS Batch ID: 33129 TestNo: SW6020 Units: mg/L
SampType: MS Run ID: ICP-MS2_090129A Analysis Date: 01/29/09 02:31 PM Prep Date: 01/23/09

Analyte	Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Potassium	23.6	7.50	5.00	18.9	93.8	80	120			

Sample ID: 0901115-08A MSD Batch ID: 33129 TestNo: SW6020 Units: mg/L
SampType: MSD Run ID: ICP-MS2_090129A Analysis Date: 01/29/09 02:37 PM Prep Date: 01/23/09

Analyte	Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Potassium	23.4	7.50	5.00	18.9	90.7	80	120	0.660	15	

Qualifiers:

B	Analyte detected in the associated Method Blank	R	RPD outside accepted control limits
DF	Dilution Factor	RL	Reporting Limit
J	Analyte detected between MDL and RL	S	Spike Recovery outside control limits
MDL	Method Detection Limit	J	Analyte detected between SDL and RL
ND	Not Detected at the Method Detection Limit	N	Parameter not NELAC certified

CLIENT: TRC Environmental Corp.
Work Order: 0901115
Project: RRC Wendkirk BMP

ANALYTICAL QC SUMMARY REPORT

RunID: ICP-MS2_090129A

Sample ID:	ICV1-090129	Batch ID:	R41599	TestNo:	SW6020	Units:	mg/L
SampType:	ICV	Run ID:	ICP-MS2_090129A	Analysis Date:	01/29/09 11:04 AM	Prep Date:	

Analyte	Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Calcium	2.45	0.300	2.50	0	98.0	90	110			
Magnesium	2.56	0.300	2.50	0	102	90	110			
Potassium	2.63	0.300	2.50	0	105	90	110			
Sodium	2.53	0.300	2.50	0	101	90	110			

Sample ID:	CCV1-090129	Batch ID:	R41599	TestNo:	SW6020	Units:	mg/L
SampType:	CCV	Run ID:	ICP-MS2_090129A	Analysis Date:	01/29/09 12:18 PM	Prep Date:	

Analyte	Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Calcium	5.04	0.300	5.00	0	101	90	110			
Magnesium	5.14	0.300	5.00	0	103	90	110			
Potassium	5.20	0.300	5.00	0	104	90	110			
Sodium	5.22	0.300	5.00	0	104	90	110			

Sample ID:	CCV2-090129	Batch ID:	R41599	TestNo:	SW6020	Units:	mg/L
SampType:	CCV	Run ID:	ICP-MS2_090129A	Analysis Date:	01/29/09 01:29 PM	Prep Date:	

Analyte	Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Calcium	4.96	0.300	5.00	0	99.2	90	110			
Magnesium	5.02	0.300	5.00	0	100	90	110			
Potassium	5.18	0.300	5.00	0	104	90	110			
Sodium	5.06	0.300	5.00	0	101	90	110			

Sample ID:	CCV3-090129	Batch ID:	R41599	TestNo:	SW6020	Units:	mg/L
SampType:	CCV	Run ID:	ICP-MS2_090129A	Analysis Date:	01/29/09 02:03 PM	Prep Date:	

Analyte	Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Calcium	4.92	0.300	5.00	0	98.5	90	110			
Magnesium	4.92	0.300	5.00	0	98.4	90	110			
Potassium	5.11	0.300	5.00	0	102	90	110			
Sodium	4.99	0.300	5.00	0	99.8	90	110			

Sample ID:	CCV4-090129	Batch ID:	R41599	TestNo:	SW6020	Units:	mg/L
SampType:	CCV	Run ID:	ICP-MS2_090129A	Analysis Date:	01/29/09 03:09 PM	Prep Date:	

Analyte	Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Calcium	4.87	0.300	5.00	0	97.4	90	110			
Magnesium	4.95	0.300	5.00	0	99.0	90	110			
Potassium	5.10	0.300	5.00	0	102	90	110			

Sample ID:	CCV5-090129	Batch ID:	R41599	TestNo:	SW6020	Units:	mg/L
SampType:	CCV	Run ID:	ICP-MS2_090129A	Analysis Date:	01/29/09 04:00 PM	Prep Date:	

Analyte	Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Calcium	4.86	0.300	5.00	0	97.1	90	110			
Magnesium	4.91	0.300	5.00	0	98.2	90	110			
Potassium	5.08	0.300	5.00	0	102	90	110			

Qualifiers:

B	Analyte detected in the associated Method Blank	R	RPD outside accepted control limits
DF	Dilution Factor	RL	Reporting Limit
J	Analyte detected between MDL and RL	S	Spike Recovery outside control limits
MDL	Method Detection Limit	J	Analyte detected between SDL and RL
ND	Not Detected at the Method Detection Limit	N	Parameter not NELAC certified

CLIENT: TRC Environmental Corp.
Work Order: 0901115
Project: RRC Wendkirk BMP

ANALYTICAL QC SUMMARY REPORT

RunID: ICP-MS3_090126A

Sample ID:	ICV1-090126	Batch ID:	R41568		TestNo:		SW6020		Units:		mg/L
SampType:	ICV	Run ID:	ICP-MS3_090126A		Analysis Date:		01/26/09 03:07 PM		Prep Date:		
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Potassium		2.56	0.300	2.50	0	102	90	110			

Sample ID:	CCV5-090126	Batch ID:	R41568		TestNo:		SW6020		Units:		mg/L
SampType:	CCV	Run ID:	ICP-MS3_090126A		Analysis Date:		01/26/09 08:08 PM		Prep Date:		
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Potassium		5.01	0.300	5.00	0	100	90	110			

Sample ID:	CCV6-091026	Batch ID:	R41568		TestNo:		SW6020		Units:		mg/L
SampType:	CCV	Run ID:	ICP-MS3_090126A		Analysis Date:		01/26/09 09:34 PM		Prep Date:		
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Potassium		5.16	0.300	5.00	0	103	90	110			

Qualifiers:

B	Analyte detected in the associated Method Blank	R	RPD outside accepted control limits
DF	Dilution Factor	RL	Reporting Limit
J	Analyte detected between MDL and RL	S	Spike Recovery outside control limits
MDL	Method Detection Limit	J	Analyte detected between SDL and RL
ND	Not Detected at the Method Detection Limit	N	Parameter not NELAC certified

CLIENT: TRC Environmental Corp.
Work Order: 0901115
Project: RRC Wendkirk BMP

ANALYTICAL QC SUMMARY REPORT

RunID: IC2_090121A

Sample ID:	LCS-33097	Batch ID:	33097		TestNo:		E300		Units:		mg/L
SampType:	LCS	Run ID:	IC2_090121A		Analysis Date:		01/21/09 11:57 AM		Prep Date:		01/21/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		18.7	1.00	20.00	0	93.4	90	110			

Sample ID:	MB-33097	Batch ID:	33097		TestNo:		E300		Units:		mg/L
SampType:	MBLK	Run ID:	IC2_090121A		Analysis Date:		01/21/09 12:26 PM		Prep Date:		01/21/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		ND	1.00								

Sample ID:	LCSD-33097	Batch ID:	33097		TestNo:		E300		Units:		mg/L
SampType:	LCSD	Run ID:	IC2_090121A		Analysis Date:		01/21/09 12:42 PM		Prep Date:		01/21/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		18.5	1.00	20.00	0	92.4	90	110	1.02	20	

Sample ID:	0901115-10B MS	Batch ID:	33097		TestNo:		E300		Units:		mg/L
SampType:	MS	Run ID:	IC2_090121A		Analysis Date:		01/21/09 06:37 PM		Prep Date:		01/21/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		18.8	1.00	20.00	0.4700	91.7	90	110			

Sample ID:	0901115-10B MSD	Batch ID:	33097		TestNo:		E300		Units:		mg/L
SampType:	MSD	Run ID:	IC2_090121A		Analysis Date:		01/21/09 06:52 PM		Prep Date:		01/21/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		18.8	1.00	20.00	0.4700	91.9	90	110	0.200	20	

Sample ID:	CCV2-090121	Batch ID:	33097		TestNo:		E300		Units:		mg/L
SampType:	CCV	Run ID:	IC2_090121A		Analysis Date:		01/21/09 07:51 PM		Prep Date:		01/21/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		18.8	1.00	20.00	0	94.0	90	110			

Sample ID:	0901115-13B MS	Batch ID:	33097		TestNo:		E300		Units:		mg/L
SampType:	MS	Run ID:	IC2_090121A		Analysis Date:		01/21/09 08:20 PM		Prep Date:		01/21/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		18.5	1.00	20.00	0.3900	90.6	90	110			

Sample ID:	0901115-13B MSD	Batch ID:	33097		TestNo:		E300		Units:		mg/L
SampType:	MSD	Run ID:	IC2_090121A		Analysis Date:		01/21/09 08:35 PM		Prep Date:		01/21/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		18.6	1.00	20.00	0.3900	91.1	90	110	0.525	20	

Qualifiers:				
	B	Analyte detected in the associated Method Blank	R	RPD outside accepted control limits
	DF	Dilution Factor	RL	Reporting Limit
	J	Analyte detected between MDL and RL	S	Spike Recovery outside control limits
	MDL	Method Detection Limit	J	Analyte detected between SDL and RL
	ND	Not Detected at the Method Detection Limit	N	Parameter not NELAC certified

CLIENT: TRC Environmental Corp.
Work Order: 0901115
Project: RRC Wendkirk BMP

ANALYTICAL QC SUMMARY REPORT

RunID: IC2_090121A

Sample ID:	ICV-090122	Batch ID:	R41492		TestNo:		E300			Units:	mg/L
SampType:	ICV	Run ID:	IC2_090121A		Analysis Date:		01/21/09 11:27 AM			Prep Date:	01/21/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		48.9	1.00	50.00	0	97.9	90	110			

Sample ID:	CCV1-090121	Batch ID:	R41492		TestNo:		E300			Units:	mg/L
SampType:	CCV	Run ID:	IC2_090121A		Analysis Date:		01/21/09 04:46 PM			Prep Date:	01/21/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		18.7	1.00	20.00	0	93.7	90	110			

Sample ID:	CCV3-090121	Batch ID:	R41492		TestNo:		E300			Units:	mg/L
SampType:	CCV	Run ID:	IC2_090121A		Analysis Date:		01/21/09 09:48 PM			Prep Date:	01/21/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		18.7	1.00	20.00	0	93.6	90	110			

Qualifiers:				
	B	Analyte detected in the associated Method Blank	R	RPD outside accepted control limits
	DF	Dilution Factor	RL	Reporting Limit
	J	Analyte detected between MDL and RL	S	Spike Recovery outside control limits
	MDL	Method Detection Limit	J	Analyte detected between SDL and RL
	ND	Not Detected at the Method Detection Limit	N	Parameter not NELAC certified

CLIENT: TRC Environmental Corp.
Work Order: 0901115
Project: RRC Wendkirk BMP

ANALYTICAL QC SUMMARY REPORT

RunID: IC2_090122A

Sample ID:	LCS-33097	Batch ID:	33097		TestNo:		E300		Units:		mg/L
SampType:	LCS	Run ID:	IC2_090122A		Analysis Date:		01/22/09 09:15 AM		Prep Date:		01/21/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Chloride		9.29	1.00	10.00	0	92.9	90	110			
Sulfate		28.5	3.00	30.00	0	94.9	90	110			

Sample ID:	LCSD-33097	Batch ID:	33097		TestNo:		E300		Units:		mg/L
SampType:	LCSD	Run ID:	IC2_090122A		Analysis Date:		01/22/09 09:29 AM		Prep Date:		01/21/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Chloride		9.24	1.00	10.00	0	92.4	90	110	0.552	20	
Sulfate		28.4	3.00	30.00	0	94.7	90	110	0.204	20	

Sample ID:	MB-33097	Batch ID:	33097		TestNo:		E300		Units:		mg/L
SampType:	MBLK	Run ID:	IC2_090122A		Analysis Date:		01/22/09 09:44 AM		Prep Date:		01/21/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Chloride		ND	1.00								
Sulfate		ND	3.00								

Sample ID:	0901115-10B MS	Batch ID:	33097		TestNo:		E300		Units:		mg/L
SampType:	MS	Run ID:	IC2_090122A		Analysis Date:		01/22/09 12:58 PM		Prep Date:		01/21/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Chloride		192	10.0	100.0	97.82	94.1	90	110			
Sulfate		457	30.0	300.0	170.5	95.4	90	110			

Sample ID:	0901115-10B MSD	Batch ID:	33097		TestNo:		E300		Units:		mg/L
SampType:	MSD	Run ID:	IC2_090122A		Analysis Date:		01/22/09 01:13 PM		Prep Date:		01/21/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Chloride		192	10.0	100.0	97.82	94.1	90	110	0.0287	20	
Sulfate		456	30.0	300.0	170.5	95.1	90	110	0.204	20	

Sample ID:	0901115-13B MS	Batch ID:	33097		TestNo:		E300		Units:		mg/L
SampType:	MS	Run ID:	IC2_090122A		Analysis Date:		01/22/09 02:11 PM		Prep Date:		01/21/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Chloride		219	10.0	100.0	121.1	97.5	90	110			
Sulfate		642	30.0	300.0	345.0	98.9	90	110			

Sample ID:	0901115-13B MSD	Batch ID:	33097		TestNo:		E300		Units:		mg/L
SampType:	MSD	Run ID:	IC2_090122A		Analysis Date:		01/22/09 02:26 PM		Prep Date:		01/21/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Chloride		219	10.0	100.0	121.1	98.3	90	110	0.329	20	
Sulfate		641	30.0	300.0	345.0	98.8	90	110	0.0637	20	

Qualifiers:

B	Analyte detected in the associated Method Blank	R	RPD outside accepted control limits
DF	Dilution Factor	RL	Reporting Limit
J	Analyte detected between MDL and RL	S	Spike Recovery outside control limits
MDL	Method Detection Limit	J	Analyte detected between SDL and RL
ND	Not Detected at the Method Detection Limit	N	Parameter not NELAC certified

CLIENT: TRC Environmental Corp.
Work Order: 0901115
Project: RRC Wendkirk BMP

ANALYTICAL QC SUMMARY REPORT

RunID: IC2_090122A

Sample ID:	ICV-090122	Batch ID:	R41503		TestNo:		E300		Units:		mg/L
SampType:	ICV	Run ID:	IC2_090122A		Analysis Date:		01/22/09 08:54 AM		Prep Date:		01/22/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Chloride		24.5	1.00	25.00	0	97.8	90	110			
Sulfate		74.0	3.00	75.00	0	98.7	90	110			

Sample ID:	CCV1-090122	Batch ID:	R41503		TestNo:		E300		Units:		mg/L
SampType:	CCV	Run ID:	IC2_090122A		Analysis Date:		01/22/09 11:41 AM		Prep Date:		01/22/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Chloride		9.13	1.00	10.00	0	91.3	90	110			
Sulfate		27.9	3.00	30.00	0	92.9	90	110			

Sample ID:	CCV2-090122	Batch ID:	R41503		TestNo:		E300		Units:		mg/L
SampType:	CCV	Run ID:	IC2_090122A		Analysis Date:		01/22/09 02:41 PM		Prep Date:		01/22/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Chloride		9.20	1.00	10.00	0	92.0	90	110			
Sulfate		28.3	3.00	30.00	0	94.4	90	110			

Sample ID:	CCV3-090122	Batch ID:	R41503		TestNo:		E300		Units:		mg/L
SampType:	CCV	Run ID:	IC2_090122A		Analysis Date:		01/22/09 05:25 PM		Prep Date:		01/21/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Chloride		9.25	1.00	10.00	0	92.5	90	110			
Sulfate		28.5	3.00	30.00	0	95.1	90	110			

Sample ID:	CCV4-090122	Batch ID:	R41503		TestNo:		E300		Units:		mg/L
SampType:	CCV	Run ID:	IC2_090122A		Analysis Date:		01/22/09 06:24 PM		Prep Date:		01/22/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Chloride		9.27	1.00	10.00	0	92.7	90	110			

Qualifiers:				
	B	Analyte detected in the associated Method Blank	R	RPD outside accepted control limits
	DF	Dilution Factor	RL	Reporting Limit
	J	Analyte detected between MDL and RL	S	Spike Recovery outside control limits
	MDL	Method Detection Limit	J	Analyte detected between SDL and RL
	ND	Not Detected at the Method Detection Limit	N	Parameter not NELAC certified

CLIENT: TRC Environmental Corp.
Work Order: 0901115
Project: RRC Wendkirk BMP

ANALYTICAL QC SUMMARY REPORT

RunID: IC2_090202A

Sample ID:	ICV-090202	Batch ID:	R41641		TestNo:		E300		Units:		mg/L
SampType:	ICV	Run ID:	IC2_090202A		Analysis Date:		02/02/09 09:11 AM		Prep Date:		02/02/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		50.1	1.00	50.00	0	100	90	110			
Chloride		24.9	1.00	25.00	0	99.5	90	110			
Sulfate		75.5	3.00	75.00	0	101	90	110			

Sample ID:	CCV1-090202	Batch ID:	R41641		TestNo:		E300		Units:		mg/L
SampType:	CCV	Run ID:	IC2_090202A		Analysis Date:		02/02/09 12:33 PM		Prep Date:		02/02/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Bromide		19.3	1.00	20.00	0	96.7	90	110			
Chloride		9.49	1.00	10.00	0	94.9	90	110			
Sulfate		29.0	3.00	30.00	0	96.7	90	110			

Qualifiers:				
	B	Analyte detected in the associated Method Blank	R	RPD outside accepted control limits
	DF	Dilution Factor	RL	Reporting Limit
	J	Analyte detected between MDL and RL	S	Spike Recovery outside control limits
	MDL	Method Detection Limit	J	Analyte detected between SDL and RL
	ND	Not Detected at the Method Detection Limit	N	Parameter not NELAC certified

CLIENT: TRC Environmental Corp.
Work Order: 0901115
Project: RRC Wendkirk BMP

ANALYTICAL QC SUMMARY REPORT

RunID: TITRATOR_090122A

Sample ID:	MB-33121	Batch ID:	33121		TestNo:		M2320 B		Units:		mg/L
SampType:	MBLK	Run ID:	TITRATOR_090122A		Analysis Date:		01/22/09 01:31 PM		Prep Date:		01/22/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Alkalinity, Bicarbonate (As CaCO3)		ND	20.0								
Alkalinity, Carbonate (As CaCO3)		ND	20.0								
Alkalinity, Hydroxide (As CaCO3)		ND	20.0								
Alkalinity, Total (As CaCO3)		ND	20.0								

Sample ID:	LCS-33121	Batch ID:	33121		TestNo:		M2320 B		Units:		mg/L
SampType:	LCS	Run ID:	TITRATOR_090122A		Analysis Date:		01/22/09 01:35 PM		Prep Date:		01/22/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Alkalinity, Total (As CaCO3)		54.9	20.0	50.00	0	110	74	129			

Sample ID:	0901079-01H DUP	Batch ID:	33121		TestNo:		M2320 B		Units:		mg/L
SampType:	DUP	Run ID:	TITRATOR_090122A		Analysis Date:		01/22/09 01:46 PM		Prep Date:		01/22/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Alkalinity, Bicarbonate (As CaCO3)		310	20.0	0	311.9				0.708	20	
Alkalinity, Carbonate (As CaCO3)		0	20.0	0	0				0	20	
Alkalinity, Hydroxide (As CaCO3)		0	20.0	0	0				0	20	
Alkalinity, Total (As CaCO3)		310	20.0	0	311.9				0.708	20	

Sample ID:	0901115-16C DUP	Batch ID:	33121		TestNo:		M2320 B		Units:		mg/L
SampType:	DUP	Run ID:	TITRATOR_090122A		Analysis Date:		01/22/09 03:12 PM		Prep Date:		01/22/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Alkalinity, Bicarbonate (As CaCO3)		456	20.0	0	457.8				0.306	20	
Alkalinity, Carbonate (As CaCO3)		0	20.0	0	0				0	20	
Alkalinity, Hydroxide (As CaCO3)		0	20.0	0	0				0	20	
Alkalinity, Total (As CaCO3)		456	20.0	0	457.8				0.306	20	

Qualifiers:				
	B	Analyte detected in the associated Method Blank	R	RPD outside accepted control limits
	DF	Dilution Factor	RL	Reporting Limit
	J	Analyte detected between MDL and RL	S	Spike Recovery outside control limits
	MDL	Method Detection Limit	J	Analyte detected between SDL and RL
	ND	Not Detected at the Method Detection Limit	N	Parameter not NELAC certified

CLIENT: TRC Environmental Corp.
Work Order: 0901115
Project: RRC Wendkirk BMP

ANALYTICAL QC SUMMARY REPORT

RunID: TITRATOR_090122A

Sample ID:	ICV-090122	Batch ID:	R41508		TestNo:		M2320 B		Units:		mg/L
SampType:	ICV	Run ID:	TITRATOR_090122A		Analysis Date:		01/22/09 01:29 PM		Prep Date:		01/22/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Alkalinity, Bicarbonate (As CaCO3)		8.16	20.0	0							
Alkalinity, Carbonate (As CaCO3)		93.6	20.0	0							
Alkalinity, Hydroxide (As CaCO3)		0	20.0	0							
Alkalinity, Total (As CaCO3)		102	20.0	100.0	0	102	98	102			

Sample ID:	CCV1-090122	Batch ID:	R41508		TestNo:		M2320 B		Units:		mg/L
SampType:	CCV	Run ID:	TITRATOR_090122A		Analysis Date:		01/22/09 02:07 PM		Prep Date:		01/22/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Alkalinity, Bicarbonate (As CaCO3)		10.2	20.0	0							
Alkalinity, Carbonate (As CaCO3)		92.5	20.0	0							
Alkalinity, Hydroxide (As CaCO3)		0	20.0	0							
Alkalinity, Total (As CaCO3)		103	20.0	100.0	0	103	90	110			

Sample ID:	CCV2-090122	Batch ID:	R41508		TestNo:		M2320 B		Units:		mg/L
SampType:	CCV	Run ID:	TITRATOR_090122A		Analysis Date:		01/22/09 02:59 PM		Prep Date:		01/22/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Alkalinity, Bicarbonate (As CaCO3)		15.3	20.0	0							
Alkalinity, Carbonate (As CaCO3)		87.8	20.0	0							
Alkalinity, Hydroxide (As CaCO3)		0	20.0	0							
Alkalinity, Total (As CaCO3)		103	20.0	100.0	0	103	90	110			

Sample ID:	CCV3-090122	Batch ID:	R41508		TestNo:		M2320 B		Units:		mg/L
SampType:	CCV	Run ID:	TITRATOR_090122A		Analysis Date:		01/22/09 03:17 PM		Prep Date:		01/22/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Alkalinity, Bicarbonate (As CaCO3)		10.5	20.0	0							
Alkalinity, Carbonate (As CaCO3)		91.4	20.0	0							
Alkalinity, Hydroxide (As CaCO3)		0	20.0	0							
Alkalinity, Total (As CaCO3)		102	20.0	100.0	0	102	90	110			

Qualifiers:				
	B	Analyte detected in the associated Method Blank	R	RPD outside accepted control limits
	DF	Dilution Factor	RL	Reporting Limit
	J	Analyte detected between MDL and RL	S	Spike Recovery outside control limits
	MDL	Method Detection Limit	J	Analyte detected between SDL and RL
	ND	Not Detected at the Method Detection Limit	N	Parameter not NELAC certified

CLIENT: TRC Environmental Corp.
Work Order: 0901115
Project: RRC Wendkirk BMP

ANALYTICAL QC SUMMARY REPORT

RunID: WC_090122A

Sample ID:	MB-33107	Batch ID:	33107		TestNo:		M2510 B		Units:		µmhos/cm
SampType:	MBLK	Run ID:	WC_090122A		Analysis Date:		01/22/09 09:30 AM		Prep Date:		01/22/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Specific Conductance		ND	10.0								

Sample ID:	LCS-33107	Batch ID:	33107		TestNo:		M2510 B		Units:		µmhos/cm
SampType:	LCS	Run ID:	WC_090122A		Analysis Date:		01/22/09 09:30 AM		Prep Date:		01/22/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Specific Conductance		1370	10.0	1413	0	96.9	95	105			

Sample ID:	0901115-08C-DUP	Batch ID:	33107		TestNo:		M2510 B		Units:		µmhos/cm
SampType:	DUP	Run ID:	WC_090122A		Analysis Date:		01/22/09 09:30 AM		Prep Date:		01/22/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Specific Conductance		16600	10.0	0	16410				1.09	2	

Sample ID:	0901115-15C-DUP	Batch ID:	33107		TestNo:		M2510 B		Units:		µmhos/cm
SampType:	DUP	Run ID:	WC_090122A		Analysis Date:		01/22/09 09:30 AM		Prep Date:		01/22/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Specific Conductance		5270	10.0	0	5300				0.568	2	

Qualifiers:				
	B	Analyte detected in the associated Method Blank	R	RPD outside accepted control limits
	DF	Dilution Factor	RL	Reporting Limit
	J	Analyte detected between MDL and RL	S	Spike Recovery outside control limits
	MDL	Method Detection Limit	J	Analyte detected between SDL and RL
	ND	Not Detected at the Method Detection Limit	N	Parameter not NELAC certified

CLIENT: TRC Environmental Corp.
Work Order: 0901115
Project: RRC Wendkirk BMP

ANALYTICAL QC SUMMARY REPORT

RunID: WC_090122A

Sample ID:	ICV-090122	Batch ID:	CONDW-01/22/09	TestNo:		M2510 B			Units:	µmhos/cm	
SampType:	ICV	Run ID:	WC_090122A	Analysis Date:		01/22/09 09:30 AM			Prep Date:	01/22/09	
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Specific Conductance		12800	10.0	12880	0	99.5	95	105			

Sample ID:	CCV1-090122	Batch ID:	CONDW-01/22/09	TestNo:		M2510 B			Units:	µmhos/cm	
SampType:	CCV	Run ID:	WC_090122A	Analysis Date:		01/22/09 09:30 AM			Prep Date:	01/22/09	
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Specific Conductance		12700	10.0	12880	0	98.4	95	105			

Sample ID:	CCV2-090122	Batch ID:	CONDW-01/22/09	TestNo:		M2510 B			Units:	µmhos/cm	
SampType:	CCV	Run ID:	WC_090122A	Analysis Date:		01/22/09 09:30 AM			Prep Date:	01/22/09	
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Specific Conductance		12500	10.0	12880	0	97.4	95	105			

Sample ID:	CCV3-090122	Batch ID:	CONDW-01/22/09	TestNo:		M2510 B			Units:	µmhos/cm	
SampType:	CCV	Run ID:	WC_090122A	Analysis Date:		01/22/09 09:30 AM			Prep Date:	01/22/09	
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Specific Conductance		12500	10.0	12880	0	96.7	95	105			

Sample ID:	CCV4-090122	Batch ID:	CONDW-01/22/09	TestNo:		M2510 B			Units:	µmhos/cm	
SampType:	CCV	Run ID:	WC_090122A	Analysis Date:		01/22/09 09:30 AM			Prep Date:	01/22/09	
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Specific Conductance		12300	10.0	12880	0	95.6	95	105			

Qualifiers:

B	Analyte detected in the associated Method Blank	R	RPD outside accepted control limits
DF	Dilution Factor	RL	Reporting Limit
J	Analyte detected between MDL and RL	S	Spike Recovery outside control limits
MDL	Method Detection Limit	J	Analyte detected between SDL and RL
ND	Not Detected at the Method Detection Limit	N	Parameter not NELAC certified

CLIENT: TRC Environmental Corp.
Work Order: 0901115
Project: RRC Wendkirk BMP

ANALYTICAL QC SUMMARY REPORT

RunID: WC_090122B

Sample ID:	MB-33116	Batch ID:	33116		TestNo:		M2540C		Units:		mg/L
SampType:	MBLK	Run ID:	WC_090122B		Analysis Date:		01/22/09 01:15 PM		Prep Date:		01/22/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Total Dissolved Solids (Residue, Fi		ND	10.0								

Sample ID:	LCS-33116	Batch ID:	33116		TestNo:		M2540C		Units:		mg/L
SampType:	LCS	Run ID:	WC_090122B		Analysis Date:		01/22/09 01:15 PM		Prep Date:		01/22/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Total Dissolved Solids (Residue, Fi		787	10.0	745.6	0	106	90	113			

Sample ID:	0901115-09C-DUP	Batch ID:	33116		TestNo:		M2540C		Units:		mg/L
SampType:	DUP	Run ID:	WC_090122B		Analysis Date:		01/22/09 01:15 PM		Prep Date:		01/22/09
Analyte		Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Total Dissolved Solids (Residue, Fi		12300	10.0	0	12690				3.49	5	

Qualifiers:				
	B	Analyte detected in the associated Method Blank	R	RPD outside accepted control limits
	DF	Dilution Factor	RL	Reporting Limit
	J	Analyte detected between MDL and RL	S	Spike Recovery outside control limits
	MDL	Method Detection Limit	J	Analyte detected between SDL and RL
	ND	Not Detected at the Method Detection Limit	N	Parameter not NELAC certified

CLIENT: TRC Environmental Corp.
Work Order: 0901115
Project: RRC Wendkirk BMP

ANALYTICAL QC SUMMARY REPORT

RunID: WC_090123B

Sample ID:	MB-33143	Batch ID:	33143	TestNo:	M2540C	Units:	mg/L
SampType:	MBLK	Run ID:	WC_090123B	Analysis Date:	01/23/09 03:00 AM	Prep Date:	01/23/09

Analyte	Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Total Dissolved Solids (Residue, Fi	ND	10.0								

Sample ID:	LCS-33143	Batch ID:	33143	TestNo:	M2540C	Units:	mg/L
SampType:	LCS	Run ID:	WC_090123B	Analysis Date:	01/23/09 03:00 AM	Prep Date:	01/23/09

Analyte	Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Total Dissolved Solids (Residue, Fi	736	10.0	745.6	0	98.7	90	113			

Sample ID:	0901115-16C-DUP	Batch ID:	33143	TestNo:	M2540C	Units:	mg/L
SampType:	DUP	Run ID:	WC_090123B	Analysis Date:	01/23/09 03:00 AM	Prep Date:	01/23/09

Analyte	Result	RL	SPK value	Ref Val	%REC	LowLimit	HighLimit	%RPD	RPD Limit	Qual
Total Dissolved Solids (Residue, Fi	10100	10.0	0	10060				0.149	5	

Qualifiers:

B	Analyte detected in the associated Method Blank	R	RPD outside accepted control limits
DF	Dilution Factor	RL	Reporting Limit
J	Analyte detected between MDL and RL	S	Spike Recovery outside control limits
MDL	Method Detection Limit	J	Analyte detected between SDL and RL
ND	Not Detected at the Method Detection Limit	N	Parameter not NELAC certified

ATTACHMENT 3

PRECIPIATION DATA

JAN	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	ANNUAL
1977	0.61	0.26	0.99	5.10	2.14	0.47	0.52	0.38	0.27	1.38	0.68	0.15	12.95
1978	0.61	1.17	0.41	0.73	1.83	2.81	0.41	2.93	1.35	0.42	1.75	0.25	14.67
1979	0.19	1.83	2.25	1.90	0.67	2.15	1.30	2.18	0.06	0.93	T	2.70	16.16
1980	0.84	0.79	0.71	0.52	4.72	3.14	0.33	3.30	11.00	0.01	2.53	2.20	30.09
1981	1.17	0.68	2.81	3.51	4.70	1.97	2.68	1.23	2.72	8.86	T	0.02	30.17
1982	1.06	1.53	0.40	0.83	4.17	6.01	0.35	0.46	0.09	1.26	1.11	0.91	18.18
1983	2.06	0.42	1.20	0.81	0.52	3.72	1.18	0.03	T	3.47	1.78	0.07	15.26
1984	2.38	0.54	0.49	0.23	0.54	2.82	0.60	0.26	2.99	3.74	1.09	3.48	19.14
1985	0.67	0.38	1.69	0.42	4.78	3.55	1.13	0.24	2.84	5.64	0.48	0.01	21.83
1986	0.30	0.65	0.52	0.07	7.28	3.30	0.74	2.50	7.53	5.72	1.83	2.48	32.93
1987	0.65	4.45	1.77	1.33	11.24	3.28	0.22	1.91	3.96	0.34	0.80	2.05	31.90
1988	0.01	0.42	0.69	1.36	3.31	2.14	1.22	0.92	3.20	T	0.00	0.79	14.06
1989	0.68	3.01	1.95	1.04	1.06	2.83	0.35	2.78	2.82	0.41	0.43	0.23	17.64
1990	1.60	1.65	0.85	4.14	4.02	0.05	4.09	1.05	6.23	2.40	2.51	0.21	27.20
1991	2.08	0.26	0.61	0.48	1.15	4.22	1.80	1.36	1.36	4.77	3.34	0.24	24.29
1992	1.90	3.79	1.05	1.00	1.49	4.73	1.98	1.78	0.27	1.33	0.95	0.75	21.03
1993	0.94	0.81	0.28	1.46	3.87	0.94	0.82	2.64	1.99	1.07	0.05	0.76	15.63
1994	1.69	0.34	0.04	0.97	3.29	1.04	0.25	1.30	3.04	4.27	1.96	1.21	19.40
1995	0.31	2.81	1.01	2.67	4.39	1.37	0.17	2.41	2.27	1.86	1.68	0.20	21.15
1996	0.06	0.23	0.28	2.38	2.08	1.81	0.26	7.66	1.92	2.42	3.35	0.05	22.50
1997	0.37	4.54	2.69	2.50	2.69	2.57	0.74	2.76	1.56	0.82	0.76	1.38	23.38
1998	0.70	0.53	1.85	T	1.75	0.88	0.46	2.77	0.10	2.39	1.06	0.49	12.98
1999	0.61	0.01	2.32	1.85	1.55	4.70	0.66	0.03	0.76	0.94	T	0.09	13.52
2000	0.08	0.23	0.77	0.57	2.21	3.44	0.02	0.00	0.58	3.61	3.08	0.60	15.19
2001	1.29	2.17	1.26	0.82	2.52	0.26	0.57	3.67	0.89	1.48	3.46	0.14	18.53
2002	0.32	1.10	1.31	0.33	0.45	0.88	2.02	0.41	1.64	4.06	0.52	1.37	14.41
2003	0.33	1.57	1.25	0.06	1.07	4.78	0.90	2.52	3.16	3.38	0.74	T	19.76
2004	1.37	1.72	1.70	1.91	0.86	3.65	2.18	4.32	2.05	5.16	5.18	0.38	30.48
2005	0.55	2.03	2.81	0.03	4.43	0.98	1.15	4.66	0.02	3.72	0.00	0.02	20.40
2006	0.16	0.64	1.92	1.34	1.90	0.30	0.87	4.87	2.60	2.21	0.01	0.83	17.65
2007	1.86	0.55	3.86	2.66	4.74	5.54	1.84	6.55	2.55	0.83	0.89	0.18	32.05
2008	0.39	0.30	4.64	0.62	1.01	2.19	0.19	3.59	3.99	1.81	0.23	0.04	19.00
2009	0.06												

	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	ANNUAL
Normal	0.82	1.18	0.99	1.60	3.09	2.52	1.10	2.05	2.95	2.57	1.10	0.94	20.91

* Incomplete Record
# First Order Station November 1, 1947
Normals Based on Period 1971-2000

ATTACHMENT 4

ANALYTICAL DATA REVIEW/DATA VALIDATION CHECKLIST

QA Data Evaluation Results
RRC – Wendkirk BMP

January 2009 Analytical Data

Background

Water samples were collected on January 19, 20, 21, and 22, 2009. The samples were submitted to DHL Analytical in Round Rock, Texas for analysis. Results for the following methods are reported:

- Bromide, Chloride, and Sulfate by U.S. EPA Method 300.0
- Alkalinity by SM 2320 B
- Specific Conductance by SM 2510 B
- Total Dissolved Solids (TDS) by SM 2540 C
- Calcium, Magnesium, Potassium, and Sodium by SW846 Method 6020

TRC QA staff performed a review of quality control (QC) data associated with the samples to ensure that the reported analytical results are valid, accurate, and sufficient to meet quality objectives. Data were reviewed for compliance with the requirements given in *Investigations and Abatement of Produced Water Impacts and Seeps to Surface Water in the Upper Colorado River Basin Downstream of Spence Reservoir (Segment 1426) Quality Assurance Project Plan* (Railroad Commission of Texas, Oil and Gas Division, Revision 2, March 7, 2008)(the QAPP). Items reviewed during the data validation process included sample integrity, blank analyses, spike recoveries, and duplicate recoveries. Samples reviewed to prepare this evaluation are presented in Table 1.

The following is a discussion of the QC analyses performed with the site samples and any potential data limitations associated with the results of analyses.

Sample Integrity

All samples were adequately preserved and arrived at the laboratory in good condition. All preparatory steps were performed within method-defined holding times. All samples were analyzed within method-defined holding times.

Blank Analyses

Target analytes were not detected in reported method blanks indicating that laboratory contamination did not impact analytical results.

Sodium (0.112 mg/L) and TDS (19.0 mg/L) were detected in the equipment rinsate blank identified as W-EB-1. No data interpretation issues are indicated for these detections since reported concentrations of sodium and TDS in all associated samples are more than ten times the equipment blank concentration.

Spike Recoveries

All reported LCS recoveries fall within QAPP-derived QC limits. These results are indicative adequate laboratory measurement control in the absence of potential matrix interferences at the time of sample analyses.

Sample W-SG-4314102-D1 was analyzed as MS/MSD pairs for calcium, magnesium, sodium, and potassium. Both recoveries of potassium fall within QAPP-specified limits indicating that potential matrix interferences with potassium accuracy are minimal. Recoveries of calcium, magnesium, and sodium are all less than QAPP-specified control limits. No data interpretation issues are indicated since detected concentrations of calcium, magnesium, and sodium in the un-spiked analysis of sample W-SG-4314102-D1 are more than 90 times the spiking concentration used to generate MS/MSD analyses.

Samples W-MW-9, W-MW-7, W-MW-20, and W-MW-3 were analyzed as MS/MSD pairs for bromide, chloride, and sulfate. All recoveries are within QAPP-defined limits and no data interpretation issues are indicated by these results.

Sample W-MW-10 was analyzed as MS/MSD pairs for calcium, magnesium, and sodium. All recoveries are all less than QAPP-specified control limits. No data interpretation issues are indicated since detected concentrations in the un-spiked analysis of sample W-MW-10 are more than 70 times the spiking concentration used to generate MS/MSD analyses.

Duplicate Sample Analyses

All reported RPD values for LCS/LCSD pairs are within laboratory-derived limits indicating that the laboratory achieved adequate precision in the absence of potential matrix interferences at the time of sample analysis.

RPD values associated with MS/MSD analyses are within laboratory-specified limits indicating that the sample matrix has minimal impact, if any, on analytical precision.

Sample W-RS-14-D was collected as a field duplicate of sample W-RS-14. Calculated RPD values for detected analytes in these analyses are presented in Table 2. Adequate precision is exhibited for all detected analytes and data interpretation issues are not indicated.

Sample W-MW-18-D was collected as a field duplicate of sample W-MW-18. Calculated RPD values for detected analytes in these analyses are presented in Table 3. Adequate precision is exhibited for all detected analytes and data interpretation issues are not indicated.

The following samples were analyzed as laboratory duplicates for which all RPD values are within laboratory-specified control limits and no data interpretation issues are indicated:

- W-MW-4, W-MW-06, and W-MW-17 for Alkalinity

- W-SG-4314102-D1, W-MW-16, W-MW-6, and W-MW-12 for Specific Conductance
- W-MW-13, W-MW-4, W-MW-10, and W-OW-1 for TDS

Conclusions

QC data associated with laboratory measurements indicate that data are defensible and that measurement data reliability is within expected limits of sampling and analytical error. No interpretation issues were identified during this evaluation of the analytical data.

Table 1. Evaluated Samples

TRC ID	Collected	Matrix	DHL ID
W-RS-14	1/19/2009	Water	0901115-01
W-RS-14-D	1/19/2009	Water	0901115-02
W-RS-15	1/19/2009	Water	0901115-03
W-RS-16	1/19/2009	Water	0901115-04
W-RS-17	1/19/2009	Water	0901115-05
W-RS-13	1/19/2009	Water	0901115-06
W-RS-12	1/19/2009	Water	0901115-07
W-SG-4314102-D1	1/19/2009	Water	0901115-08
W-MW-13	1/20/2009	Water	0901115-09
W-MW-9	1/20/2009	Water	0901115-10
W-MW-14	1/20/2009	Water	0901115-11
W-MW-8	1/20/2009	Water	0901115-12
W-MW-7	1/20/2009	Water	0901115-13
W-SP-01	1/20/2009	Water	0901115-14
W-MW-16	1/20/2009	Water	0901115-15
W-MW-4	1/20/2009	Water	0901115-16
W-MW-6	1/21/2009	Water	0901133-01
W-MW-3	1/21/2009	Water	0901133-02
W-MW-2	1/21/2009	Water	0901133-03
W-MW-1	1/21/2009	Water	0901133-04
W-MW-15	1/21/2009	Water	0901133-05
W-MW-11	1/21/2009	Water	0901133-06
W-MW-18	1/21/2009	Water	0901133-07
W-MW-18-D	1/21/2009	Water	0901133-08
W-MW-05	1/21/2009	Water	0901133-09
W-MW-10	1/21/2009	Water	0901133-10
W-MW-12	1/21/2009	Water	0901133-11
W-WW-MAYS-02	1/21/2009	Water	0901133-12
W-MW-19	1/22/2009	Water	0901133-13
W-MW-20	1/22/2009	Water	0901133-14
W-OW-1	1/22/2009	Water	0901133-15
W-MW-17	1/22/2009	Water	0901133-16
W-EB-1	1/22/2009	Water	0901133-17

Table 2. Calculated RPD Values for Field Duplicate Analyses of Sample W-RS-14

Analyte	Result	Duplicate Result	Units	RPD	Flag
Calcium	192	187	mg/L	2.6	
Magnesium	125	121	mg/L	3.2	
Potassium	19.9	19.0	mg/L	4.6	
Sodium	834	824	mg/L	1.2	
Bromide	3.92	3.98	mg/L	1.5	
Chloride	1280	1330	mg/L	3.8	
Sulfate	744	753	mg/L	1.2	
Alkalinity	182	183	mg/L	0.55	
Specific Conductance	5230	5360	umhos/cm	2.4	
TDS	3360	3270	mg/L	2.7	

* RPD Greater than expected (i.e., RPD > 20)

Table 3. Calculated RPD Values for Field Duplicate Analyses of Sample W-MW-18

Analyte	Result	Duplicate Result	Units	RPD	Flag
Calcium	1470	1550	mg/L	5.3	
Magnesium	631	658	mg/L	4.2	
Potassium	187	193	mg/L	3.2	
Sodium	14000	14200	mg/L	1.4	
Bromide	43.9	44.0	mg/L	0.23	
Chloride	25700	26500	mg/L	3.1	
Sulfate	3940	4090	mg/L	3.7	
Alkalinity	312	315	mg/L	0.96	
Specific Conductance	79900	79100	umhos/cm	1.0	
TDS	47500	47700	mg/L	0.42	

* RPD Greater than expected (i.e., RPD > 20)